

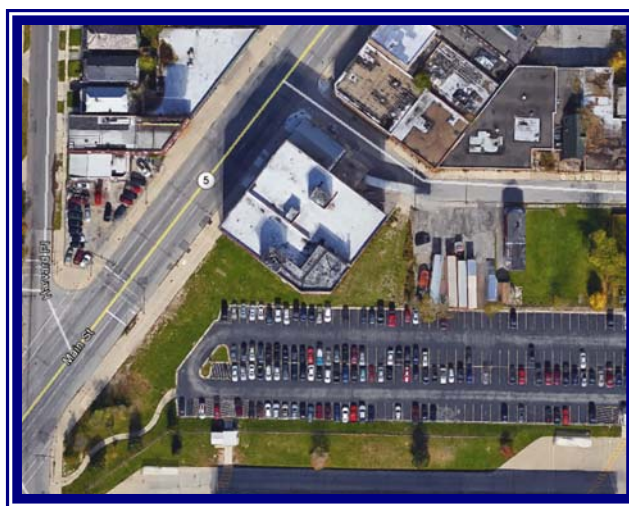
# Remedial Investigation/ Interim Remedial Measures/Alternatives Analysis Report

July 2018

0239-016-001

Prepared For:

1665 Main Street Group, LLC



Prepared By:

In Association With:



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# REMEDIAL INVESTIGATION/ INTERIM REMEDIAL MEASURES / ALTERNATIVES ANALYSIS REPORT

MAIN & EAST BALCOM STREET SITE  
BUFFALO, NEW YORK  
BCP SITE No. C915306

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July 2018

0239-016-001

Prepared for:

**1665 Main Street Group. LLC**

Prepared By:



In Association With:



**REMEDIAL INVESTIGATION/INTERIM REMEDIAL  
MEASURES /ALTERNATIVES ANALYSIS REPORT  
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## Certification

I, Thomas H. Forbes, certify that I am currently a NYS registered professional engineer as defined in 6NYCRR Part 375 and that this July 2018 Remedial Investigation/Interim Remedial Measures/Alternatives Analysis Report (RI/IRM/AAR) for the Main & East Balcom Street Site (C915306) was prepared in general accordance with applicable statutes and regulations and in general conformance with the DER Technical Guidance for Site Investigation and Remediation (DER-10) and that activities were performed in general accordance with the DER-approved work plan and any DER-approved modifications.

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Date

## 1.0 INTRODUCTION

This Remedial Investigation/Interim Remedial Measures/Alternatives Analysis Report (RI/IRM/AAR) has been prepared by Benchmark Environmental Engineering and Science, PLLC (Benchmark), in association with TurnKey Environmental Restoration, LLC (TurnKey), referred to herein as Benchmark-Turnkey, on behalf of 1665 Main Street Group, LLC, for the Main & East Balcom Site, located in the City of Buffalo, Erie County, New York (Site; see Figures 1 and 2).

1665 Main Street Group, LLC elected to pursue cleanup and redevelopment of the Site under the New York State Brownfield Cleanup Program (BCP) and executed a Brownfield Cleanup Agreement (BCA) with the New York State Department of Environmental Conservation (NYSDEC) in August 2014 and amended in November 2014 (Site No. C915306). The RI/IRM Work Plan was approved by the NYSDEC, with concurrence of the New York State Department of Health (NYSDOH), in May 2017. Benchmark-TurnKey performed RI-IRM activities at the Site between July 2017 and February 2018.

### 1.1 Site Description

The approximately 1-acre Site is located along Main Street and East Balcom Street, in a highly developed mixed use commercial and residential area of the City of Buffalo, Erie County, New York (Site; see Figures 1 and 2). The Site is currently improved with a six (6) story former storage building with asphalt and soil covered areas along Main Street and East Balcom Street.

The Site is bound by Main Street to the west, vacant and residential properties to the east, East Balcom Street with commercial building beyond to the north, and a commercial facility (bus garage) to the south. Land use surrounding the Site includes commercial and residential properties.

### 1.2 Site Environmental Background

Portions of the Site have a long history of being utilized for warehouse-storage and trucking, filling station(s) and retail (donut manufacturer), and residential.

Previous environmental investigations completed at the Site have revealed evidence of environmental contamination related to the former uses of the Site. Elevated photoionization detector (PID) readings and elevated levels of semi-volatile organic compounds (SVOCs) and metals have been detected on Site at concentrations exceeding regulatory guidelines. Details of the previous investigations are presented in Section 1.2 below.

According to municipal records, multiple underground storage tanks (USTs) and fuel dispensers have been installed on several of the former parcels (1653-1655 Main Street and 1661 Main Street). The current building (1661 Main Street) was identified on the RCRA list of generators of hazardous waste. Additional hazardous/regulated materials and/or wastes associated with automobile service activities were likely used, stored and/or generated on-Site. Multiple NYSDEC Spills records are associated with the Site, including a currently open spill file No. 1500185.

## 1.3 Previous Investigations

### *1.3.1 January 2015 – Phase I Environmental Site Assessment*

TurnKey completed a Phase I Environmental Site Assessment (ESA) for the Site, dated January 2015. TurnKey's review of historical sources revealed that the Site had a history of residential and commercial uses/development. The following RECs and other concerns were identified:

- A 1,000-gallon fuel oil aboveground storage tank (AST) is located in the basement boiler room of the existing building. Petroleum odors and staining was noted on the exterior of the tank as well as beneath it (petro-stained wood chips present surrounding the tank within concrete enclosure). Filling and vent lines are present in the basement.
- Three (3) vent and filling pipes are located next to man-door along E. Balcom Street. It should be noted that only two (2) lines were identified in the basement related to boiler AST, likely indicating additional tank(s) present on-Site.

- City of Buffalo Building Department and Fire Prevention office records indicate the presence of at least one (1) and potentially up to three (3) USTs, and at least one (1) fuel dispenser on-Site.
- Gasoline station and automotive repair operations were identified in connection with adjacent properties.
- Hazardous/regulated materials are stored and utilized on-site.
- The Site (American Household Storage Company) was identified as a RCRA generator of hazardous waste.
- Multiple NYSDEC Spill files are associated with the Site, including:
  - Spill No. 9702110, involving a diesel fuel release, is classified as "closed" by the NYSDEC.
  - Spill No. 9975698, involving a battery acid release, is classified as "closed" by the NYSDEC.
- Numerous closed/inactive spills were identified in connection with adjacent/nearby properties in the regulatory database.

### ***1.3.2 April 2015 - Limited Phase II Environmental Investigation Report***

TurnKey completed a Limited Phase II Environmental Investigation on the 1661 Main Street Site. Findings of the Limited Phase II investigation are detailed below:

- A total of seven (7) soil borings were completed across the Site, including two (2), identified as SB-1 and SB-2, completed in the basement boiler room, and five (5), identified as SB-2 through SB-7 in the exterior parking lot along E. Balcom.
- Multiple SBs, designated collectively as SB-8, were advanced along the southeast portion of the E. Balcom parking lot, adjacent to the vent/fill lines. Boring refusal was encountered at approximately 2-3 fbg at each location, likely indicating the presence of an additional UST. Investigation activities were limited to the west by the presence of a utility (natural gas) and north, south and west by the building and property boundaries.
- Field observations of apparent petroleum contamination, including elevated PID readings (390 ppm) and petroleum odors were noted in the basement SBs.

- Petroleum-related compound, naphthalene, was detected exceeding its NYSDEC CP-51 Soil Cleanup Level (SCL).
- Based on the presence of the fuel oil tank in the basement, including staining and odors associated with the tank, and the presence of petroleum impacts beneath the basement slab, the NYSDEC Spill hotline was notified and Spill No. 1500185 was issued for the Site. The spill is currently classified as “active” pending remedial measures.

### ***1.3.3 January 2016 - Supplemental Phase II Environmental Investigation Report***

TurnKey completed a Supplemental Phase II Environmental Investigation on the Main & East Balcom Street Site. Findings of the Supplemental Phase II investigation are detailed below:

- A 5,000 gallon UST was discovered in the 1661 Main Street parcel, East Balcom parking lot. Additional assessment of the tank was limited by the presence of subgrade utilities along the sides of the tank, the building, and the property boundary. Investigation of the former fuel pump was limited due to vehicle restricting access.
- Field observations of apparent petroleum contamination, including elevated PID readings and petroleum odors were noted in the TP locations.
- Elevated metals, including arsenic, cadmium, chromium, lead and mercury, some exceeding CSCOs, were detected across the Site. Elevated metals are likely associated with fill that was identified Site-wide from surface to 10 fbg.
- Based on the findings of the completed investigations, Site remediation appears warranted. The two (2) known tanks, one (1) AST in the basement and one (1) UST in the 1661 Main Street parking lot, and appurtenant piping, should be removed in accordance with NYSDEC protocols and impacted soil encountered in the area of these structures should be properly handled.
- Based on the elevated concentration of metals and PAHs in the upper 8-10 ft. across the Site, any soil-fill excavated during redevelopment for utilities or building foundations will need to be handled as a solid waste, and disposed off-



site, in accordance with NYSDEC and City of Buffalo guidelines. Any excavated material needs to be handled in accordance with all local, state and federal regulations.

- Additional investigation and/or remediation will be required to address NYSDEC Spill No. 1500185.

A summary of previous investigation analytical results, described above, is provided on Table 2. Historic sample locations are illustrated on Figure 3.

## 1.4 Purpose and Scope

This RI/IRM/AAR has been prepared on behalf of 1665 Main Street Group, LLC. to describe and present the findings of the RI activities, detail the completed IRMs, and evaluate remedial alternatives for the Site.

This report contains the following sections:

- Section 2.0 presents the approach for the RI
- Section 3.0 describes the physical characteristics of the Site as they pertain to the investigation findings
- Section 4.0 presents the investigation results by media
- Section 5.0 describes the Interim Remedial Measures (IRMs)
- Section 6.0 describes the fate and transport of the constituents of primary concern (COPCs)
- Section 7.0 presents the qualitative risk assessment
- Section 8.0 evaluates remedial alternatives for the Site
- Section 9.0 presents the RI/IRM/AAR summary and conclusions
- Section 10.0 provides a list of references for this report

## 2.0 INVESTIGATION APPROACH

The purpose of the RI field activities was to define the nature and extent of contamination on the BCP Site, and to collect data of sufficient quantity and quality to perform the remedial alternatives evaluation. The field investigation was completed across the BCP Site to supplement previous environmental data and to delineate areas requiring remediation. Field activities included: advancement of soil borings; subsurface soil sampling; monitoring well installation; groundwater sampling; and, collection of hydrogeologic data.

Field team personnel collected environmental samples in accordance with the rationale and protocols described in the Quality Assurance Project Plan (QAPP). USEPA and NYSDEC-approved sample collection and handling techniques were utilized during field activities.

Samples for chemical analysis were analyzed in accordance with USEPA SW-846 methodology with an equivalent Category B deliverable package to meet the definitive-level data requirements. Analytical results were evaluated by a third-party data validation expert in accordance with provisions described in the QAPP.

The investigation activities are described below. Figure 3 presents the RI sample locations including historic sample locations. Appendix A contains photographs of field activities. Field borehole logs and well completion details are included in Appendix B.

### 2.1 RI Soil/Fill Investigation

A soil/fill investigation was completed across the Site to supplement previous environmental data and to further delineate known contamination on-Site. The soil/fill investigation included the excavation of test pits and advancement of soil borings across the Site.

#### *2.1.1 Surface/Near Surface Soil/Fill Investigation*

Four (4) surface soil samples, identified as NS-1 through NS-4, were collected from the upper 0-24 inches in areas of the Site not covered by hardscape (see Figure 3). Surface soil/fill samples were collected and analyzed in accordance with the approved Work Plan and Sampling and Analysis Plan as detailed on Table 1.

### ***2.1.2 Subsurface Soil/Fill Investigation***

The subsurface soil/fill investigation included the excavation of nine (9) test pits, identified as TP-11 through TP-19 and advancement of five (5) soil borings identified as MW-1 through MW-5.

Test pits were excavated to target depth of 12-15 feet below ground surface (fbgs), and soil borings were advanced using direct-push drilling techniques and continuous split spoon sampling to a target depth of 20 fbgs. Test pits were completed in July 2017, and soil borings were advanced between September-October 2017 (MW-1 – MW-4) and February 2018 (MW-5).

Retrieved soil/fill samples allowed for visual, olfactory, and photoionization detector (PID) assessment of subsurface conditions. Subsurface soil/fill samples were collected for laboratory analysis per the approved Work Plan (see Table 1). Test pit and soil boring logs are provided in Appendix B.

### ***2.1.3 Soil/Fill Sample Collection and Analyses***

Soil/fill samples were collected using dedicated stainless steel sampling tools. Representative soil samples were placed in pre-cleaned laboratory provided sample bottles, cooled to 4°C in the field, and transported under chain-of-custody command to a NYSDOH Environmental Laboratory Accreditation Program (ELAP)-certified analytical laboratory.

Representative soil/fill samples were analyzed in accordance with the approved work plan, including Target Compound List (TCL) plus Commissioner Policy (CP-51) volatile organic compounds (VOCs), TCL semi-volatile organic compounds (SVOCs), Target Analyte List (TAL) metals, polychlorinated biphenyls (PCBs), pesticides and herbicides, as detailed on Table 1.

All samples were collected and analyzed in accordance with USEPA SW-846 methodology with equivalent NYSDEC Category B deliverables to allow for independent third-party data usability assessment.

## **2.2 Groundwater Investigation**

Benchmark-TurnKey personnel provided oversight for the installation of five (5) groundwater monitoring wells, identified as MW-1 through MW-5, to investigate on-Site

groundwater flow direction and quality. MW-1, MW-2 and MW-3 were installed in September 2017. MW-4 was installed in November 2017 after completion of UST IRM excavation activities; MW-5 was installed in February 2018. Details of the well installation, well development, and groundwater sampling are provided below. Figure 4 presents the location of the monitoring well network.

### ***2.2.1 RI Monitoring Well Installation***

RI groundwater monitoring wells were installed after completion of RI soil boring advancement, with a drill rig capable of advancing hollow-stem augers to install the groundwater monitoring wells. Due to the potential for well destruction related to the planned UST IRM excavation, installation of MW-4 was delayed until after IRM excavation activities were complete in October 2017. After the initial RI groundwater data was reviewed, an additional well (MW-5) was installed in consultation with the Department in February 2018.

Monitoring well construction details are presented in Appendix B. Location of the monitoring wells is presented on Figure 4.

### ***2.2.2 Monitoring Well Development***

After installation, the monitoring wells were developed in accordance with the approved work plan as well as Benchmark-TurnKey and NYSDEC protocols. Development of the monitoring wells was completed with dedicated disposable polyethylene bailers via surge and purge methodology. Field parameters including pH, temperature, turbidity, dissolved oxygen and specific conductance were measured during development until they became relatively stable. Stability was defined as variation between measurements of approximately 10 percent or less with no overall upward or downward trend in the measurements; or a minimum of three well volumes.

### ***2.2.3 Groundwater Sample Collection and Analyses***

Prior to sampling, Benchmark-TurnKey personnel purged a minimum of three (3) well volumes, or purged dry, due to low groundwater well recovery rates and sampled monitoring wells using dedicated bailers. Field measurements for pH, specific conductance,

temperature, turbidity, dissolved oxygen (DO), redox potential (ORP), and water levels, as well as visual and olfactory field observations, were periodically recorded and monitored for stabilization. All collected groundwater samples were placed in pre-cleaned, pre-preserved laboratory provided sample bottles, cooled to 4°C in the field, and transported under chain-of-custody command to a NYSDOH ELAP-certified analytical laboratory

Groundwater samples were collected and analyzed for TCL plus CP-51 list VOCs, TCL SVOCs, TAL metals, PCBs, pesticides, and herbicides in accordance with the approved Work Plan and detailed on Table 1. All sampling was performed in accordance with USEPA SW-846 methodology with equivalent NYSDEC Category B deliverables to allow for independent third-party data usability assessment.

The NYSDEC requested emerging contaminants sampling and analysis was not a requirement at the time the RI-IRM Work Plan was approved. Supplemental emerging contaminant sampling will be completed in accordance with the Department's approved emerging contaminant work plan (May 2018) and sample results will be provided to the Department under separate cover.

### 2.3 Soil Vapor Intrusion Investigation

A preliminary soil vapor intrusion (SVI) investigation was completed to assess the potential for soil vapor conditions within the existing building's basement. The goal of the preliminary SVI investigation was to qualitatively assess conditions beneath the existing building after completion of the approved IRMs during ongoing building redevelopment.

To perform the evaluation, two (2) locations within the building basement were selected as sub-slab vapor (SV) sample locations, in consultation with the Department after completion of the planned IRMs (SSV-1 and SSV-2). Ambient basement air samples were also collected at both subslab sample locations (Ambient 1 and Ambient 2), and indoor ambient air sample was collected from the first floor (Ambient 3). An outdoor ambient air sample (Outdoor-1) was collected to establish background conditions (see Figure 3). A pre-sampling walk-through was completed with NYSDEC after completion of the interior IRM to review SVI sampling locations and pre-sampling conditions.

Prior to initiation of SV sampling, a pre-sampling inspection was performed to identify and minimize conditions that may interfere with or bias testing (e.g., open containers of solvents, paints, etc.). The pre-inspection inventory is provided in Appendix C.

### ***2.3.1 Sub-Slab Vapor & Ambient Air Sample Collection***

Sub-slab vapor and ambient air sampling was completed in general conformance with the NYSDOH Soil Vapor Intrusion Guidance and Benchmark-TurnKey's Ambient Air/Sub-slab Vapor Sampling Field Operating Procedure, which was included with the approved RI Work Plan.

At each SSV sampling location, Benchmark/TurnKey personnel drilled a hole through a competent portion of the concrete slab, away from cracks and floor drains using a hand-held hammer drill. Sub-slab vapor samples were collected in the following manner:

- After tracer gas (helium) verification that the air sample tubing is sealed to the subsurface, one to three volumes (i.e., the volume of the sample probe and tube) were purged prior to collecting the samples to ensure they were representative;
- The SSV probes were sealed at the surface with non-VOC containing clay;
- Flow rates for both purging and sample collection were regulated to less than 0.2 liters per minute; and
- SSV sample canisters were equipped with a 24-hour regulator to allow the sample to be collected over an approximate 24-hour period.

Concurrent with the SSV samples, indoor ambient air samples were collected from the basement adjacent to the SSV locations, the first floor, and outdoor air sample were collected (see Figure 3). It should be noted that the basement is a primarily large open space with minimal interior walls or dividers. However, the sampling area, was isolated by hanging plastic to localize the interior basement ambient air samples. Air sampling was completed during the weekend (Saturday-Sunday) when no other activities were being completed within the building. Laboratory provided air sample canisters were equipped with a 24-hour regulator.

Each canister had an initial vacuum of approximately 30 inches of mercury (in Hg) was fitted with an appropriate regulator for the 24-hour sampling period. The summa

canister valves were kept closed until the SSV samples holes were complete and the ambient indoor air canisters were in their respective positions. Information regarding the sample duration and starting and ending vacuums were recorded on the sampling forms included in Appendix C.

After the sampling was completed, the regulator valves were closed, and the air samples were transported to the laboratory for TCL VOCs analysis via USEPA Method TO-15 (see Table 1).

## **2.4 Field Specific Quality Assurance/Quality Control Sampling**

Field-specific quality assurance/quality control (QA/QC) samples were collected and analyzed to ensure the reliability of the generated data as described in the QAPP and to support the required third-party data usability assessment effort. Site-specific QA/QC samples included matrix spikes, matrix spike duplicates, blind duplicates, and trip blanks.

## **2.5 Site Mapping**

A Site map was developed during the RI field investigation. All sample points and relevant Site features were located on the map. Benchmark-TurnKey personnel employed a handheld GPS unit to identify the locations of all exterior sample locations relative to New York state planar grid coordinates. For interior sample locations a hand held GPS unit was used to locate the corners of the existing building relative state planar grid coordinates, and interior building measurements were then recorded and sample locations were adjusted to the state planar grid. Monitoring well elevations were measured by Benchmark-TurnKey's surveyor. An isopotential map showing the groundwater elevations was prepared based on water level measurements relative to the Site vertical datum (see Figure 4).

## **2.6 Decontamination & Investigation-Derived Waste Management**

Every attempt was made to utilize dedicated sampling equipment during the RI, however, non-dedicated equipment was required and/or used (e.g., spilt spoons) and was decontaminated with a non-phosphate detergent (i.e., Alconox®) and potable water mixture, rinsed with distilled water, and air-dried before each use in accordance with the field operating procedure (FOP).



### 3.0 SITE PHYSICAL CHARACTERISTICS

The physical characteristics of the Site observed during the RI are described in the following sections.

#### 3.1 General Site Features and Site Topography

The Site consists of one (1) parcel addressed at 1661 Main Street (SBL: 100.24-4-14.1) in the City of Buffalo. The Site is bound by Main Street the west, vacant residential to the east, East Balcom Street followed by commercial buildings to the north, and a commercial facility (bus garage) to the south. Land use surrounding the Site includes commercial and residential properties. The Site is general flat along Main Street, but rises gently to the south along East Balcom, with little distinguishable site features beyond the building.

#### 3.2 Geology and Hydrogeology

##### *3.2.1 Overburden*

The U.S. Department of Agriculture Soil Conservation Service soil survey map of Erie County characterized the general soil type at the Site as Urban Land (Ud) with level to gently sloping land with at least 60 percent of the soil surface covered by the existing building, asphalt, concrete, and other impervious structures typical of an urban environment. The presence of overburden fill material is widespread and common throughout the City of Buffalo.

The geology at the Site was investigated during the RI. The shallow overburden is generally described as fill with varying amount of brick, block, concrete, wood, cinders and ash, with sandy lean clay and fine sands. Fill ranged in depth from 4-11 fbs. Several former stone building foundations were encountered during test pitting on the eastern portion of the Site (East Balcom). Borehole logs are provided in Appendix B.

##### *3.2.2 Bedrock*

Based on the bedrock geologic map of Erie County, the Site is situated over the Onondaga Formation of the Middle Devonian Series. The Onondaga Formation is



comprised of a varying texture from coarse to very finely crystalline with a dark gray to tan color and chert and fossils within. The unit has an approximate thickness of 110 to 160 feet. Structurally, the bedrock formations strike in an east-west direction and exhibit a regional dip that approximates 40 feet per mile (0.4 degrees) toward the south and southwest.

Bedrock was not encountered during RI drilling activities.

### ***3.2.3 Hydrogeology***

Based on the findings of the RI, perched and overburden water was encountered at depths ranging from 12 to 15 fbs. The Site hydrogeology is complicated by the presence of municipal subgrade utilities along Main Street and East Balcom Street, the presence of the subgrade transit tunnel under Main Street, subgrade building footers and foundations, and presence of historic fill.

In general, localized groundwater flow direction was estimated to flow north towards Scajaquada Creek. Figure 4 depicts the estimated overburden groundwater isopotential map based on the water level measurements collected in February 2018.

### ***3.2.4 Hydraulic Gradients***

Hydraulic gradient of the saturated overburden was determined from groundwater elevation data collected in February 2018.

The estimated horizontal hydraulic gradient for overburden groundwater was calculated to range from 0.007 ft/ft (MW-1 to MW-2) to 0.003 ft/ft (MW-5 to MW-4), with an estimated hydraulic gradient calculated average of 0.0047 ft/ft.

## 4.0 INVESTIGATION RESULTS BY MEDIA

The nature and extent of contamination at the Site was further characterized using soil and groundwater samples collected and analyzed as part of the RI. As described above, samples collected during previous investigations were used to supplement this RI.

The soil and groundwater samples collected during the RI sampling events were submitted for analyses under chain-of-custody to a NYSDOH ELAP-certified laboratory. Analytical services were performed in accordance with SW-846 analytical methods and protocols. Appendix D contains laboratory analytical data packages for samples analyzed from the RI. Tabulated analytical data discussed in this section includes results from prior investigations as well as the RI data collected by Benchmark-TurnKey personnel. Tabulated analytical results are shown only for those parameters for which a value greater than the laboratory method detection limit was detected at a minimum of one (1) sample location.

Figure 3 shows the RI and previous investigation sampling locations. Table 1 summarizes the sampling and analytical program employed under RI.

### 4.1 Standards, Criteria, and Guidance

According to DER-10 Section 1.3(b)71, SCGs mean “*standards and criteria that are generally applicable, consistently applied, and officially promulgated, that are either directly applicable or not directly applicable but are relevant and appropriate, unless good cause exists why conformity should be dispensed with, and with consideration being given to guidance determined, after the exercise of scientific and engineering judgment, to be applicable. This term incorporates both the CERCLA concept of ‘applicable or relevant and appropriate requirements’ (ARARs) and the USEPA’s ‘to be considered’ (TBCs) category of non-enforceable criteria or guidance. For purposes of this Guidance, ‘soil SCGs’ means the soil cleanup objectives and supplemental soil cleanup objectives identified in 6NYCRR 375-6.8 and the Commissioner Policy on Soil Cleanup Guidance (CP-Soil).*”

For discussion purposes, analytical results for the investigation were compared with the following SCG values.

#### Soil/Fill:

Soil Cleanup Objectives (SCOs) per 6 New York Code Rules and Regulation (6 NYCRR) Part 375 Environmental Remediation Programs, Subparts 375-12 to 375-4 & 375-6, effective December 14, 2006.

NYSDEC, Commissioner Policy, CP-51 Soil Cleanup Guidance, October 21, 2010.

#### Groundwater

Class GA Groundwater Quality Standards and Guidance Values (GWQS/GVs) per NYSDEC's Division of Water, Technical and Operational Guidance Series (TOGS 1.1.1), June 1998, amended April 2000.

#### Soil Vapor

NYSDOH *Final Guidance for Evaluating Soil Vapor Intrusion in the State New York – Matrix A, Matrix B, and Matrix C*. May 2017(NYSDOH Guidance).

Sample results compared to the above criteria are described below according to media and contaminant class.

## **4.2 Historic Soil/Fill Investigation Results**

A total of 10 historic soil/fill samples, identified as SB-1, SB-2, SB-3, TP-1 through TP-4, and TP-8 through TP-10 were collected and selectively analyzed for VOCs, SVOCs, and metals during previous investigations. Table 2 summarizes the historic soil/fill analytical results with comparison to applicable Part 375 SCOs. Historic sample locations are identified on Figure 3.

Elevated SVOCs, primarily polycyclic aromatic hydrocarbons (PAHs) were detected exceeding their Unrestricted Use Soil Cleanup Objectives (USCOs), Restricted Residential Use SCOs (RRSCOs) and Commercial Use SCOs (CSCOs). Elevated metals, including arsenic, barium, and lead, were detected exceeding their respective USCOs, RRSCOs, and CSCOs at several locations across the Site within the fill layer (see Table 2 and Figure 3). Elevated detections exceeding RRSCOs appear to be related to the presence of shallow fill material across the Site.

## **4.3 RI Soil/Fill Investigation Results**

Benchmark-TurnKey completed surface and subsurface sampling across the Site to further assess on-Site conditions. Table 3 summarizes the surface soil and subsurface soil/fill

samples, respectively, with comparison to applicable Part 375 SCOs. Sample locations are shown on Figure 3. Boring and test pit logs are provided in Appendix B.

#### ***4.3.1 Qualitative Soil/Fill Screening Results***

During the RI field activities, fill material was identified across the Site to varying depths, ranging from surface to 11 fbgs. The shallow overburden fill is generally described as brick, block, concrete, wood, cinders and ash, with sandy lean clay and fine sands. Shallow fill was prominent in the East Balcom parking lot area, with a former building concrete floor being identified in TP-18 at approximately 5 fbgs. Former building foundation walls were also identified in several test pits in the eastern portion of the Site.

Reworked soil/fill, including brick, block, concrete, was evident at surface in the southern portion of the Site Along Main Street. This portion of the Site was formerly a donut manufacturing facility that was demolished in 2008, with likely recycled C&D concrete and brick used to backfill the former building after demolition.

Elevated PID readings ranging from 56-105 ppm were detected in TP-14, with slight odors being noted. Soil samples were collected from the elevated PID horizon. No other elevated PID readings were detected outside of the UST IRM area.

#### ***4.3.2 RI Near Surface Soil Results***

Near-surface soil/fill samples were collected from surface to two (2) fbgs, from areas of the Site with visual evidence of fill materials present at surface, likely related to the demolition of the former building. The goal of the near-surface sampling was to characterize the shallow soil/fill in these areas of the Site and determine if these soils would be potentially acceptable for use as on-Site backfill beneath the cover system.

Four (4) near surface soil samples, identified as NS-1 through NS-4, were collected from the accessible areas across the Site. Table 3 summarizes the analytical results of the surface soil sample results with comparison to applicable SCGs.

##### ***4.3.2.1 Semi-Volatile Organic Compounds***

Elevated PAHs were detected above RRSCOs at one (1) location (NS-4). Specifically, benzo(a)anthracene, benzo(a)pyrene, benzo(b)fluoranthene, and

dibenzo(a,h)anthracene, chrysene, and indeno(1,2,3-cd)pyrene were detected at concentrations exceeding RRSCOs. Total PAHs at NS-4 are less than 100 ppm (see Table 3 and Figure 3).

#### **4.3.2.2 Metals**

No metals were detected exceeding RRSCOs. Several metals, including chromium, lead, mercury and zinc were detected above their respective USCOs.

#### **4.3.2.3 Polychlorinated Biphenyls**

Total PCBs were not detected above RRSCOs. Total PCBs were detected above USCOs at one location (NS-4), with the majority of results being reported as non-detect or estimated values by the laboratory.

#### **4.3.2.4 Pesticides and Herbicides**

No pesticides or herbicides were detected above USCOs, with all results being reported as non-detect (below the MDL) or estimated by the laboratory.

#### **4.3.2.5 Near Surface Soil/Fill Summary**

Select individual PAHs were detected above RRSCOs at one location (NS-4), with total PAHs of less than 100 ppm. Certain metals and PCBs were detected above USCOs, however, none of the concentrations exceeded RRSCOs.

No pesticides or herbicides were detected above USOCs in the near-surface soil-fill samples.

#### **4.3.3 RI Subsurface Soil/Fill Investigation**

Eleven (11) subsurface samples were collected across the site, including seven (7) test pits (TPs) and 5 soil boring (SBs). Shallow soil-fill samples were collected from test pit locations, with sample depths ranging from surface to 11 fbgs. Deeper native soil samples were collected and sampled from the soil borings with sample depths ranging from 8 to 20

fbgs. Table 3 presents a summary of the RI subsurface soil/fill sample results with comparison to applicable SCOs. Sample locations are shown on Figure 3.

#### ***4.3.3.1 Volatile Organic Compounds***

No VOCs were detected above USCOs, with the vast majority of results being reported as non-detect or estimated values by the laboratory.

#### ***4.3.3.2 Semi-Volatile Organic Compounds***

No SVOCs were detected above USCOs, with the vast majority of results being reported as non-detect or estimated values by the laboratory.

It should be noted that RI soil samples aimed to characterize different fill horizon than the previous investigations, which identified elevated PAHs are associated with on-Site fill material.

#### ***4.3.3.3 Inorganic Compounds***

No metals were detected above RRSCOs. Certain metals were detected above USCOs (see Table 3).

It should be noted that RI soil samples aimed to characterize different fill horizon than the previous investigations, which identified elevated metals are associated with on-Site fill material.

#### ***4.3.3.4 Polychlorinated Biphenyls***

No PCBs were detected above USCOs, with the vast majority of results being reported as non-detect by the laboratory (see Table 3).

#### ***4.3.3.5 Pesticides and Herbicides***

Pesticides and herbicides were reported as non-detect by the laboratory.

#### **4.3.3.6 Subsurface Soil/Fill Summary**

As described above, no VOCs, SVOCs, PCBs, metals, pesticides or herbicides were detected above RRSCOs. Certain metals were detected above their respective USCOs. No analytical results above USCOs were detected from the deeper native soil samples.

It should be noted that RI soil samples aimed to characterize different fill horizon than the previous investigations, which identified elevated PAHs and metals associated with on-Site fill material.

### **4.4 Groundwater Investigation**

Benchmark-TurnKey personnel provided oversight for the installation of five (5) RI groundwater monitoring wells, MW-1 through MW-5, to investigate on-Site groundwater quality and flow. Table 4 presents a comparison of the detected groundwater parameters to the applicable SCGs. Groundwater samples were collected in accordance with the work plan and analyzed in accordance with Table 1.

Based on the initial groundwater analytical results from MW-1 through MW-4, it was determined in consultation with the Department that an additional well was warranted to further assess suspect low-level chlorinated VOC results in MW-3 and MW-4 (see below) in the absence of any chlorinated VOCs being detected in on-Site soil (no on-Site source). After installation of MW-5, wells MW-3, MW-4 and MW-5 were sampled in February 2018 for VOCs only. Groundwater results are discussed below.

The NYSDEC requested emerging contaminants sampling and analysis was not a requirement at the time the RI-IRM Work Plan was approved (March 2017). Supplemental emerging contaminant sampling will be completed in accordance with the Department's approved emerging contaminant work plan (May 2018) and sample results will be provided to the Department under separate cover.

#### **4.4.1 Volatile Organic Compounds**

The majority of analytes were reported as non-detectable or trace (estimated) concentrations below the laboratory quantitation limit.

Elevated VOCs were detected above GWQS in MW-4 and MW-5. Specifically, benzene was detected slightly above its GWQS in MW-4, and acetone, a common laboratory contaminate, was detected in MW-4.

Certain chlorinated VOCs (cVOCs) were detected above their GWQS in MW-4 and MW-5. It should be noted that the November 2017 groundwater results for MW-3 indicated the presence of trichloroethene (TCE) exceeding GWQS, however, the February 2018 resample data had no detection (ND) of TCE. All analytical results were reviewed and validated by third-party data validator.

#### ***4.4.2 Semi-volatile Organic Compounds***

No SVOCs were detected above GWQS, with the vast majority of results being reported as non-detect or estimated values by the laboratory (see Table 4).

#### ***4.4.3 Inorganic Compounds***

Metals detected at concentrations above GWQS were limited to naturally-occurring minerals, including iron, magnesium and sodium. No other metals were detected above GWQS.

#### ***4.4.4 Polychlorinated Biphenyls***

No PCBs were detected above GWQS, with all results reported as non-detect by the laboratory.

#### ***4.4.5 Pesticides and Herbicides***

Heptachlor was detected slightly above its GWQS in MW-1, and Endrin was detected above its GWQS in MW-3, with the vast majority of results being reported as non-detect by the laboratory.

#### ***4.4.6 Groundwater Summary***

As described above no SVOCs, PCBs, or herbicides were detected above their respective GWQS. Certain naturally-occurring metals and two (2) pesticides were detected



slight above GWQS. Benzene and certain cVOCs were detected above their respective GWQS at MW-4, and one (1) cVOC slightly exceeded its GWQS at MW-5 (see Table 4).

It should be noted that no cVOCs were detected above USCOs in on-Site soils (RI and IRM) or above laboratory detection limits for SVI air sample results.

## 4.5 Soil Vapor Investigation Results

Prior to completing soil vapor intrusion (SVI) sampling, a walk-over of the basement was completed with NYSDEC to inspect site conditions after the completion of the IRM activities. AST IRM post-removal subslab soil boring core holes were patched and plumbing related floor penetration were backfilled and concrete patched prior to SVI sampling. Additionally, plastic sheeting was erected to seal off the elevator shaft and isolate the sampling areas from the larger open basement space.

### 4.5.1 SVI Pre-sample Inventory

No sources for potential indoor air contamination were noted within the basement.

Several sources for potential indoor air contamination were observed on the first floor of the building including:

- twenty (20) new-sealed five gallon buckets of latex paint, five (5) five gallon buckets of latex primer, two (2) five gallon diesel gasoline cans, one (1) one gallon gasoline can, three (3) pallets of Portland cement, and 30 cans of PVC cement. Several hundred feet of PVC pipe of various dimensions were stored on the first floor, and a diesel powered forklift was also parked within the building loading dock at the time of the sampling.

### 4.5.2 RI SVI Results

Six (6) SVI air samples were collected and analyzed during the RI. The samples were analyzed for VOCs via Method TO-15 (see Figure 3). Table 5 summarizes the RI air sampling analytical results and Table 6 provides a comparison of the constituents identified in the NYSDOH SVI Guidance matrices.

The vast majority of detected air constituents were reported by the laboratory as non-detect or estimated values below the laboratory quantitation limit.

The eight (8) VOC compounds subject to the NYSDOH SVI Guidance were tabulated in Table 6 and compared to their respective decision matrices provided in the Guidance (Matrix A, Matrix B, and Matrix C, respectively). Based on the comparison of subslab concentrations (SSV-1 and SSV-2) to the indoor ambient concentrations (Ambient-1 and Ambient-2, all results indicate “No Further Action (NFA)”.

#### ***4.5.3 SVI Results Summary***

Based on the NYSDOH SVI Guidance Matrices A-C comparisons, air results indicate “No Further Action (NFA)” (see Tables 5 and 6).

Preliminary SVI air sampling was completed prior to optimal building conditions, per the Department’s air sampling guidelines. Therefore, supplemental confirmatory SVI air sampling is planned to be completed after building redevelopment activities are complete on the first floor and basement levels to confirm that no further actions to address the potential for exposure are warranted.

The supplemental SVI evaluation will consist of the collection of sub-slab soil vapor samples co-located with indoor air samples in the basement level, indoor air samples on the first floor level, and an outdoor (ambient) air sample. Supplemental SVI air sampling is planned for the upcoming 2018-2019 heating season.

#### **4.6 Data Usability Summary**

In accordance with the RI Work Plan, the laboratory analytical data from this investigation was assessed and, as required, submitted for independent review. Data Validation Services located in North Creek, New York performed the data usability summary assessment, which involved a review of the summary form information and sample raw data, and a limited review of associated QC raw data. Specifically, the following items were reviewed:

- Laboratory Narrative Discussion
- Custody Documentation
- Holding Times

- Surrogate and Internal Standard Recoveries
- Matrix Spike Recoveries/Duplicate Recoveries
- Field Duplicate Correlation
- Preparation/Calibration Blanks
- Control Spike/Laboratory Control Samples
- Instrumental IDLs
- Calibration/CRI/CRA Standards
- ICP Interference Check Standards
- ICP Serial Dilution Correlations
- Sample Results Verification

The Data Usability Summary Report (DUSR) was conducted using guidance from the USEPA Region 2 validation Standard Operating Procedures, the USEPA National Functional Guidelines for Data Review, as well as professional judgment.

In summary, results are usable either as reported or with minor qualification. Additional qualifications of the data have been incorporated to the summary data tables. Appendix E includes the DUSR.

#### 4.7 Constituents of Concern (COCs)

Based on the findings of the RI and previous investigations, and the planned redevelopment of the Site, the Constituents of Potential Concern (COCs) to be are presented below:

***Soil/Fill:*** VOCs (related to UST and AST), SVOCs, and Metals.

***Groundwater:*** VOCs.

## 5.0 INTERIM REMEDIAL MEASURES

Interim Remedial Measures (IRMs) were completed on-Site in accordance with the Department's approved RI-IRM Work Plan (March 2017). Details of the completed IRMs are presented below. Figures 5 and 6 presents the approximate extents of the IRM excavation areas and locations of post-excavation confirmatory sample locations, and post-excavation confirmatory samples are summarized on Tables 7 and 8.

### 5.1 Exterior UST and Pump Island IRM Activities

#### *5.1.1 UST Cleaning and Removal*

Between July 17<sup>th</sup> and 18<sup>th</sup>, 2017, one (1) 5,000 gallon UST was uncovered, and licensed vacuum truck operator, North American Industrial Services (NAIS) was mobilized to the Site to vacuum out and clean the interior of the UST and lines. Cleaning residuals were transported off-site by NAIS (9A-324) and transported to American Recyclers located in Tonawanda New York for disposal. Disposal documents will be provided in the FER.

After cleaning of the UST and lines, RE Lorenz (9A-799) removed the UST and lines from the subsurface, cleaned the exterior of residual soils, and transported off-site for recycling as scrap at Niagara Metals, located in Lancaster New York.

After removal of the UST, supplemental test pitting was completed to delineate the associated petroleum impacts, collect a bottom sample (15-16 fbs) and waste characterization samples for landfill review and approval.

A NYSDEC Petroleum Bulk Storage (PBS) Closure form was prepared to register the former tanks as closed-removed. A copy of the PBS closure form is included in Appendix F.

#### *5.1.2 UST Petroleum- Impacted Soil/Fill Activities*

Between October 24<sup>th</sup> and October 25<sup>th</sup>, 2017, approximately 264 tons of petroleum impacted soil was excavated and transported off-site by RE Lorenz (9A-799) for disposal at Waste Management's Chaffee Landfill, located in Chaffee New York. Disposal documents will be provided in the FER.

The excavation was completed to the East Balcom Street property boundary to the north, the building to the south, a retaining wall to the east, and active natural gas line to the west, with final excavation depth of 15-16 fbs. PID readings of 0.0 ppm were recorded along excavation boundaries, with the exception of SW-6 (240 ppm) located against the building. Post excavation confirmatory samples were collected from the excavation sidewalls and floor for laboratory analysis.

Field inspection and PID readings (0.0 ppm) of the western excavation sidewall along the natural gas line indicated that petroleum impacts were removed. In consultation with the NYSDEC, it was decided to excavate a test pit (TP-17) on the west side of the natural gas line to equivalent depth (15-16 fbs) to assess if petroleum impacts migrated beneath the gas line. No petroleum impacts were detected in TP-17, with concurrence in the field from NYSDEC.

A total of seven (7) post-excavation soil samples were collected, including six (6) side wall samples, and one (1) bottom sample from beneath the former tank. Post-excavation confirmatory soil samples results are all below Unrestricted Use SCOs (USCOs). Table 7 summarizes the UST post-excavation analytical results, and sample locations are shown on Figure 5.

### ***5.1.3 Former Pump Island IRM Activities***

In accordance with the approved RI-IRM Work Plan, and consultation with the Department during the UST IRM excavation, an additional test pit, TP-19, was excavated next to the building loading dock to assess potential petroleum impacts related to a suspect former pump island. Petroleum-impacted soil-fill was identified at approximately 7-10 fbs, with elevated PID readings (165-200 ppm), black stained soil and odors discovered.

Approximately 90 tons of petroleum impacted soil-fill was excavated and transported off-site by RE Lorenz (9A-799) for disposal at WM's Chaffee Landfill. The excavation was completed to remove visually impacted soil fill, PID readings less than 5 ppm, with the exception of SW-4 (70 ppm) against the building, and approximately 12-15 deep. Figure 5 shows post-excavation confirmatory sample locations. Disposal documents will be provided in the FER.

Post-excavation confirmatory samples were collected, including four (4) sidewall samples and one (1) bottom sample. Post-excavation confirmatory results were all below USCOs (see Table 7).

#### ***5.1.4 Backfill***

After the remedial excavations were deemed complete by the Department, backfilling of the excavations was completed to structural subgrades using NYSDEC pre-approved stone backfill from virgin-source quarry, in accordance with DER-10 requirements. Backfill documents will be provided in the FER.

### **5.2 Basement AST IRM Activities**

Basement AST IRM activities were completed between October 17th and October 20th, 2017. The basement AST IRM activities included; structural assessment and shoring design, pre-cleaning of AST and lines, cutting and removal of concrete enclosure surrounding the AST, removal of AST, lines, and associated wastes, post-removal cleaning of AST prior to offsite disposal, disposal of tank cleaning residuals, and post-AST removal confirmatory sub-slab soil boring sample collection and analysis. Details of AST IRM are provided below.

#### ***5.2.1 1<sup>st</sup> Floor Structural Assessment***

As discussed with NYSDEC, due to safety concerns related to the loading bearing capacity of the 1<sup>st</sup> floor of the building, related to the heavy-equipment required to remove the petroleum AST from the basement, a structural engineer, Studio T3 Engineering, was contracted to provide a structural assessment of the first floor loading capacity, review of planned heavy equipment usage and removal process, and provided structural shoring layout and shoring post review and approvals.

Based on the structural engineer's review, 105 shore post were temporarily installed between the basement floor and 1<sup>st</sup> floor slab along the pathway that heavy equipment would need to travel for removal of basement AST wastes, in accordance with the structural engineer's layout. Shoring posts remained in place during all Basement AST IRM activities.

### ***5.2.2 Cleaning AST and Lines***

Due to the presence of the concrete enclosure surrounding the basement AST, NAIS mobilized a vacuum truck to the site to blow back and clean the AST fill and distribution lines, and remove interior contents to the extent practicable. NAIS transported the tank contents and cleaning residual off-site for disposal at American Recyclers, located in Tonawanda NY. Disposal documentation will be provided in the FER.

The AST was not able to be cleaned in a single step due to obstruction by the concrete enclosure. Pre-cleaning was necessary to clean the lines and remove contents to the extent practicable, allow for line removal prior to concrete closure cutting, and remove potential tank contents before concrete cutting and AST removal.

After the AST was removed from the basement, the AST was opened and cleaned by NAIS. NAIS transported the tank contents and cleaning residual off-site for disposal at American Recyclers, located in Tonawanda NY.

The cleaned AST and appurtenant lines were transported offsite by RE Lorenz for recycling as scrap at Niagara Metals, located in Lancaster New York. Disposal documentation will be provided in the FER.

### ***5.2.3 AST Concrete Enclosure Removal***

As detailed on Figure 6, the AST was surrounded by an existing concrete enclosure that required removal to gain access to the AST. Additionally, based on the orientation of the AST, a section of basement divider wall was removed to allow direct access to the tank. After pre-cleaning of the AST and lines, Concrete Cutters was mobilized to the Site and cut the concrete enclosure and basement wall into acceptable size pieces to be safely removed from the basement.

### ***5.2.4 AST Removal***

After the concrete enclosure was removed from the basement, RE Lorenz removed the AST from the basement through an existing open elevator shaft. The AST was lifted out of the basement using an excavator staged on the first floor, and skid loader. Wood construction planking was placed across the elevator shaft pit to allow for safely strapping and lifting the tank and concrete debris.

After the tank was removed from the basement, RE Lorenz moved the tank through the first floor of the building and exited the building at the East Balcom loading dock. The tank was cleaned by NAIS, as described above, and transported offsite for recycling as scrap at Niagara Metals, located in Lancaster New York.

#### ***5.2.5 Post AST-Removal Confirmatory Sub-slab Soil Sampling***

After the removal of the basement AST, five (5) subslab soil borings were advanced beneath and surrounding the former AST location to assess soil/fill beneath the concrete slab. Elevated PID readings and odors were noted from beneath the building slab. Two (2) subslab boring locations were advanced to 8 ft beneath concrete slab surface (BSB-1 and BSB-2) and retrieved soils were collected and submitted for analysis, per the approved Work Plan. Three (3) of the attempted subslab soil borings encountered refusal at 1-2 feet beneath the concrete floor slab (BSB-3, BSB-4, and BSB-5). Boring retrieval from refusal locations was limited to subbase gravel, and therefore not sampled. Boring core holes were filled with concrete after completion. Locations of the post-removal samples are shown on Figure 6.

Post-removal subslab confirmatory soil sample results were all below RRSCOs (see Table 8). Laboratory analytical data packages are provided electronically in Appendix D.

Documentation of the completed IRMs described above will be provided in the Final Engineering Report.



## 6.0 FATE AND TRANSPORT OF COCs

The surface and subsurface soil/fill and groundwater analytical sample results were incorporated with the physical characterization of the Site to evaluate the fate and transport of COCs in Site media. The mechanisms by which the COCs can migrate to other areas or media are briefly outlined below. In all instances, the potential pathways are evaluated in the context of post-IRM conditions.

### 6.1 Fugitive Dust Generation

Volatile and non-volatile chemicals present in soil can be released to ambient air as a result of fugitive dust generation. Historic use of the Site has impacted surface and subsurface soil-fill, and as such fugitive dust generation during excavations related to remediation and redevelopment activities is considered a relevant potential short-term migration pathway.

Particulate monitoring in accordance with the approved Community Air Monitoring Plan (CAMP) will be completed during intrusive activities and, if required, dust mitigation measures will be employed during future remediation and redevelopment.

### 6.2 Volatilization

Volatile chemicals present in soil/fill and groundwater may be released to ambient or indoor air. Volatile chemicals typically have a low organic-carbon partition coefficient ( $K_{oc}$ ), low molecular weight, and a high Henry's Law constant.

No VOCs were detected in on-Site soils exceeding RRSCOs, with the vast majority being below USCOs. After completion of the IRMs, volatilization is not considered a migration pathway for on-Site soils.

Elevated VOCs were detected in on-Site groundwater in the vicinity of MW-4. Though a soil vapor intrusion study completed in the existing building did not identify a vapor intrusion concern, volatilization from low-level cVOC impacted groundwater is considered a relevant migration pathway to be considered in remedy selection.

### 6.3 Surface Water Runoff

The potential for soil particle transport due to surface water runoff is low, though is considered a short-term migration pathway for the Site. Elevated PAHs and metals exceeding RRSCOs were detected in surface soil-fill on-Site.

Pre-remedial conditions at the site include the existing building, asphalt and soil-vegetation covered areas.

As such, surface water runoff is considered a potential migration pathway.

### 6.4 Leaching

Leaching refers to chemicals present in soil/fill migrating downward to groundwater as a result of infiltration of precipitation. The site is partially covered by grass and scrub vegetation allowing for potential infiltration into the subsurface.

Based on the findings of the RI, certain PAHs and metals were detected above RRSCOs in the non-saturated soil/fill interval. However, the detected PAHs and metals tend to adsorb strongly to soil, sediments and particulate matter and are not expected to leach under natural conditions (i.e., neutral pH). This is supported by the differential detections of analytes in the soil and groundwater analytical results.

Though no VOCs were detected in subsurface soil/fill samples above RRSCOs, the former UST and associated petroleum impacted soil/fill were identified, and as such, leaching is considered a potential migration pathway.

### 6.5 Groundwater Transport

Overburden groundwater at the Site flows in a northern direction. Residual groundwater impacts exceeding GWQS are present on-Site. RI groundwater analytical results indicated exceedance of benzene and certain cVOCs above GWQS. Based on the UST IRM source removal and post-excavation confirmatory soil sample results, benzene concentrations are expected to decline in groundwater, and therefore is not considered a migration pathway.

Groundwater transport of cVOCs is considered a potential migration pathway. Wells upgradient of the building, MW-1 and MW-2, had no exceedances of GWQS; and, no cVOCs were detected in the subslab air samples from beneath the basement slab.

Furthermore, no cVOCs above USCOs were detected in on-Site soil-fill from the RI and IRM soil samples. In total, including previous investigations, over 40 soil samples have been collected on-Site, and no cVOCs were detected above USCOs. Based on the findings of the RI, specifically MW-4, the potential for off-site migration exists, and groundwater transport is considered a potential migration pathway.

## 6.6 Exposure Pathways

Based on the fate and transport analysis provided above, the pathways through which Site contaminants could potentially reach receptors at significant exposure point concentrations are: fugitive dust, volatilization of cVOCs in groundwater, surface water run-off, leaching, and groundwater transport of cVOCs.

The potential significance of contaminants in terms of on-site and off-site receptors is further evaluated in Section 7.0.

## 7.0 QUALITATIVE EXPOSURE ASSESSMENT

### 7.1 Potential Human Health Exposure

The Main and East Balcom Street Site is planned for redevelopment for a mixed-use commercial and residential use project. The objective will be to meet Restricted-Residential Use SCOs. The planned reuse is consistent with the surrounding property use and zoning. Under current site conditions, including remedial and redevelopment activities that do not allow for the Site to be fenced, human contact with the Site can be reasonably expected to occur primarily by two types of receptors: construction workers involved in the remediation and/or redevelopment of the Site, and trespassers who may traverse the property during intrusive activities. Construction workers will be comprised of adults, and trespassers would likely be limited to adolescents and adults. Exposures are unlikely to occur, and future intrusive activities beneath the cover system will be completed in accordance with an approved Site Management Plan (SMP).

Elevated PAHs and metals were detected above RRSCOs and CSCOs in on-Site soil/fill; therefore, under the current use scenario exposure pathways would be limited to inhalation of dust and dermal contact with impacted soil/fill. An approved Health and Safety Plan (HASP) and Community Air Monitoring Plan (CAMP) will be followed during intrusive remedial and redevelopment activities to reduce and/or minimize the potential for exposure.

For groundwater, the requirements to use municipally supplied potable water at the Site mitigates the potential for routine direct human contact or ingestion (i.e., as might occur with use of on-Site groundwater water for potable or process purposes). Human contact with groundwater can be expected to be limited to only one receptor type: construction workers during deep intrusive activities. If groundwater is encountered during deep excavation activities, excavation waters will be managed in accordance with SCGs, approved work plan, and discharged to municipal sewer system under an approved temporary discharge permit.

Under the current use and planned redevelopment scenario, the majority of the Site will be covered by hardscape (e.g., building, asphalt, concrete) with limited passive recreation areas on-Site. The planned restricted-residential use of the site will necessitate either

achieving RRSCOs to depths of 15 feet below grade across the Site, or extending the redevelopment cover to assure that all areas of the property are covered by hard cover (asphalt, pavement, etc.) and/or 24-inches of clean soil material in accordance with DER-10. In either case exposures to routine end users would be mitigated, with the only remaining migration pathway being potential short term exposures due to dust inhalation and dermal contact by construction workers during deeper excavation (i.e., utility work) beneath the cover system.

## 7.2 Potential Ecological Exposure

The Site is a former storage facility located within a highly developed area of the City of Buffalo. The Site is predominantly covered with the existing building, asphalt, concrete and soil-vegetated area, which provide little or no wildlife habitat or food value, and/or access to the subsurface contamination. Remedial activities will be conducted in accordance with an approved Remedial Action Work Plan including CAMP and completion of Part 375 compliant cover system on the Site. Dust and erosion controls will be implemented, as necessary, during intrusive activities to mitigate potential short-term risks.

As such, no unacceptable ecological risks are anticipated under the reasonably anticipated future use scenario.

## 7.3 Potential Off-Site Exposure

The Site is located in a highly developed areas of the City of Buffalo. Soil/fill within the vicinity of the Site is expected to be of similar intermingled fill material, present beneath existing roadways, buildings and associated parking lots, similar to what is found on-Site. The Site is bound by municipal streets on two (2) sides, and any exposure would be assumed to be limited to construction work (e.g. utility work), with a large asphalt parking lot present along the southern boundary (bus garage facility). Off-site migration from on-Site soil contaminants is not considered a potential off-site exposure pathway.

Low-level cVOCs were detected in the groundwater, however; exposure to off-site groundwater would be limited to deep excavations (greater than 15 feet) which is highly unlikely. It should be noted that degraded cVOCs were detected in the upgradient well

(MW-5) located in the eastern portion of the Site, potentially indicating an off-site source of the groundwater contamination.

No off-site ecological exposure is considered relevant based on the surrounding urban surface cover, and no access to underlying groundwater surrounding the Site.

## 8.0 REMEDIAL ALTERNATIVES ANALYSIS

This section provides an analysis of the selected remedial approach by media using the Remedy Selection Evaluation Criteria identified in Section 4.2 of Guidance Document DER-10: Technical Guidance for Site Investigation and Remediation. In accordance with DER-10 Section 4.4(d)2, in addition to a “no action” baseline alternative, the following three alternatives are developed and assessed for each BCP Site based on NYSDEC-defined cleanup tracks as follows:

Track 1, 6 New York Codes, Rules and Regulations (6NYCRR) Part 375-3.8(e)(1) requires site media to meet Part 375 SCOs that will allow the site to be used for any purpose without restrictions on the use of the site (i.e., unrestricted use). The soil cleanup must achieve the unrestricted use criteria at any depth above bedrock. Details and evaluation of the Track 1 alternative are described below.

Track 2, 6NYCRR Part 375-3.8(e)(2) requires site media to meet Part 375 restricted use SCOs that are consistent with the end use. For the Site, the Track 2 cleanup must achieve the Residential Use SCOs to a depth of 15 fbs. For Track 2 remedies, restrictions can be placed on the use of the property in the form of institutional and engineering controls, and future use and development will be completed in accordance with the environmental easement and site management plan. Details and evaluation of the of the Track 2 cleanup are described below.

Track 4, 6NYCRR Part 375-3.8(e)(4) soil cleanups use site-specific information to identify site-specific SCOs that are protective of public health and the environment under a restricted use scenario. For Track 4 remedies, restrictions can be placed on the use of the property in the form of institutional and engineering controls if they can be realistically implemented and maintained in a reliable and enforceable manner. As set forth in 6 NYCRR Part 375-3.8(e)(4)(iii)(b)(1), the top two (2) feet of all exposed surface soils, not otherwise covered by the components of the development of the site (e.g., buildings, pavement), shall not exceed the restricted use (Restricted Residential Use) SCOs. Areas that exceed these SCOs must be covered by material meeting the requirements of the generic soil cleanup table contained in Part 375-6.7(d) and/or DER-10, Appendix 5 for imported material, for the applicable future site use (i.e., Restricted Residential).

Based on the findings of the RI and IRMs, low-level cVOC impacted groundwater does exist in the vicinity of MW-4, with total cVOCs concentration significantly less than 1 ppm (see Table 4). Wells located upgradient of the existing building, MW-1 and MW-2, had no exceedances of VOC GWQS. Additionally, no cVOCs were detected in subslab air samples from beneath the existing building, and no elevated cVOCs were detected in on-Site soils, including post-excavation samples from the UST IRM, adjacent to MW-4. As such, no on-Site source of the cVOC groundwater contamination has been found.

Supplemental assessment of low-level cVOC groundwater impacts in the vicinity of MW-4 will be completed as part of the remedial work, including additional groundwater sampling and well installation. If the results of the supplemental groundwater assessment indicate remediation is required, details for in-Situ groundwater treatment in the vicinity of MW-4 will be provided to the Department for review and approval. Details of the supplemental assessment will be provided in the Remedial Action Work plan.

## 8.1 Remedial Action Objectives

The development of an appropriate remedial approach begins with definition of site-specific Remedial Action Objectives (RAOs) to address substantial public health and significant environmental issues identified during remedial investigations. In developing the RAOs, consideration is given to the reasonably anticipated future use of the Property (i.e., commercial) and the applicable SCGs.

Per DER-10, generic RAOs appropriate for the Site include:

### 8.1.1 Soil/Fill RAOs

- Prevent ingestion of and/or direct contact with contaminated soil/fill.
- Prevent migration of contaminants that would result in groundwater and/or surface water contamination.

### 8.1.2 Groundwater RAOs

- Prevent ingestion of groundwater with contaminant levels exceeding drinking water standards.



- Prevent ingestion of and/or direct contact with groundwater containing contaminant levels exceeding SCGs.

### **8.1.3 Soil Vapor RAOs**

- Mitigate impacts to public health resulting from existing, or the potential for, soil vapor intrusion into buildings at a site.

## **8.2 Evaluation of Alternatives**

In addition to achieving the RAOs, NYSDEC's Brownfield Cleanup Program calls for remedy evaluation in accordance with Part 375-1.8(f) and DER-10 Technical Guidance for Site Investigation and Remediation. Specifically, the guidance states "When proposing an appropriate remedy, the person responsible for conducting the investigation and/or remediation should identify and develop a remedial action that is based on the following criteria..."

- **Overall Protection of Public Health and the Environment** – This criterion is an evaluation of the remedy's ability to protect public health and the environment, assessing how risks posed through each existing or potential pathway of exposure are eliminated, reduced, or controlled through removal, treatment, engineering controls, or institutional controls.
- **Compliance with Standards, Criteria, and Guidance (SCGs)** – Compliance with SCGs addresses whether a remedy will meet applicable environmental laws, regulations, standards, and guidance.
- **Long-Term Effectiveness and Permanence** – This criterion evaluates the long-term effectiveness of the remedy after implementation. If wastes or treated residuals remain on-site after the selected remedy has been implemented, the following items are evaluated: (i) the magnitude of the remaining risks (i.e., will there be any significant threats, exposure pathways, or risks to the community and environment from the remaining wastes or treated residuals), (ii) the adequacy of the engineering and institutional controls intended to limit the risk, (iii) the reliability of these controls, and (iv) the ability of the remedy to continue to meet RAOs in the future.
- **Reduction of Toxicity, Mobility or Volume with Treatment** – This criterion evaluates the remedy's ability to reduce the toxicity, mobility, or volume of Site

contamination. Preference is given to remedies that permanently and significantly reduce the toxicity, mobility, or volume of the wastes at the Site.

- **Short-Term Effectiveness** – Short-term effectiveness is an evaluation of the potential short-term adverse impacts and risks of the remedy upon the community, the workers, and the environment during construction and/or implementation. This includes a discussion of how the identified adverse impacts and health risks to the community or workers at the Site will be controlled, and the effectiveness of the controls. This criterion also includes a discussion of engineering controls that will be used to mitigate short term impacts (i.e., dust control measures), and an estimate of the length of time needed to achieve the remedial objectives.
- **Implementation** – The implementation criterion evaluates the technical and administrative feasibility of implementing the remedy. Technical feasibility includes the difficulties associated with the construction and the ability to monitor the effectiveness of the remedy. For administrative feasibility, the availability of the necessary personnel and material is evaluated along with potential difficulties in obtaining specific operating approvals, access for construction, etc.
- **Cost** – Capital, operation, maintenance, and monitoring costs are estimated for the remedy and presented on a present worth basis, where applicable.
- **Community Acceptance** – This criterion evaluates the public's comments, concerns, and overall perception of the remedy.
- **Land Use** – This criterion includes the Department's determination of reasonable certainty of the use; and the evaluation of the reasonably anticipated future use of the site.

### 8.3 Anticipated Future Land Use Evaluation

In developing and screening remedial alternatives, NYSDEC's Part 375 regulations require that the reasonableness of the anticipated future land be factored into the evaluation. The regulations identify 16 criteria that must be considered. These criteria and the resultant outcome for the Main & East Balcom Site are presented below.

1. *Current use and historical and/or recent development patterns:* The Site was historically used for various commercial operations, including an automobile service and filling station, storage and warehousing, and trucking. The Site is located in a historically residential-commercial area of the City of Buffalo. According to the Buffalo Green Code, the Site is classified as Urban Center (N-2). Urban Center areas are described

as mixed-use neighborhood centers composed primarily of commercial block structures. The Site is identified as N-2C – Mixed-Use Center and N-2E – Mixed-Use Edge. The planned redevelopment includes the construction of a mixed-use residential/commercial space improved with residential units and commercial retail use on the ground floor. **Accordingly, planned redevelopment would be consistent with historic and recent development patterns.**

2. *Applicable zoning laws and maps:* The Site is located in an area of the City of Buffalo zoned for mixed use commercial residential area. **Residential/ commercial use is consistent with current zoning (Buffalo Green Code).**
3. *Brownfield opportunity areas as designated set forth in GML 970-r:* The Brownfield Opportunity Area (BOA) Program provides municipalities and community based organizations with assistance to complete revitalization plans and implementation strategies for areas or communities affected by the presence of brownfield sites, and site assessments for strategic sites. **The subject property does not lie within a BOA.**
4. *Applicable comprehensive community master plans, local waterfront revitalization plans as provided for in EL article 42, or any other applicable land use plan formally adopted by a municipality:* The Main & East Balcom Site falls within the N-2C Zone indicating a mixed use center neighborhood in the 2014 Buffalo Green Code **Redevelopment is consistent with the Buffalo Green Code and will not require rezoning or change in use.**
5. *Proximity to real property currently used for residential use, and to urban, commercial, industrial, agricultural and recreational areas:* Residential properties are located adjacent to site, including east along East Balcom Street, with commercial use to the north, south and west. **Nearby and adjacent properties are mixed use, including residential and commercial. The proposed redevelopment does not change the previous land use for the Site and is consistent with local zoning and development plans.**
6. *Any written and oral comments submitted by members of the public on the proposed use as part of the activities performed pursuant to the citizen participation plan:* **No comments have been received from the public to date.**
7. *Environmental justice concerns, which include the extent to which the proposed use may reasonably be expected to cause or increase a disproportionate burden on the community in which the site is located, including low-income minority communities, or to result in a disproportionate concentration of commercial or industrial uses in what has historically been a mixed use or residential community:* **Nearby and adjacent property is currently a mixed-use commercial and**

**residential capacity. Redeveloping the Site in a commercial-residential capacity does not pose environmental justice issues.**

8. *Federal or State land use designations:* The property is designated by Erie County as Mixed land use. **Redevelopment is consistent with the current land use designation.**
9. *Population growth patterns and projections:* The City of Buffalo, encompassing approximately 40.38 square miles, has a population of 256,902 (2016 estimate - US Census Bureau), a decrease of 1.7 percent from the 2010 census. **Redevelopment is consistent with the past use and would not have impact on residential capacity.**
10. *Accessibility to existing infrastructure:* Access to the Site is from Main Street and East Balcom Street. Utilities (sewer, water, electric) are present around the Site along Main Street and East Balcom Street. **Existing infrastructure supports planned reuse.**
11. *Proximity of the site to important cultural resources, including federal or State historic or heritage sites or Native American religious sites.* **No such resources or sites are known to be present on or adjacent to the Site.**
12. *Natural resources, including proximity of the site to important federal, State or local natural resources, including waterways, wildlife refuges, wetlands, or critical habitats of endangered or threatened species:* No State or Federal wetlands exist on the Site. Scajaquada Creek is located approximately 0.4 miles north of the Site. The nearest NYS regulated wetland (BU-3) is located approximately 3.3-miles to the south. **The absence of significant ecological resources on or adjacent to the Site indicates that cleanup to restricted-residential use conditions will not pose an ecological threat.**
13. *Potential vulnerability of groundwater to contamination that might emanate from the site, including proximity to wellhead protection and groundwater recharge areas and other areas identified by the Department and the State's comprehensive groundwater remediation and protection program established set forth in ECL article 15 title 31:* There are no groundwater supply well(s) present on the Site or noted in the vicinity of the Site. Regionally, groundwater has not been extracted for industrial, commercial agriculture, or public supply purposes. Potable water service is provided by the local municipal water authority. No bulk chemical or petroleum storage is proposed under the current redevelopment plan that might threaten groundwater quality from releases. **The absence of groundwater use and wellhead protection, and the planned restricted residential reuse will not pose a threat to groundwater.**

14. *Proximity to flood plains:* The Erie County Internet Mapping System indicates that the Scajaquada Creek is located approximately 0.4-miles north of the Site, which is a designated flood zone. No flood zones are present on the property, and therefore there is a low risk of erosion due to flooding. **As such, the planned remediation and redevelopment of the Site, which includes cleanup to restricted residential use standards, does not pose a threat to surface water.**
15. *Geography and geology:* The Site is located within the Lake Erie-Niagara River major drainage basin, which is typified by little topographic relief, except in the immediate vicinity of major drainage ways. Surface soils within the vicinity of the Site are described as Urban Land (Ud) by the USDA Erie County Soil Map, and further described as Urban Land (Ud) by the Erie County GIS. The presence of overburden fill material is widespread and common throughout the City of Buffalo. Previous development patterns covered the Site in asphalt, concrete and building foundations. **The redevelopment plan is consistent with the geography and geology of the Site.**
16. *Current institutional controls applicable to the site:* **No institutional controls are currently present that would affect redevelopment options.**

Based on the above analysis, planned reuse of the Site is consistent with past, current and contemplated development and zoning on and around the Site, and does not pose additional environmental or human health risk.

## 8.4 Evaluation of Remedial Alternatives

In addition to the evaluation of the alternatives to remediate the Site to the likely end use, NYSDEC regulations and policy calls for evaluation of more restrictive end-use scenarios. These include an Unrestricted Use scenario (considered under 6NYCRR Part 375 to be representative of cleanup to pre-disposal conditions), and a scenario less restrictive than the reasonably anticipated future use. Per NYSDEC DER-10 Technical Guidance for Site Investigation and Remediation, evaluation of a “no action” alternative is also required to provide a baseline for comparison against other alternatives. The alternatives evaluated below in greater detail include:

- Alternative 1 - No Further Action (Completed IRMs);

- Alternative 2 – Track 1 Unrestricted Use Cleanup;
- Alternative 3 - Track 2 Residential Use Cleanup; and,
- Alternative 4 - Track 4 Restricted Residential Use Cleanup

#### ***8.4.1 Alternative 1 - No Further Action (Completed IRMs)***

Under this alternative, the Site would remain in its current state, with no additional controls in-place, beyond the completed IRMs. The completed IRMs on the Main & East Balcom Street Site achieved RAOs, however, remaining on-Site soil/ fill above RRSCOs is still present on-Site.

***Overall Protection of Public Health and the Environment*** – The Main and East Balcom Site is not protective of human health and the environment, based on the presence of the soil/fill exceeding CSCOs at surface, and the absence of institutional controls to prevent more restrictive forms of future Site use (e.g., unrestricted use). Uncontrolled access to the Site could lead to potential exposure to impacted soil/fill during intrusive work performed at the Site and workers who are unaware or untrained regarding the contamination.

Accordingly, no further action is not protective of public health and does not satisfy the RAOs.

***Compliance with SCGs*** – The no further action alternative would not make the Site compliant with SCGs. Based on the results of the RI and IRMs, on-Site constituents detected in the soil/fill and groundwater exceeds the applicable SCOs and GWQS.

***Long-Term Effectiveness and Permanence*** – Based on the findings of the RI and IRMs, the no further action alternative does not provide long-term effectiveness or permanence, and does not achieve the RAOs.

***Reduction of Toxicity, Mobility, or Volume with Treatment*** – The no further action alternative does not reduce the toxicity, mobility, or volume of contamination beyond



natural degradation/attenuation, and therefore this alternative is not protective of public health and does not satisfy the RAOs.

***Short-Term Effectiveness*** – There would be short-term adverse impacts and risks to the community, workers, or the environment attributable to implementation of the no further action alternative, if the cover system and/or restrictions were not placed on the Site.

***Implementation*** – No technical or administrative implementation issues are associated with this alternative.

***Cost*** – The capital cost of the IRMs completed was approximately \$100,000 (see Table 9). There would be no capital or long-term operation, maintenance, or monitoring costs associated with the no further action alternative.

***Community Acceptance*** – Community acceptance will be evaluated based on comments to be received from the public in response to Fact Sheets and other planned Citizen Participation activities. Recent development patterns in the vicinity of the Site, would likely make the No Further Action alternative not acceptable to the community.

#### ***8.4.2 Alternative 2 – Track 1 Unrestricted Use Cleanup***

An Unrestricted Use alternative would necessitate remediation of all soil/fill where concentrations exceed the 6NYCRR Part 375 Unrestricted Use SCOs (see Tables 2 and 3). For Unrestricted Use scenario, excavation and off-site disposal of impacted soil/fill is generally regarded as the most applicable remedial measure, because institutional controls cannot be used to supplement the remedy. As such, the Unrestricted Use alternative assumes that those areas which exceed Unrestricted Use SCOs would be excavated and disposed at an off-Site commercial solid waste landfill.

Exceedances of the USCOS were detected to a sample depth of 9 fbs, though exceedances are related to the presence of fill material that ranged in depth from 2 to 12 fbs. As such, the Unrestricted Use cleanup alternative average depth of 8 ft was used in

this evaluation. Additionally, soil exceeding USCOs is located beneath the existing building that would be required to be removed under this alternative.

In total, approximately 11,650 CY of soil/fill would require excavation and off-site disposal; and equivalent backfill.

***Overall Protection of Public Health and the Environment*** – Excavation and off-site disposal to achieve Unrestricted Use SCO's would be protective of public health under any reuse scenario. However, this alternative would permanently use and displace valuable landfill airspace, causing ancillary environmental issues due to reduced landfill capacity, and would require excavating, transporting, and placing a similar volume of clean soil from an off-site borrow source to backfill the excavation, also contributing to significant detrimental off-site environmental issues.

***Compliance with SCGs*** – The Unrestricted Use alternative would be performed in accordance with applicable, relevant, and appropriate standards, guidance, and criteria. Excavation of soil to achieve Unrestricted Use SCO's would satisfy this criterion.

***Long-Term Effectiveness and Permanence*** – The Unrestricted Use alternative would achieve removal of all residual impacted soil/fill; therefore, the Unrestricted Use alternative would provide long-term effectiveness and permanence. Post-remedial monitoring and certifications would not be required.

***Reduction of Toxicity, Mobility, or Volume with Treatment*** – Through removal of all impacted soil/fill, the Unrestricted Use alternative would permanently and significantly reduce the toxicity, mobility, and volume of on-Site contamination.

***Short-Term Effectiveness*** – The principal advantage of a large-scale excavation to achieve Unrestricted Use SCO's is reliability of effectiveness in the long-term. The short-term adverse impacts and risks to the community, workers, and environment during implementation of this alternative are significant.

There are several potential short-term impacts associated with this alternative.



- There is potential for impacts to human health (workers and construction personnel) due to direct contact with impacted soil and particulate releases. This alternative would require implementation of a health and safety plan (HASP) and community air monitoring, as outlined in the NYSDOH Generic Community Air Monitoring Plan (CAMP), in order to mitigate potential adverse conditions/short-term impacts. Additional health and safety measures would need to be employed during excavation activities within the building and under the building slab. Moreover, significant physical hazards may be encountered due to structural limitations associated with deep excavation and the proximity of adjacent buildings, utilities and roadways.
- Human health and the environment associated with chemical exposures would be protected under this alternative if the HASP and CAMP are properly implemented. This alternative is expected to meet RAOs at completion of the excavations, because the impacted soil will be removed from the Site. Confirmatory soil sampling would be performed.

This alternative would significantly increase the duration of time community, workers, and the environment is exposed to on-Site contamination and potential for off-site exposures during remediation.

**Implementation** – Significant technical and administrative implementation issues would be encountered in completion of the Unrestricted Use alternative. Technical implementation issues include, but are not limited to: shoring/stabilizing excavation sidewalls to prevent sloughing during the excavation; groundwater and/or storm water handling, treatment and/or discharge/disposal; and traffic coordination for trucks entering and exiting the Site, staging of trucks, and multiple landfill and backfill sources required for the project. As such the feasibility of achieving an Unrestricted Use cleanup is questionable.

Administrative implementation issues may include: the need to coordinate and secure disposal contracts with numerous permitted off-site landfills as a single location would not be able to be relied upon to accept the volume of soil/fill generated under this alternative; difficulty locating local borrow sources for such a large volume of backfill; and the need for rezoning of the area to allow for Unrestricted Uses (e.g., farming, livestock, single-family

residential), which are not consistent with current surrounding land-use or the reasonably anticipated future use the Site.

**Cost** – The capital cost of implementing an Unrestricted Use cleanup alternative is estimated at \$2.6 MM (see Table 9). Annual certification costs would not be incurred.

**Community Acceptance** – Community acceptance will be evaluated based on comments to be received from the public in response to Fact Sheets and other planned Citizen Participation activities.

#### ***8.4.3 Alternative 3 – Track 2 Residential Use Cleanup***

Under this alternative, the Site would be required to achieve 6NYCRR Part 375 Residential Use SCOs without the use of a cover system to limit potential exposure to subsurface contaminant; therefore, the Track 2 alternative in general would include: excavation and off-Site disposal of soil/fill exceeding RSCOs.

Based on the historic and RI investigation findings, soil/fill exceeding RSCOs is present on-Site, ranging in depth from 0-12 fbgs, with the average depth of 8 fbgs.

Though soils exceeding RSCOs are present beneath the building, this alternative does include removal of those soils. Fill material would be removed from accessible areas of the Site to 15 fbgs, with an average depth of 8 fbgs used in this evaluation.

Approximately 7,500 CY would be removed from the Site for this alternative. For Track 2 remedies, restrictions can be placed on the use of the property in the form of institutional and engineering controls, and future use and development will be completed in accordance with the environmental easement and site management plan.

**Overall Protection of Public Health and the Environment** – This alternative would satisfy the NYSDEC requirements for a Track 2 cleanup under the BCP regulations and would be protective of public health and the environment. The RAOs for the Site would be satisfied through the planned extent of remedial activities, including: removal and off-site disposal of targeted soil/fill exceeding RSCOs; and, the use of IC/ECs to limit the future use to restricted residential purposes.

**Compliance with SCGs** – The planned remedial activities would need to be performed in accordance with applicable, relevant, and appropriate SCGs. Imported backfill material would need to meet backfill quality criteria per DER-10. Subgrade intrusive activities would necessitate preparation of and adherence to a community air monitoring plan in accordance with Appendices 1A and 1B of DER-10. The planned remedial actions are fully protective of public health and the environment, and achieve all RAOs for the Site.

***Long-Term Effectiveness and Permanence*** – Completion of this remedial alternative would provide for long-term effectiveness and permanence. The SMP will include: a Site-wide inspection program to assure that the IC/ECs placed on-Site have not been altered and remain effective. Furthermore, an Environmental Easement will be filed with Erie County, which will limit the future use of the Site to restricted residential or commercial activity, restrict groundwater use, and reference the Department-approved SMP. As such, this alternative will provide long-term effectiveness and permanence.

***Reduction of Toxicity, Mobility, or Volume with Treatment*** – Through removal of soil/fill exceeding RRSCOs this criteria would be achieved. The Site Management Plan will include a Site-wide Inspection and Certification program to assure that the Institutional Controls placed on the Site have not been altered and remain effective. Accordingly, this alternative satisfies this criterion.

***Short-Term Effectiveness*** – – The principal advantage of a large-scale excavation to achieve Track 2 Residential Use SCOs is reliability of effectiveness in the long-term. However, similar to achieving an Unrestricted Use cleanup, the short-term adverse impacts and risks to the community, workers, and environment during implementation of this alternative are significant.

There are several potential short-term impacts associated with this alternative.

- There is potential for impacts to human health (workers and construction personnel) due to direct contact with impacted soil and particulate releases. This alternative would require implementation of a health and safety plan (HASP) and community air monitoring, as outlined in the NYSDOH Generic Community Air Monitoring Plan (CAMP), in order to mitigate potential adverse

conditions/short-term impacts. Significant physical hazards may be encountered due to structural limitations associated with deep excavation and the proximity of adjacent buildings, utilities and roadways.

- Human health and the environment associated with chemical exposures would be protected under this alternative if the HASP and CAMP are properly implemented. This alternative is expected to meet RAOs at completion of the excavations, because the impacted soil will be removed from the Site. Confirmatory soil sampling would be performed.

This alternative would significantly increase the duration of time community, workers, and the environment is exposed to on-Site contamination and potential for off-site exposures during remediation.

**Implementation** – Technical implementation would be a barrier to construction of this alternative. The Site is planned for mixed use residential and commercial redevelopment with buildings and surface parking areas, with limited greenspace. As a Track 2 cleanup does not allow for the use of a cover system, excavation and off-site disposal of the over 12,000 tons of contaminated soil/fill would be required.

Given the location of the Site, and the required number of dump trucks for disposal and backfill the staging and access to the Site would likely impact neighboring residential streets/communities. The additional cleanup required to achieve Track 2 is consider a significant implementation issue. Therefore, implementation of the Track 2 alternative is not considered reasonable given the current and anticipated future use of the Site.

**Cost** – The capital cost of implementing a Track 2 Residential Use alternative is estimated at \$1.75 MM (see Table 10).

**Community Acceptance** – Community acceptance will be evaluated based on comments to be received from the public in response to Fact Sheets and other planned Citizen Participation activities.

#### ***8.4.4 Alternative 4 – Track 4 Restricted Residential Use Cleanup***

Under this alternative, the Site would be cleaned up to achieve a Track 4 Restricted Residential Use Cleanup. For Track 4 remedies, restrictions can be placed on the use of the property in the form of IC/ECs if they can be realistically implemented and maintained in a reliable and enforceable manner. For restricted-residential use, the top two feet of all exposed soils that are not otherwise covered by the components of the development of the site (e.g. buildings, pavement) cannot exceed the restricted-residential SCO. Areas that exceed the RRSCOs must be covered by material meeting the requirements of the generic soil cleanup table contained in 6NYCRR Part 375-6.7(d) for restricted-residential future Site use.

Figure 7 identifies the planned remedial measures necessary to achieve a Track 4 RRSCO cleanup. Table 11 provides a cost estimate to complete this alternative.

This alternative's remedial measures would include:

- **Confirmatory building SVI;**
- **MW-4 cVOC groundwater assessment and in-Situ remediation (if necessary).**
- **Excavation and offsite disposal of soil/fill exceeding RRSCOs** for metals in the vicinity of TP-3 to approximately 9 fbg;
- **Remediation of nuisance petroleum** impacted soil-fill in the vicinity of TP-14;
- **Excavation and off-site disposal of fill materials** not suitable for on-Site reuse generated during DER-10 cover construction;
- **Collection of post-excavation confirmatory samples;**
- **Placement of Cover System** including demarcation layer underlying DER-10 acceptable backfill in areas without hardscape (building, asphalt and concrete) to address remaining contamination above RRSCOs.
- **Implementation of a Site Management Plan (SMP).** The SMP will include:
  - **Institutional Controls and Engineering Controls (IC/EC)**  
Engineering controls include any physical barrier or method employed to actively or passively contain, stabilize, or monitor contaminants; restrict the movement of contaminants; or eliminate potential exposure pathways to contaminants. Institutional controls at the site will include groundwater use restrictions and use restrictions of the Site to restricted residential use.

- **Excavation Work Plan** to assure that future intrusive activities and soil/fill handling at the Site are completed in a safe and environmentally responsible manner;
- **Site Monitoring Plan** that includes: provisions for a Site-wide inspection program to assure that the IC/ECs have not been altered and remain effective; and,
- **Environmental Easement** filed with Erie County.

During redevelopment, additional soil management to address excess fill from excavation activities, including DER-10 soil cover system, hardscape cover elements including asphalt and concrete areas and utilities, will require soil management in accordance with an approved SFMP. Accumulated redevelopment spoils will be characterized in accordance with DER-10, and reuse and/or disposal will be discussed with the Department. Details of the planned hardscape and soil cover areas will be provided in the Remedial Action Work Plan.

***Overall Protection of Public Health and the Environment*** – This alternative meets NYSDEC requirements for a Track 4 cleanup under the BCP regulations and is protective of public health and the environment. The RAOs for the Site would be satisfied through the planned extent of remedial activities, including: removal and off-site disposal of soil/fill exceeding CSCOs, placement of DER-10 compliant cover system, and the use of IC/ECs to prevent potential future exposure, and limit the future use to restricted residential purposes.

**Compliance with SCGs** – The planned remedial activities would need to be performed in accordance with applicable, relevant, and appropriate SCGs. Post-excavation samples would be collected to verify conformance with SCOs, and imported cover material would need to meet backfill criteria per DER-10.

Cover placement would be performed under the BCP and DER-10 and require an equivalent SFMP. Subgrade intrusive activities would necessitate adherence with the CAMP, in accordance with Appendices 1A and 1B of DER-10. The Site Management Plan will include: an Excavation Work Plan to address any impacted soil/fill encountered during post-development maintenance activities; and, a Site-wide Inspection program to assure that the

engineering and institutional controls placed on the Site have not been altered and remain effective.

The planned remedial activities for this alternative are fully protective of public health and the environment, and achieve RAOs for the Site.

***Long-Term Effectiveness and Permanence*** – Completion of the IRMs and planned remedial excavations, and construction of a soil cover system would prevent direct contact with soil/fill exceeding RRSCOs will provide long-term effectiveness and permanence.

The SMP will include appropriate plans, controls, and measures and an environmental easement to ensure the restricted use remedy is protective of human health and the environment. The SMP will be followed by the current Site owner as well as future Site owners. As such, this alternative will provide long-term effectiveness and permanence.

***Reduction of Toxicity, Mobility, or Volume with Treatment*** – Through the planned remedial measures described above, this criteria will be achieved. The Site Management Plan will include an Excavation Work Plan to address any residual material encountered during post-development maintenance activities and a Site-wide Inspection and Certification program to assure that the Engineering and Institutional Controls placed on the Site have not been altered and remain effective. Accordingly, this alternative satisfies this criterion.

***Short-Term Effectiveness*** – The short-term adverse impacts and risks to the community, workers, and environment during implementation of this Restricted Residential Use alternative are not considered significant and are controllable.

During intrusive remedial activities air monitoring will be performed to assure conformance with community air monitoring action levels. Planned remedial activities will be performed in accordance with an approved work plan, including HASP, CAMP, and SFMP. This alternative achieves the RAOs for the Site.

***Implementation*** – No technical or action-specific administrative implementable issues are associated with the Track 4 Restricted Residential Use Cleanup alternative.



**Cost** – The capital cost of implementing a Track 4 RRSCO cleanup alternative is estimated at \$1.03 MM (see Table 11).

**Community Acceptance** – Community acceptance will be evaluated based on comments to be received from the public in response to Fact Sheets and other planned Citizen Participation activities.

## 8.5 Comparison of Remedial Alternatives

The previous section describes and evaluates the remedial alternatives for the Main & East Balcom Site against the screening criteria. Table 12 provides a comparison of the remedial alternatives to the screening criteria to identify appropriate remedial measures that will achieve the RAOs for the Site.

Overall, the Track 4 Restricted Residential Use cleanup alternative will achieve the goals of the remediation, with limited short-term impacts to the surrounding neighborhoods, be implemented in accordance with the requirements in the most cost effective manner, and is consistent with the surrounding land use of the Site.

## 8.6 Recommended Remedial Measure

Based on the alternatives evaluation, as described above, the proposed remedial approach for the Site is a Track 4 Restricted Residential Use Cleanup. A Track 4 Restricted Residential Use cleanup would be fully protective of public health and the environment, is significantly less disruptive to the surrounding community, is consistent with current and future land use, and represents a cost-effective approach that fully satisfies the RAOs for the Site.

The components and details of the remedial approach will be more fully described in a Remedial Action Work Plan to be submitted to the Department for approval. In summary, this alternative would involve:

- **Completed IRMs**, including: the removal of the interior basement AST, the removal of the exterior UST and the associated petroleum impacted soil-fill;
- **Confirmatory building SVI**;



- **MW-4 cVOC groundwater assessment and in-Situ remediation (if necessary).**
- **Excavation and offsite disposal of soil/fill exceeding RRSCOs** for metals in the vicinity of TP-3 to approximately 9 fbgs;
- **Remediation of nuisance petroleum** impacted soil-fill in the vicinity of TP14;
- **Excavation and off-site disposal of fill materials** not suitable for on-Site reuse generated during DER-10 cover construction
- **Collection of post-excavation confirmatory samples**, in accordance with DER-10.
- **Placement of Cover System** including demarcation layer underlying DER-10 acceptable cover soil in areas without hardscape (building, asphalt and concrete) to address remaining contamination above RRSCOs.
- **Implementation of a Site Management Plan (SMP).** The SMP will include:
  - **Institutional Controls and Engineering Controls (IC/EC)**  
Engineering controls include any physical barrier or method employed to actively or passively contain, stabilize, or monitor contaminants; restrict the movement of contaminants; or eliminate potential exposure pathways to contaminants. Institutional controls at the site will include groundwater use restrictions and use restrictions of the Site to restricted residential use.
  - **Excavation Work Plan** to assure that future intrusive activities and soil/fill handling at the Site are completed in a safe and environmentally responsible manner;
  - **Site Monitoring Plan** that includes: provisions for a Site-wide inspection program to assure that the IC/ECs have not been altered and remain effective; and,
  - **Environmental Easement** filed with Erie County.

## 9.0 RI/IRM/AAR SUMMARY AND CONCLUSIONS

Based on the data and analyses presented in the preceding sections, we offer the following summary and conclusions:

- Based on the RI soil data, certain PAHs and metals were detected above their respective Restricted Residential and/or Commercial Use SCOs. All VOCs, PCBs, pesticides, and herbicides were detected below their respective USCOS.
- Based on the groundwater data, the vast majority of analytes were detected below GWQS. VOCs were detected above GWQS in two sample locations, certain pesticides and three naturally occurring metals were detected above GWQS. No PCBs or herbicides were detected above GWQS.
- Post-excavation confirmatory samples and screening of the completed IRMs on the Site have achieved a Part 375 RRSCOs cleanup. The completed IRMs included removal and disposal of the interior AST, removal and disposal of the exterior UST, excavation and off-site disposal of non-hazardous petroleum impacted soil/fill.
- Given the nature and extent of contamination present in soil/fill and groundwater, and the intended reuse of the Site, the evaluation of remedial alternatives selected a Restricted Residential Use (Track 4) Cleanup that is fully protective of public health and the environment.

## 10.0 REFERENCES

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5. TurnKey Environmental Restoration, LLC. *Limited Phase II Environmental Investigation Report, 1661 Main Street, Buffalo, New York*. April 2015.
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## TABLES



TABLE 1

SUMMARY OR SAMPLING ANALYSIS PROGRAM

REMEDIAL INVESTIGATION / INTERIM REMEDIAL MEASURES / ALTERNATIVE ANALYSIS REPORT  
MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)  
BUFFALO, NEW YORK

| Date                     | Remedial Investigation Location | Sample Interval (ft) | Project Phase          | Full List VOCs <sup>1</sup> | TCL SVOCs | TAL Metals | PCBs | Pesticides | Herbicides | Notes     |
|--------------------------|---------------------------------|----------------------|------------------------|-----------------------------|-----------|------------|------|------------|------------|-----------|
| <b>Soil/Fill Samples</b> |                                 |                      |                        |                             |           |            |      |            |            |           |
| 12/10/2016               | TP-1                            | (1-4)                | Supp. Phase II         | 1                           | 1         | 1          |      |            |            |           |
| 12/10/2016               | TP-2                            | (1-3)                | Supp. Phase II         |                             | 1         | 1          |      |            |            |           |
| 12/10/2016               | TP-3                            | (1-6)                | Supp. Phase II         |                             | 1         | 1          |      |            |            |           |
| 12/10/2016               | TP-4                            | (1-4)                | Supp. Phase II         |                             | 1         | 1          |      |            |            |           |
| 12/10/2016               | TP-8                            | (1-3)                | Supp. Phase II         |                             | 1         | 1          |      |            |            |           |
| 12/10/2016               | TP-9                            | (3-6)                | Supp. Phase II         |                             | 1         | 1          |      |            |            |           |
| 12/10/2016               | TP-10                           | (10-11)              | Supp. Phase II         | 1                           | 1         | 1          |      |            |            |           |
| 7/18/2017                | NS-1                            | (0-2)                | RI                     |                             | 1         | 1          |      |            |            |           |
| 7/18/2017                | NS-2                            | (0-2)                | RI                     |                             | 1         | 1          |      |            |            |           |
| 7/18/2017                | NS-3                            | (0-2)                | RI                     | 1                           | 1         | 1          | 1    | 1          | 1          |           |
| 7/18/2017                | NS-4                            | (0-2)                | RI                     |                             | 1         | 1          | 1    |            |            |           |
| 7/18/2017                | TP-11                           | (4-5)                | RI                     |                             | 1         | 1          |      |            |            |           |
| 7/18/2017                | TP-12                           | (4.5-6.5)            | RI                     |                             | 1         | 1          | 1    |            |            |           |
| 7/18/2017                | TP-13                           | (4-9)                | RI                     | 1                           | 1         | 1          |      |            |            |           |
| 7/18/2017                | TP-14                           | (9-11)               | RI                     | 1                           | 1         | 1          | 1    | 1          | 1          | MS/MSD    |
| 7/18/2017                | TP-15                           | (1.5-3.5)            | RI                     | 1                           | 1         | 1          |      |            |            |           |
| 7/18/2017                | TP-16                           | (0-2)                | RI                     |                             | 1         | 1          | 1    |            |            |           |
| 7/18/2017                | TP-18                           | (6-9)                | RI                     | 1                           | 1         | 1          | 1    | 1          | 1          | Blind Dup |
| 9/18/2017                | MW-1                            | (16-18)              | RI                     | 1                           | 1         | 1          | 1    |            |            |           |
| 9/18/2017                | MW-2                            | (18-20)              | RI                     |                             | 1         | 1          | 1    |            |            |           |
| 9/19/2017                | MW-3                            | (18-20)              | RI                     | 1                           | 1         | 1          | 1    | 1          | 1          | Blind Dup |
| 11/13/2017               | MW-4                            | (8-10)               | RI                     | 1                           | 1         | 1          |      |            |            |           |
| 2/8/2018                 | MW-5                            | (20-24)              | RI                     | 1                           | 1         | 1          |      |            |            |           |
| 10/24/2017               | BOTTOM-1                        | (15)                 | IRM (UST Area)         | 1                           | 1         |            |      |            |            |           |
| 10/24/2017               | SW-1                            | (13-15)              | IRM (UST Area)         | 1                           | 1         |            |      |            |            |           |
| 10/24/2017               | SW-2                            | (7-9)                | IRM (UST Area)         | 1                           | 1         |            |      |            |            |           |
| 10/24/2017               | SW-3                            | (7-9)                | IRM (UST Area)         | 1                           | 1         |            |      |            |            |           |
| 10/24/2017               | SW-4                            | (7-9)                | IRM (UST Area)         | 1                           | 1         |            |      |            |            |           |
| 10/24/2017               | SW-5                            | (9-11)               | IRM (UST Area)         | 1                           | 1         |            |      |            |            |           |
| 10/24/2017               | SW-6                            | (7-9)                | IRM (UST Area)         | 1                           | 1         |            |      |            |            |           |
| 10/25/2017               | B-2                             | (13)                 | IRM (Pump Island Area) | 1                           | 1         |            |      |            |            |           |
| 10/25/2017               | SW-1                            | (8-10)               | IRM (Pump Island Area) | 1                           | 1         |            |      |            |            |           |
| 10/25/2017               | SW-2                            | (8-10)               | IRM (Pump Island Area) | 1                           | 1         |            |      |            |            |           |



TABLE 1

SUMMARY OR SAMPLING ANALYSIS PROGRAM

REMEDIAL INVESTIGATION / INTERIM REMEDIAL MEASURES / ALTERNATIVE ANALYSIS REPORT  
MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)  
BUFFALO, NEW YORK

| Date                       | Remedial Investigation Location | Sample Interval (ft) | Project Phase           | Full List VOCs <sup>1</sup> | TCL SVOCs | TAL Metals | PCBs | Pesticides | Herbicides | Notes            |
|----------------------------|---------------------------------|----------------------|-------------------------|-----------------------------|-----------|------------|------|------------|------------|------------------|
| 10/25/2017                 | SW-3                            | (8-10)               | IRM (Pump Island Area)  | 1                           | 1         |            |      |            |            |                  |
| 10/25/2017                 | SW-4                            | (8-10)               | IRM (Pump Island Area)  | 1                           | 1         |            |      |            |            |                  |
| 11/13/2017                 | BSB-1                           | (1-2)                | IRM (Basement AST Area) | 1                           | 1         |            |      |            |            |                  |
| 11/13/2017                 | BSB-2                           | (4-5)                | IRM (Basement AST Area) | 1                           | 1         |            |      |            |            |                  |
| <b>Groundwater Samples</b> |                                 |                      |                         |                             |           |            |      |            |            |                  |
| 10/23/2017                 | MW-1                            | NA                   | RI                      | 1                           | 1         | 1          | 1    | 1          | 1          |                  |
| 10/23/2017                 | MW-2                            | NA                   | RI                      | 1                           | 1         | 1          | 1    | 1          | 1          |                  |
| 11/16/2017                 | MW-3                            | NA                   | RI                      | 1                           | 1         | 1          | 1    | 1          | 1          |                  |
| 2/11/2018                  | MW-3                            | NA                   | RI                      | 1                           |           |            |      |            |            |                  |
| 11/16/2017                 | MW-4                            | NA                   | RI                      | 1                           | 1         | 1          | 1    | 1          | 1          | MS/MSD Blind Dup |
| 2/11/2018                  | MW-4                            | NA                   | RI                      | 1                           |           |            |      |            |            |                  |
| 2/11/2018                  | MW-5                            | NA                   | RI                      | 1                           |           |            |      |            |            |                  |
| <b>Air Samples</b>         |                                 |                      |                         |                             |           |            |      |            |            |                  |
| 2/12/2018                  | SSV-1                           | NA                   | RI                      | 1                           |           |            |      |            |            | Blind Dup        |
| 2/12/2018                  | SSV-2                           | NA                   | RI                      | 1                           |           |            |      |            |            |                  |
| 2/12/2018                  | AMBIENT-1                       | NA                   | RI                      | 1                           |           |            |      |            |            |                  |
| 2/12/2018                  | AMBIENT-2                       | NA                   | RI                      | 1                           |           |            |      |            |            |                  |
| 2/12/2018                  | AMBIENT-3                       | NA                   | RI                      | 1                           |           |            |      |            |            |                  |
| 2/12/2018                  | OUTDOOR-1                       | NA                   | RI                      | 1                           |           |            |      |            |            |                  |

1. Full List VOCs includes TCL VOCs plus CP-51 List VOCs via Method 8260.

**Acronyms:**

VOCs = volatile organic compounds  
SVOCs = semi-volatile organic compounds  
TCL = Target Compound List  
TAL = Target Analyte List  
PCBs = Polychlorinated Biphenyls  
NA = Not Applicable



TABLE 2

SUMMARY OF HISTORIC SOIL ANALYTICAL RESULTS  
REMEDIAL INVESTIGATION/ INTERIM REMEDIAL MEASURES/ ALTERNATIVES ANALYSIS REPORT

MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)  
BUFFALO, NEW YORK

| PARAMETER <sup>1</sup>                                       | Unrestricted<br>Use SCOs <sup>2</sup> | Restricted<br>Residential<br>Use SCOs <sup>2</sup> | Commercial<br>Use SCOs <sup>2</sup> | Sample Location (depth) |                |                |                |                |                |                |                |                |                   |
|--|---------------------------------------|--|-------------------------------------|-------------------------|----------------|----------------|----------------|----------------|----------------|----------------|----------------|----------------|-------------------|
|  |                                       |  |                                     | SB-1<br>(2-4')          | SB-2<br>(0-2') | SB-3<br>(2-4') | TP-1<br>(1-4') | TP-2<br>(1-3') | TP-3<br>(1-6') | TP-4<br>(1-4') | TP-8<br>(1-3') | TP-9<br>(3-6') | TP-10<br>(10-11') |
|  |                                       |  |                                     | 3/23/2015               |                |                |                |                | 12/10/2015     |                |                |                |                   |
| Volatile Organic Compounds (VOCs) - mg/Kg <sup>3</sup>       |                                       |  |                                     |                         |                |                |                |                |                |                |                |                |                   |
| 1,2,4-Trimethylbenzene                                       | 3.6                                   | 47   | 190                                 | --                      | 0.4 D          | --             | ND             | --             | --             | --             | --             | --             | ND                |
| 1,3,5-Trimethylbenzene                                       | 8.4                                   | 52   | 190                                 | --                      | 0.096 D        | --             | ND             | --             | --             | --             | --             | --             | ND                |
| 4-Isopropyltoluene   | --                                    | --   | --                                  | --                      | ND             | --             | ND             | --             | --             | --             | --             | --             | ND                |
| Acetone  | 0.05                                  | 100  | 500                                 | --                      | ND             | --             | ND             | --             | --             | --             | --             | --             | ND                |
| Benzene  | 0.06                                  | 4.8  | 44                                  | --                      | 0.00058 J      | --             | ND             | --             | --             | --             | --             | --             | ND                |
| Chloroform   | 0.37                                  | 49   | 350                                 | --                      | ND             | --             | 0.00034 J      | --             | --             | --             | --             | --             | ND                |
| Ethylbenzene   | 1                                     | 41   | 390                                 | --                      | 0.093          | --             | ND             | --             | --             | --             | --             | --             | ND                |
| Isopropylbenzene (Cumene)                                    | --                                    | --   | --                                  | --                      | 0.066          | --             | ND             | --             | --             | --             | --             | --             | ND                |
| Methylene chloride   | 0.05                                  | 100  | 500                                 | --                      | ND             | --             | ND             | --             | --             | --             | --             | --             | ND                |
| n-Butylbenzene   | 12                                    | 100  | 500                                 | --                      | 0.14           | --             | ND             | --             | --             | --             | --             | --             | ND                |
| n-Propylbenzene  | 3.9                                   | 100  | 500                                 | --                      | 0.15           | --             | ND             | --             | --             | --             | --             | --             | ND                |
| p-Cymene (p-isopropyltoluene)                                | --                                    | --   | --                                  | --                      | 0.12           | --             | ND             | --             | --             | --             | --             | --             | ND                |
| sec-Butylbenzene   | 11                                    | 100  | 500                                 | --                      | 0.078          | --             | ND             | --             | --             | --             | --             | --             | ND                |
| Toluene  | 0.7                                   | 100  | 500                                 | --                      | 0.0023 J       | --             | ND             | --             | --             | --             | --             | --             | ND                |
| Total Xylenes  | 0.26                                  | 100  | 500                                 | --                      | 0.079 DJ       | --             | ND             | --             | --             | --             | --             | --             | ND                |
| Semi-Volatile Organic Compounds (SVOCs) - mg/Kg <sup>3</sup> |                                       |  |                                     |                         |                |                |                |                |                |                |                |                |                   |
| Acenaphthene   | 20                                    | 100  | 500                                 | 3                       | ND             | ND             | ND             | ND             | ND             | ND             | 0.18 J         | 0.16 J         | 1.1               |
| Acenaphthylene   | 100                                   | 100  | 500                                 | ND                      | ND             | ND             | ND             | ND             | ND             | ND             | 0.12 J         | ND             | ND                |
| Anthracene   | 100                                   | 100  | 500                                 | 1.4                     | ND             | ND             | ND             | ND             | ND             | ND             | 0.83 J         | 0.67 J         | 2.7               |
| Benzo(a)anthracene   | 1                                     | 1  | 5.6                                 | ND                      | ND             | ND             | ND             | ND             | ND             | 4.3 J          | 2.6            | 3.1            | 6.3               |
| Benzo(a)pyrene   | 1                                     | 1  | 1                                   | ND                      | ND             | ND             | ND             | ND             | ND             | 4.6 J          | 2.1            | 2              | 5.1               |
| Benzo(b)fluoranthene   | 1                                     | 1  | 5.6                                 | ND                      | ND             | ND             | ND             | ND             | ND             | 8.2 J          | 2.7            | 2.6 J          | 8.5               |
| Benzo(ghi)perylene   | 100                                   | 100  | 500                                 | ND                      | ND             | ND             | ND             | ND             | ND             | 3.8 J          | 1.5            | 1.5            | 4.2               |
| Benzo(k)fluoranthene   | 0.8                                   | 3.9  | 56                                  | ND                      | ND             | ND             | ND             | ND             | ND             | ND             | 1.1            | 1.7 J          | ND                |
| Bis(2-ethylhexyl) phthalate                                  | --                                    | --   | --                                  | ND                      | ND             | ND             | ND             | ND             | ND             | ND             | ND             | 0.5 J          | ND                |
| Carbazole  | --                                    | --   | --                                  | ND                      | ND             | ND             | ND             | ND             | ND             | ND             | 0.38 J         | 0.27 J         | 1.3               |
| Chrysene   | 1                                     | 3.9  | 56                                  | ND                      | ND             | ND             | ND             | ND             | ND             | 4.8 J          | 2.4            | 3              | 5.7               |
| Dibenzo(a,h)anthracene                                       | 0.33                                  | 0.33   | 0.56                                | ND                      | ND             | ND             | ND             | ND             | ND             | ND             | ND             | ND             | ND                |
| Dibenzofuran   | --                                    | --   | --                                  | ND                      | ND             | ND             | ND             | ND             | ND             | ND             | 0.21 J         | ND             | 0.82              |
| Fluoranthene   | 100                                   | 100  | 500                                 | ND                      | ND             | ND             | ND             | ND             | 1.7 J          | 12             | 4.8            | 6.1            | 15                |
| Fluorene   | 30                                    | 100  | 500                                 | 8.5                     | 0.79 J         | ND             | ND             | ND             | ND             | ND             | 0.24 J         | ND             | 1.4 J             |
| Indeno(1,2,3-cd)pyrene                                       | 0.5                                   | 0.5  | 5.6                                 | ND                      | ND             | ND             | ND             | ND             | ND             | 3.3 J          | 1.3            | 1.2            | 3.7               |
| Naphthalene  | 12                                    | 100  | 500                                 | 22                      | 1              | ND             | ND             | ND             | ND             | ND             | ND             | ND             | ND                |
| Phenanthrene   | 100                                   | 100  | 500                                 | 15                      | 1.6            | ND             | ND             | ND             | ND             | 7.5 J          | 3.7            | 2.6            | 10                |
| Pyrene   | 100                                   | 100  | 500                                 | 0.61                    | ND             | ND             | ND             | ND             | ND             | 9.9            | 4              | 5.3            | 13                |
| Metals - mg/Kg   |                                       |  |                                     |                         |                |                |                |                |                |                |                |                |                   |
| Arsenic  | 13                                    | 16   | 16                                  | --                      | --             | --             | 5.1            | 2.3            | 15.1           | 3.3            | 8.1            | 17             | 7                 |
| Barium   | 350                                   | 400  | 400                                 | --                      | --             | --             | 24.3           | 109            | 2460           | 204            | 83.4           | 77.1           | 103               |
| Cadmium  | 2.5                                   | 4.3  | 9.3                                 | --                      | --             | --             | 0.36           | ND             | 2.1            | 0.38           | 0.37           | 0.73           | 0.75              |
| Chromium   | 30                                    | 180  | 1500                                | --                      | --             | --             | 8.4            | 9              | 35.2           | 9.8            | 10.2           | 65             | 18.4              |
| Lead   | 63                                    | 400  | 1000                                | --                      | --             | --             | 31.6           | 9.4            | 2820           | 107            | 174            | 190            | 72                |
| Mercury  | 0.18                                  | 0.81   | 2.8                                 | --                      | --             | --             | ND             | ND             | 0.27           | 0.11           | 0.37           | 0.21           | 0.24              |

Notes:

- Only those parameters detected at a minimum of one sample location are presented in this table; all other compounds were reported as ND.
- Values per NYSDEC Part 375 Soil Cleanup Objectives (SCOs)
- Sample results were reported by the laboratory in ug/kg and converted to mg/kg for comparisons to SCOs.

Definitions:

ND = Parameter not detected above laboratory detection limit.  
 "--" = No value available for the parameter; Parameter not analyzed for.  
 J = Estimated value; result is less than the sample quantitation limit but greater than zero.  
 D = Indicates laboratory dilution.  
 F1 = MS and/or MSD Recovery is outside acceptance limits

|             |   |
|-------------|---|
| <b>Bold</b> | = Result exceeds Unrestricted Use SCOs      |
| <b>Bold</b> | = Result exceeds Rest. Residential Use SCOs |
| <b>Bold</b> | = Result exceeds Commercial Use SCOs        |



TABLE 3  
SUMMARY OF RI SUBSURFACE SOIL ANALYTICAL RESULTS  
REMEDIAL INVESTIGATION/ INTERIM REMEDIAL MEASURES/ ALTERNATIVES ANALYSIS REPORT  
MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)  
BUFFALO, NEW YORK

| PARAMETER <sup>1</sup>  | Unrestricted<br>Use SCOs <sup>2</sup> | Restricted<br>Residential<br>Use SCOs <sup>2</sup> | Commercial<br>Use SCOs <sup>2</sup> | SAMPLE LOCATION (DEPTH) |                 |                 |                 |                  |                      |                  |                   |                      |                |                  |                   |                   |                   |                 |                  |
|---|---------------------------------------|--|-------------------------------------|-------------------------|-----------------|-----------------|-----------------|------------------|----------------------|------------------|-------------------|----------------------|----------------|------------------|-------------------|-------------------|-------------------|-----------------|------------------|
|   |                                       |  |                                     | NS-1<br>(0'-2')         | NS-2<br>(0'-2') | NS-3<br>(0'-2') | NS-4<br>(0'-2') | TP-11<br>(4'-5') | TP-12<br>(4.5'-6.5') | TP-13<br>(4'-9') | TP-14<br>(9'-11') | TP-15<br>(1.5'-3.5') | TP-16<br>(0-2) | TP-18<br>(6'-9') | MW-1<br>(16'-18') | MW-2<br>(18'-20') | MW-3<br>(18'-20') | MW-4<br>(8-10') | MW-5<br>(20-24') |
|   |                                       |  |                                     | 07/18/2017              |                 |                 |                 |                  |                      |                  |                   |                      |                |                  |                   | 09/18/2017        |                   | 09/19/2017      | 11/13/2017       |
| <b>Volatile Organic Compounds (VOCs) - mg/Kg <sup>3</sup></b>       |                                       |  |                                     |                         |                 |                 |                 |                  |                      |                  |                   |                      |                |                  |                   |                   |                   |                 |                  |
| 1,2,4-Trimethylbenzene  | 3.6                                   | 47   | 190                                 | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | 0.00088 J         | --                | ND                | ND              | 0.00022 J        |
| 1,3,5-Trimethylbenzene  | 8.4                                   | 52   | 190                                 | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | 0.00088 J         | --                | ND                | ND              | ND               |
| Acetone   | 0.05                                  | 100  | 500                                 | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | ND                | --                | ND                | ND              | ND               |
| Benzene   | 0.06                                  | 4.8  | 44                                  | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | ND                | --                | ND                | 0.00035 J       | ND               |
| Carbon disulfide  | --                                    | --   | --                                  | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | ND                | --                | ND                | ND              | ND               |
| Isopropylbenzene (Cumene)   | --                                    | --   | --                                  | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | 0.0011            | --                | ND                | ND              | ND               |
| Methylcyclohexane   | --                                    | --   | --                                  | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | 0.0014 NJ         | --                | ND                | ND              | ND               |
| Methylene chloride  | 0.05                                  | 100  | 500                                 | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | ND                | --                | 0.0022 J          | ND              | ND               |
| sec-Butylbenzene  | 11                                    | 100  | 500                                 | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | 0.00028 J         | --                | ND                | ND              | ND               |
| Toluene   | 0.7                                   | 100  | 500                                 | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | ND                | --                | ND                | ND              | 0.0011 J         |
| trans-1,2-Dichloroethene  | 0.19                                  | 100  | 500                                 | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | ND                | --                | ND                | 0.00032 J       | ND               |
| Trichloroethene   | 0.47                                  | 21   | 200                                 | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | ND                | --                | 0.0017            | ND              | ND               |
| Total Xylenes   | 0.26                                  | 100  | 500                                 | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | ND                | --                | ND                | ND              | 0.00059 J        |
| Total VOCs  | --                                    | --   | --                                  | --                      | --              | ND              | --              | --               | --                   | ND               | ND                | ND                   | --             | ND               | 0.00366           | --                | 0.0039            | 0.00067         | 0.00191          |
| <b>Semi-Volatile Organic Compounds (SVOCs) - mg/Kg <sup>3</sup></b> |                                       |  |                                     |                         |                 |                 |                 |                  |                      |                  |                   |                      |                |                  |                   |                   |                   |                 |                  |
| 2-Methylnaphthalene   | --                                    | --   | --                                  | 0.037 J                 | ND              | ND              | 0.35 J          | ND               | ND                   | 0.023 J          | ND                | ND                   | 0.091 J        | ND               | ND                | ND                | ND                | ND              | ND               |
| Acenaphthene  | 20                                    | 100  | 500                                 | 0.045 J                 | 0.027 J         | 0.11 J          | 0.94            | ND               | 0.03 J               | ND               | ND                | ND                   | ND             | ND               | ND                | ND                | ND                | ND              | ND               |
| Acenaphthylene  | 100                                   | 100  | 500                                 | ND                      | ND              | ND              | 0.47 J          | ND               | ND                   | ND               | ND                | ND                   | ND             | ND               | ND                | ND                | ND                | ND              | ND               |
| Anthracene  | 100                                   | 100  | 500                                 | 0.12                    | 0.1 J           | 0.24            | 2.4             | ND               | 0.091 J              | 0.046 J          | ND                | ND                   | ND             | ND               | ND                | ND                | ND                | ND              | ND               |
| Benzo(a)anthracene  | 1                                     | 1  | 5.6                                 | 0.43                    | 0.49            | 0.61            | 6.6             | 0.033 J          | 0.28                 | 0.24             | ND                | 0.084 J              | 0.18           | ND               | ND                | ND                | ND                | ND              | ND               |
| Benzo(a)pyrene  | 1                                     | 1  | 1                                   | 0.41                    | 0.39            | 0.57            | 4.9             | ND               | 0.3                  | 0.22             | ND                | 0.082 J              | 0.19           | ND               | ND                | ND                | ND                | ND              | ND               |
| Benzo(b)fluoranthene  | 1                                     | 1  | 5.6                                 | 0.56                    | 0.59            | 0.73            | 6.8             | 0.034 J          | 0.44                 | 0.32             | ND                | 0.11 J               | 0.25           | ND               | ND                | ND                | ND                | ND              | ND               |
| Benzo(ghi)perylene  | 100                                   | 100  | 500                                 | 0.28                    | 0.22            | 0.36            | 2.7             | ND               | 0.23                 | 0.14 J           | ND                | 0.055 J              | 0.16           | ND               | ND                | ND                | ND                | ND              | ND               |
| Benzo(k)fluoranthene  | 0.8                                   | 3.9  | 56                                  | 0.16                    | 0.18            | 0.24            | 2.4             | ND               | 0.14                 | 0.1 J            | ND                | 0.031 J              | 0.077 J        | ND               | ND                | ND                | ND                | ND              | ND               |
| Bis(2-ethylhexyl) phthalate   | --                                    | --   | --                                  | ND                      | ND              | ND              | 0.6 J           | ND               | ND                   | ND               | ND                | ND                   | 0.082 J        | ND               | ND                | ND                | ND                | ND              | ND               |
| Carbazole   | --                                    | --   | --                                  | 0.078 J                 | 0.054 J         | 0.14 J          | 1.3             | ND               | 0.057 J              | 0.043 J          | ND                | ND                   | 0.025 J        | ND               | ND                | ND                | ND                | ND              | ND               |
| Chrysene  | 1                                     | 3.9  | 56                                  | 0.39                    | 0.44            | 0.54            | 6.3             | 0.027 J          | 0.3                  | 0.24             | ND                | 0.079 J              | 0.19           | ND               | ND                | ND                | ND                | ND              | ND               |
| Dibenzo(a,h)anthracene  | 0.33                                  | 0.33   | 0.56                                | 0.065 J                 | 0.074 J         | 0.092 J         | 0.71            | ND               | 0.056 J              | 0.039 J          | ND                | ND                   | 0.042 J        | ND               | ND                | ND                | ND                | ND              | ND               |
| Dibenzofuran  | 7                                     | 59   | 350                                 | 0.024 J                 | ND              | 0.053 J         | 0.75            | ND               | 0.025 J              | ND               | ND                | ND                   | 0.029 J        | ND               | ND                | ND                | ND                | ND              | ND               |
| Fluoranthene  | 100                                   | 100  | 500                                 | 0.88                    | 0.87            | 1.3             | 15              | 0.05 J           | 0.62                 | 0.41             | ND                | 0.15                 | 0.35           | ND               | ND                | ND                | ND                | ND              | ND               |
| Fluorene  | 30                                    | 100  | 500                                 | 0.042 J                 | 0.027 J         | 0.1 J           | 1               | ND               | 0.041 J              | ND               | ND                | ND                   | 0.019 J        | ND               | ND                | ND                | ND                | ND              | ND               |
| Indeno(1,2,3-cd)pyrene  | 0.5                                   | 0.5  | 5.6                                 | 0.3                     | 0.26            | 0.41            | 2.9             | ND               | 0.24                 | 0.16             | ND                | 0.064 J              | 0.14 J         | ND               | ND                | ND                | ND                | ND              | ND               |
| Naphthalene   | 12                                    | 100  | 500                                 | 0.023 J                 | ND              | 0.042 J         | 0.86            | ND               | 0.039 J              | ND               | ND                | ND                   | 0.051 J        | ND               | ND                | ND                | ND                | ND              | ND               |
| Phenanthrene  | 100                                   | 100  | 500                                 | 0.51                    | 0.37            | 0.98            | 9.9             | 0.026 J          | 0.38                 | 0.19             | ND                | 0.064 J              | 0.23           | ND               | ND                | ND                | ND                | ND              | ND               |
| Pyrene  | 100                                   | 100  | 500                                 | 0.75                    | 0.7             | 1               | 12              | 0.037 J          | 0.48                 | 0.34             | ND                | 0.12                 | 0.29           | ND               | ND                | ND                | ND                | ND              | ND               |
| Total PAHs  | --                                    | 100  | 500                                 | 4.965 J                 | 4.738 J         | 7.324 J         | 75.88 J         | 0.207 J          | 3.667 J              | 2.445 J          | ND                | 0.839 J              | 2.169 J        | ND               | ND                | ND                | ND                | ND              | ND               |
| <b>Metals - mg/Kg</b>   |                                       |  |                                     |                         |                 |                 |                 |                  |                      |                  |                   |                      |                |                  |                   |                   |                   |                 |                  |
| Aluminum  | --                                    | --   | --                                  | 7850                    | 12300           | 10100           | 8010            | 17800            | 7540                 | 5900             | 4860 J-           | 14400                | 14600          | 10700            | 3520              | 1540              | 1700              | 2740            | 2740             |
| Antimony  | --                                    | --   | --                                  | 0.368 J                 | ND              | 0.34 J          | 0.832 J         | 0.446 J          | 1.32 J               | ND               | ND                | ND                   | ND             | 0.398 J          | ND                | ND                | ND                | 0.448 J         | 0.448 J          |
| Arsenic   | 13                                    | 16   | 16                                  | 5.49                    | 5.47            | 2.72            | 9.92            | 4.92             | 8.15                 | 3.25             | 1.02              | 3.93                 | 2.21           | 4.94             | 1.43              | 1.36              | 0.622 J           | 1.4             | 1.4              |
| Barium  | 350                                   | 400  | 400                                 | 119                     | 96.8            | 86              | 92.3            | 132              | 64.7                 | 39.8             | 54.7 J-           | 108                  | 103            | 95.1             | 37                | 21.4              | 14.9              | 30.1            | 30.1             |
| Beryllium   | 7.2                                   | 72   | 590                                 | 0.304 J                 | 1.19            | 0.367 J         | 0.394 J         | 0.902            | 0.563                | 0.26 J           | 0.145 J           | 0.799                | 2.02           | 0.416 J          | 0.066 J           | ND                | 0.036 J           | 0.112 J         | 0.112 J          |
| Cadmium   | 2.5                                   | 4.3  | 9.3                                 | 1.08                    | 0.848 J         | 0.779 J         | 1.12            | 1.28             | 1.78                 | 0.655 J          | 0.545 J           | 0.628 J              | 0.538 J        | 0.934            | 0.596 J           | 0.409 J           | 0.4 J             | 0.293 J         | 0.293 J          |
| Calcium   | --                                    | --   | --                                  | 71400                   | 60000           | 53200           | 65400           | 4500             | 90300                | 29000            | 54000 J-          | 52900                | 62400          | 53000            | 54700             | 47300             | 47500             | 49500           | 49500            |
| Chromium  | 30                                    | 180  | 1500                                | 18.1                    | 19.8            | 13.3            | 39.3            | 22.2             | 8.74                 | 31.5             | 8.71              | 12.3                 | 6.97           | 15               | 6.13              | 3.21              | 4.01              | 7.51            | 7.51             |
| Cobalt  | --                                    | --   | --                                  | 5.76                    | 4.73            | 5.66            | 5.34            | 18.8             | 4.57                 | 4.54             | 4.27              | 4.49                 | 2.2            | 8.14             | 3.3               | 1.8 J             | 1.86 J            | 2.7 J           | 2.7 J            |
| Copper  | 50                                    | 270  | 270                                 | 17.4                    | 20.2            | 15.1            | 33.9            | 14.8             | 44.7                 | 15               | 10                | 26.7                 | 11.7           | 20.1             | 9.68              | 5.24              | 5.29              | 7.77            | 7.77             |
| Iron  | --                                    | --   | --                                  | 14900                   | 14900           | 15400           | 18700           | 29200            | 25900                | 12400            | 10200 J-          | 11700                | 10000          | 17800            | 8480              | 5180              | 5440              | 7220            | 7220             |
| Lead  | 63                                    | 400  | 1000                                | 87                      | 64.6            | 20.7            | 148             | 12.8             | 54.2                 | 16.1             | 9.85              | 111                  | 68.6           | 16.5 J           | 9.63              | 7.62              | 6.94              | 7.67            | 7.67             |
| Magnesium   | --                                    | --   | --                                  | 9810                    | 13700           | 12200           | 8770            | 5410             | 34000                | 8950             | 20900 J-          | 14600                | 12600          | 19100            | 24200             | 21800             | 21800             | 20700           | 20700            |
| Manganese   | 1600                                  | 2000   | 10000                               | 1180                    | 1060            | 303             | 1320            | 946              | 1020                 | 536              | 315 J-            | 717                  | 876            | 388              | 282               | 185               | 222               | 260             | 260              |
| Mercury   | 0.18                                  | 0.81   | 2.8                                 | 0.15                    | 0.25            | 0.09            | 0.48            | 0.04 J           | 0.25                 | 0.08             | ND                | 0.08                 | 0.12           | 0.05 J           | 0.02 J            | ND                | ND                | ND              | ND               |
| Nickel  | 30                                    | 310  | 310                                 | 9.78                    | 11.5            | 14.3            | 14.9            | 23.9             | 24.4                 | 12               | 8.85              | 10.1                 | 5.8            | 19.2             | 6.67              | 3.23              | 3.5               | 5.8             | 5.8              |
| Potassium   | --                                    | --   | --                                  | 834                     | 921             | 1160            | 994             | 1690             | 745                  | 758              | 1010              | 2200                 | 1100           | 1600             | 662               | 314               | 305               | 672             | 672              |
| Selenium  | 3.9                                   | 180  | 1500                                | 0.267 J                 | 0.604 J         | ND              | 0.626 J         | ND               | ND                   | ND               | ND                | ND                   | 2.06           | ND               | ND                | ND                | 0.373 J           | ND              | ND               |
| Silver  | 2                                     | 180  | 1500                                | ND                      | ND              | ND              | 0.447 J         | ND               | ND                   | ND               | ND                | ND                   | ND             | ND               | ND                | ND                | ND                | ND              | ND               |
| Sodium  | --                                    | --   | --                                  | 296                     | 798             | 360             | 372             | 378              | 520                  | 201              | 375               | 1190                 | 615            | 165 J            | 231               | 168 J             | 108 J             | 184 J           | 184 J            |
| Thallium  | --                                    | --   | --                                  | 0.883 J                 | 1.01 J          | ND              | 1.4 J           | 1.04 J           | 1.02 J               | 0.529 J          | ND                | 0.675 J              | 0.815 J        | ND               | ND                | ND                | ND                | ND              | ND               |
| Vanadium  | --                                    | --   | --                                  | 22.3                    | 20.9            | 18.6            | 31.7            | 30.3             | 20                   | 12.7             | 12.8              | 21.9                 | 8.12           | 21.4             | 10.5              | 7.59              | 7.39              | 9.7             | 9.7              |
| Zinc  | 109                                   | 10000  | 10000                               | 97.3                    | 90.8            | 61.3            | 151             | 58.3             | 148                  | 52.5             | 47.6              | 76.8                 | 60.3           | 79.9 J           | 75.7              | 62.7              | 56.4              | 61.6            | 61.6             |
| <b>Polychlorinated biphenyls- mg/Kg <sup>3</sup></b>                |                                       |  |                                     |                         |                 |                 |                 |                  |                      |                  |                   |                      |                |                  |                   |                   |                   |                 |                  |
| Aroclor 1242  | --                                    | --   | --                                  | --                      | --              | ND              | 0.142 J+        | --               | ND                   | --               | ND                | --                   | ND             | ND               | ND                | ND                | ND                | --              | --               |
| Aroclor 1254  | --                                    | --   | --                                  | --                      | --              | ND              | 0.215 J+        | --               | 0.0143 J+            | --               | ND                | --                   | 0.00809 J+     | ND               | ND                | ND                | ND                | --              | --               |
| Aroclor 1260  | --                                    | --   | --                                  | --                      | --              | ND              | 0.0755 J+       | --               | 0.0124 J+            | --               | ND                | --                   | 0.0106 J+      | ND               | ND                | ND                | ND                | --              | --               |
| Aroclor 1268  | --                                    | --   | --                                  | --                      | --              | ND              | 0.024 J+        | --               | ND                   | --               | ND                | --                   | ND             | ND               | ND                | ND                | ND                | --              | --               |
| Total PCBs  | 0.1                                   | 1  | 1                                   | --                      | --              | ND              | 0.4565 J+       | --               | 0.0267 J+            | --               | ND                | --                   | 0.01869 J+     | ND               | ND                | ND                | ND                | --              | --               |
| <b>Pesticides and Herbicides - mg/Kg <sup>3</sup></b>               |                                       |  |                                     |                         |                 |                 |                 |                  |                      |                  |                   |                      |                |                  |                   |                   |                   |                 |                  |
| Total Pesticides  | --                                    | --   | --                                  | --                      | --              | ND              | --              | --               | --                   | --               | ND                | --                   | --             | ND               | --                | --                | ND                | --              | --               |
| Total Herbicides  | --                                    | --   | --                                  | --                      | --              | ND              | --              | --               | --                   | --               | ND                | --                   | --             | ND               | --                | --                | ND                | --              | --               |

Notes:

- Only those parameters detected at a minimum of one sample location are presented in this table; all other compounds were reported as non-detect.
- Values per 6NYCRR Part 375 Soil Cleanup Objectives (SCOs).
- Sample results were reported by the laboratory in ug/kg and converted to mg/kg for comparisons to SCOs

Definitions:

ND = Parameter not detected above laboratory detection limit.  
"--" = No value available for the parameter. Or parameter not analysed for.  
J = Estimated value; result is less than the sample quantitation limit but greater than zero.  
J+ = The analyte was positively identified; the associated numerical value is an estimated quantity that may be biased high.  
J- = The analyte was positively identified; the associated numerical value is an estimated quantity that may be biased low.  
NJ = The detection is tentative in identification and estimated in value. Although there is presumptive evidence of the analyte, the result should be used with caution as a potential false positive and/or elevated quantitative value.

|             |   |
|-------------|---|
| <b>Bold</b> | = Result exceeds Unrestricted Use SCOs.           |
| <b>Bold</b> | = Result exceeds Restricted Residential Use SCOs. |
| <b>Bold</b> | = Result exceeds Commercial Use SCOs.             |





TABLE 4

SUMMARY OF RI GROUNDWATER ANALYTICAL RESULTS  
REMEDIAL INVESTIGATION/ INTERIM REMEDIAL MEASURES/ ALTERNATIVES ANALYSIS REPORT

MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)  
BUFFALO, NEW YORK

| Parameters <sup>1</sup>                       | Class GA<br>GWQS <sup>2</sup> | Sample Location |        |          |         |           |         |         |
|---|-------------------------------|-----------------|--------|----------|---------|-----------|---------|---------|
|   |                               | MW-1            | MW-2   | MW-3     | MW-3    | MW-4      | MW-4    | MW-5    |
|   |                               | 10/23/17        |        | 11/16/17 | 2/11/18 | 11/16/17  | 2/11/18 | 2/11/18 |
| Volatile Organic Compounds (VOCs) - ug/L      |                               |                 |        |          |         |           |         |         |
| 1,1-Dichloroethene                            | 5                             | ND              | ND     | ND       | ND      | 0.27 J    | ND      | ND      |
| 2-Butanone                                    | 50                            | ND              | ND     | 360 NJ   | ND      | ND        | 13      | ND      |
| 1,2-Dichloroethane                            | 0.6                           | ND              | 0.14 J | ND       | ND      | 0.18 J    | 0.16 J  | ND      |
| Acetone                                       | 50                            | 5.2             | 2 J    | 51       | 4.5 J   | 3.1 J     | 93 J    | 9       |
| Benzene                                       | 1                             | ND              | 0.53   | ND       | ND      | 3.4       | 1.9     | ND      |
| Cyclohexane                                   | --                            | ND              | ND     | ND       | ND      | 0.64 J    | 0.29 J  | ND      |
| Methylcyclohexane                             | --                            | ND              | ND     | ND       | ND      | ND        | ND      | ND      |
| Cis-1,2-Dichloroethene                        | 5                             | ND              | ND     | 2.5 J    | ND      | 39        | 21      | 5.2     |
| Xylene (total)                                | 5                             | ND              | 0.88 J | ND       | ND      | ND        | ND      | ND      |
| trans-1,2-Dichloroethene                      | 5                             | ND              | ND     | ND       | ND      | 100       | 58      | ND      |
| Trichloroethene                               | 5                             | ND              | ND     | 30       | ND      | 17        | 8       | ND      |
| Vinyl Chloride                                | 2                             | ND              | ND     | ND       | ND      | 6.9       | 2.5     | 0.5 J   |
| Semivolatile Organic Compounds (SVOCs) - ug/L |                               |                 |        |          |         |           |         |         |
| 2-Methylnaphthalene                           | --                            | ND              | ND     | ND       | --      | ND        | --      | --      |
| 3-Methylphenol/4-methylphenol*                | 5                             | 2.9 J           | ND     | ND       | --      | ND        | --      | --      |
| Acenaphthene                                  | 20                            | ND              | ND     | ND       | --      | ND        | --      | --      |
| Benzo(a)anthracene                            | 0.002                         | ND              | ND     | ND       | --      | ND        | --      | --      |
| Fluoranthene                                  | 50                            | 0.07 J          | 0.06 J | 0.05 J   | --      | 0.05 J    | --      | --      |
| Fluorene                                      | 50                            | 0.05 J          | ND     | 0.06 J   | --      | ND        | --      | --      |
| Naphthalene                                   | 10                            | ND              | ND     | ND       | --      | ND        | --      | --      |
| Phenanthrene                                  | 50                            | 0.12            | 0.37   | 0.42     | --      | 0.22      | --      | --      |
| Pyrene  | 50                            | ND              | ND     | ND       | --      | ND        | --      | --      |
| Polychlorinated Biphenyls - ug/L              |                               |                 |        |          |         |           |         |         |
| Total PCBs                                    | 0.09                          | ND              | ND     | ND       | --      | ND        | --      | --      |
| Metals - ug/L <sup>3</sup>                    |                               |                 |        |          |         |           |         |         |
| Aluminum                                      | --                            | 2260            | 2360   | 2,400    | --      | 971 J     | --      | --      |
| Antimony                                      | 3                             | ND              | ND     | ND       | --      | ND        | --      | --      |
| Arsenic                                       | 25                            | 6.49            | 9.34   | 10.29    | --      | 2.11      | --      | --      |
| Barium  | 1000                          | 59.18           | 62.7   | 100.9    | --      | 65.02     | --      | --      |
| Beryllium                                     | --                            | 0.00012 J       | 0.13   | 0.16 J   | --      | ND        | --      | --      |
| Cadmium                                       | 5                             | 0.11 J          | 0.06   | 0.08 J   | --      | ND        | --      | --      |
| Calcium                                       | --                            | 237000          | 109000 | 142000   | --      | 236000    | --      | --      |
| Chromium                                      | 50                            | 3.24            | 3.81   | 4.2      | --      | 1.85 J    | --      | --      |
| Cobalt  | --                            | 2.67            | 2.48   | 2.36     | --      | 1.58 J    | --      | --      |
| Copper  | 200                           | 5.61            | 6.18   | 4.49     | --      | 2.74      | --      | --      |
| Iron  | 300                           | 4360            | 4910   | 6090     | --      | 3370      | --      | --      |
| Lead  | 25                            | 4.62            | 7.79   | 14.91    | --      | 3.71 J    | --      | --      |
| Magnesium                                     | 35000                         | 126000          | 51000  | 105000   | --      | 54900     | --      | --      |
| Manganese                                     | 300                           | 158.8           | 148.7  | 268.8    | --      | 171       | --      | --      |
| Mercury                                       | 0.7                           | ND              | ND     | ND       | --      | ND        | --      | --      |
| Nickel  | 100                           | 6.22            | 6      | 10.44    | --      | 4.34      | --      | --      |
| Potassium                                     | --                            | 6310            | 6440   | 4890     | --      | 13600     | --      | --      |
| Selenium                                      | 10                            | 2.31            | 2.45   | 2.47 J   | --      | ND        | --      | --      |
| Silver  | 50                            | ND              | ND     | ND       | --      | ND        | --      | --      |
| Sodium  | 20000                         | 1000000         | 399000 | 78500    | --      | 174000    | --      | --      |
| Thallium                                      | 0.5                           | ND              | ND     | ND       | --      | ND        | --      | --      |
| Vanadium                                      | --                            | 4.16            | 4.75   | 5.74     | --      | 2.5 J     | --      | --      |
| Zinc  | 2000                          | 20.23           | 18.89  | 22.54    | --      | 13.68     | --      | --      |
| Pesticides and Herbicides - ug/L              |                               |                 |        |          |         |           |         |         |
| 4,4'-DDD                                      | 0.3                           | ND              | ND     | 0.012 J  | --      | 0.02 J    | --      | --      |
| beta-BHC                                      | 0.01                          | ND              | ND     | ND       | --      | 0.008 JPI | --      | --      |
| cis-Chlordane                                 | --                            | ND              | ND     | ND       | --      | ND        | --      | --      |
| Endrin  | ND                            | ND              | ND     | 0.012 NJ | --      | ND        | --      | --      |
| Heptachlor                                    | 0.04                          | 0.047           | 0.039  | ND       | --      | ND        | --      | --      |
| Heptachlor epoxide                            | 0.03                          | ND              | ND     | ND       | --      | ND        | --      | --      |
| trans-Chlordane                               | --                            | ND              | ND     | ND       | --      | 0.01 JPI  | --      | --      |

Notes:

- Only parameters detected at a minimum of one sample location are presented in this table; all other compounds were reported as non-detect.
- Values per NYSDEC TOGS 1.1.1 Class GA Groundwater Quality Standards.
- Sample results were reported by the laboratory in mg/L and converted to ug/L for comparisons to GWQS

Qualifiers:

- ND = Parameter not detected above laboratory detection limit.  
 "--" = Sample not analyzed for parameter or no GWQS available for the parameter.  
 J = Estimated Value - Below calibration range  
 NJ = The detection is tentative in identification and estimated in value. Although there is presumptive evidence of the analyte, the result should be used with caution as a potential false positive and/or elevated quantitative value.  
 P = The dual column RPD's are above the acceptance criteria, the lower of the two results is reported.  
 I = The lower value for the two columns has been reported due to obvious interference.  
 \* = Guidance value for total phenols used for comparison to GWQS

**BOLD** = Result exceeds GWQS.



**TABLE 5**

**SUMMARY OF RI AIR SAMPLING ANALYTICAL RESULTS  
REMEDIAL INVESTIGATION/ INTERIM REMEDIAL MEASURES/ ALTERNATIVES ANALYSIS REPORT**

**MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)  
BUFFALO, NEW YORK**

| Parameter <sup>1</sup>  | Sample Location |           |         |           |           |         |
|---|-----------------|-----------|---------|-----------|-----------|---------|
|   | SSV-1           | AMBIENT-1 | SSV-2   | AMBIENT-2 | AMBIENT-3 | OUTDOOR |
|   | 2/12/2018       |           |         |           |           |         |
| Volatile Organics Compounds (VOCs) - ug/ <sup>3</sup>         |                 |           |         |           |           |         |
| 1,1,2-Trichloro-1,2,2-Trifluloroethane                        | 9.35            | ND        | ND      | ND        | ND        | ND      |
| 1,2,4-Trimethylbenzene  | ND              | 1.34      | 3.22    | 1.17      | ND        | ND      |
| 1,3,5-Trimethylbenzene  | ND              | ND        | 1.38    | ND        | ND        | ND      |
| 1,3-Butadiene   | ND              | ND        | 1.36    | ND        | ND        | ND      |
| 2-Butanone  | 11.4 J          | 15.3      | 8.2     | 12.6      | 7.76      | ND      |
| Acetone   | R               | 25.4      | 73.6 J+ | 19.8      | 17.9      | 2.42 J- |
| Benzene   | 92.3 J          | 0.639     | 19.6    | ND        | 0.642     | ND      |
| Carbon disulfide  | 95.6 J          | ND        | 10.7    | ND        | ND        | ND      |
| Chloroform  | ND              | ND        | 1.9     | ND        | ND        | ND      |
| Chloromethane   | ND              | 0.793     | ND      | 0.727     | 0.673     | 0.653   |
| Cyclohexane   | 1560 J          | ND        | 29.5    | ND        | ND        | ND      |
| Dichlorodifluoromethane                                       | ND              | 1.94      | 0.999   | 2.21      | 1.58      | 1.54    |
| Ethyl Alcohol   | 154             | ND        | 28.5    | ND        | ND        | ND      |
| Ethylbenzene  | ND              | 4.33      | 5.13    | 4.56      | 1.56      | ND      |
| Isopropyl alcohol   | 13.2 J          | 1.61      | 3.76    | 1.34      | ND        | ND      |
| n-Heptane   | 225 J           | 0.877     | 30.1    | 0.857     | ND        | ND      |
| n-Hexane  | 1160 J          | 1.19      | 51.5    | 1.09      | 1.02      | ND      |
| tert-Butyl alcohol  | ND              | 6.43      | 1.7     | 5.52      | 2.89      | ND      |
| Tetrahydrofuran   | ND              | 13.7      | 1.76    | 12.6      | 8.11      | ND      |
| Toluene   | 22.3            | 4.94      | 44.1    | 4.48      | 3.68      | ND      |
| o-Xylene  | 4.78            | 8.17      | 7.3     | 8.38      | 2.88      | ND      |
| p/m-Xylene  | 16              | 25.2      | 20.3    | 25.1      | 8.56      | ND      |
| Volatile Organics Compounds (VOCs) in SIM - ug/m <sup>3</sup> |                 |           |         |           |           |         |
| Carbon tetrachloride <sup>2</sup>                             | ND              | 0.371     | ND      | 0.365     | 0.359     | 0.315   |

**Notes:**

- Only those parameters detected above the method detection limit, at a minimum of one location, are presented in this table.
- Constituent monitored under NYSDOH Vapor/ Indoor Air Quality Standards - (Matricies A,B,C- Updated May 2017)

**Definitions:**

ND = Parameter not detected above laboratory detection limit.

"--" = No value available for the parameter. Or parameter not analysed for.

J = The analyte was positively identified; the associated numerical value is an approximate concentration of the analyte in the sample.

J+ = The analyte was positively identified; the associated numerical value is an estimated quantity that may be biased high.

J- = The analyte was positively identified; the associated numerical value is an estimated quantity that may be biased low.



**TABLE 6**  
**COMPARISON OF RI AIR SAMPLING RESULTS TO NYSDOH MATRICIES**  
**REMEDIAL INVESTIGATION/ INTERIM REMEDIAL MEASURES/ ALTERNATIVES ANALYSIS REPORT**  
**MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)**  
**BUFFALO, NEW YORK**

| Sample Location | Trichloroethene (TCE)                           |                                  | Carbon Tetrachloride                            |                                  | cis-1,2-Dichloroethene                          |                                  | 1,1-Dichloroethene                              |                                  | Tetrachloroethene (PCE)                         |                                  | 1,1,1 -Trichloroethane                          |                                  | Methylene Chloride                              |                                  | Vinyl Chloride                                  |                                  |
|-----------------|---|----------------------------------|---|----------------------------------|---|----------------------------------|---|----------------------------------|---|----------------------------------|---|----------------------------------|---|----------------------------------|---|----------------------------------|
|                 | Lab Reported Concentration (ug/m <sup>3</sup> ) | Soil Vapor / Indoor Air Matrix A | Lab Reported Concentration (ug/m <sup>3</sup> ) | Soil Vapor / Indoor Air Matrix A | Lab Reported Concentration (ug/m <sup>3</sup> ) | Soil Vapor / Indoor Air Matrix A | Lab Reported Concentration (ug/m <sup>3</sup> ) | Soil Vapor / Indoor Air Matrix A | Lab Reported Concentration (ug/m <sup>3</sup> ) | Soil Vapor / Indoor Air Matrix B | Lab Reported Concentration (ug/m <sup>3</sup> ) | Soil Vapor / Indoor Air Matrix B | Lab Reported Concentration (ug/m <sup>3</sup> ) | Soil Vapor / Indoor Air Matrix B | Lab Reported Concentration (ug/m <sup>3</sup> ) | Soil Vapor / Indoor Air Matrix C |
| SSV-1           | ND (< 5.37)                                     | NFA                              | ND (< 6.29)                                     | NFA                              | ND (< 3.96)                                     | NFA                              | ND (< 4.05)                                     | NFA                              | ND (< 6.78)                                     | NFA                              | ND (< 5.46)                                     | NFA                              | ND (< 8.69)                                     | NFA                              | ND (< 2.56)                                     | NFA                              |
| AMBIENT - 1     | ND (< 0.107)                                    |                                  | 0.371   |                                  | ND (< 0.079)                                    |                                  | ND (< 0.079)                                    |                                  | ND (< 0.136)                                    |                                  | ND (< 0.109)                                    |                                  | ND (< 1.74)                                     |                                  | ND (< 0.051)                                    |                                  |
| SSV-2           | ND (< 1.07)                                     | NFA                              | ND (< 1.26)                                     | NFA                              | ND (< 0.793)                                    | NFA                              | ND (< 0.793)                                    | NFA                              | ND (< 1.36)                                     | NFA                              | ND (< 1.09)                                     | NFA                              | ND (< 1.74)                                     | NFA                              | ND (< 0.511)                                    | NFA                              |
| AMBIENT - 2     | ND (< 0.107)                                    |                                  | 0.365   |                                  | ND (< 0.079)                                    |                                  | ND (< 0.079)                                    |                                  | ND (< 0.136)                                    |                                  | ND (< 0.109)                                    |                                  | ND (< 1.74)                                     |                                  | ND (< 0.051)                                    |                                  |

**Notes:**  
 ND = Not Detected. Value in "( )" is the detection limit reported by the laboratory.  
 NFA = No further action.  
 I, R = Take reasonable and practical actions to identify source(s) and reduce exposures.

= NYSDOH Matrix A Compounds  
 = NYSDOH Matrix B Compounds  
 = NYSDOH Matrix C Compounds

**Analytes Assigned:**  
 Trichloroethene (TCE), cis-1,2-Dichloroethene (c12-DCE), 1,1-Dichloroethene (11-DCE), Carbon Tetrachloride

| SUB-SLAB VAPOR CONCENTRATION of COMPOUND (mcg/m <sup>3</sup> ) | INDOOR AIR CONCENTRATION of COMPOUND (mcg/m <sup>3</sup> ) |                      |  |
|--|--|----------------------|--|
|  | < 0.2  | 0.2 to < 1           | 1 and above                                    |
| < 6  | 1. No further action                                       | 2. No Further Action | 3. IDENTIFY SOURCE(S) and RESAMPLE or MITIGATE |
| 6 to < 60  | 4. No further action                                       | 5. MONITOR           | 6. MITIGATE                                    |
| 60 and above   | 7. MITIGATE  | 8. MITIGATE          | 9. MITIGATE                                    |

**Analytes Assigned:**  
 Tetrachloroethene (PCE), 1,1,1-Trichloroethane (111-TCA), Methylene Chloride

| SUB-SLAB VAPOR CONCENTRATION of COMPOUND (mcg/m <sup>3</sup> ) | INDOOR AIR CONCENTRATION of COMPOUND (mcg/m <sup>3</sup> ) |                      |  |
|--|--|----------------------|--|
|  | < 3  | 3 to < 10            | 10 and above                                   |
| < 100  | 1. No further action                                       | 2. No Further Action | 3. IDENTIFY SOURCE(S) and RESAMPLE or MITIGATE |
| 100 to < 1,000   | 4. No further action                                       | 5. MONITOR           | 6. MITIGATE                                    |
| 1,000 and above  | 7. MITIGATE  | 8. MITIGATE          | 9. MITIGATE                                    |

**Analytes Assigned:**  
 Vinyl Chloride

| SUB-SLAB VAPOR CONCENTRATION of COMPOUND (mcg/m <sup>3</sup> ) | INDOOR AIR CONCENTRATION of COMPOUND (mcg/m <sup>3</sup> ) |  |
|--|--|--|
|  | < 0.2  | 0.2 and above                                  |
| < 6  | 1. No further action                                       | 2. IDENTIFY SOURCE(S) and RESAMPLE or MITIGATE |
| 6 to < 60  | 3. MONITOR   | 4. MITIGATE                                    |
| 60 and above   | 5. MITIGATE  | 6. MITIGATE                                    |



TABLE 7

SUMMARY OF UST IRM POST-EXCAVATION CONFIRMATORY SOIL ANALYTICAL RESULTS  
REMEDIAL INVESTIGATION/ INTERIM REMEDIAL MEASURES/ ALTERNATIVES ANALYSIS REPORT

MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)  
BUFFALO, NEW YORK

| PARAMETER <sup>1</sup>                                       | Unrestricted<br>Use SCOs <sup>2</sup> | Restricted<br>Residential<br>Use SCOs <sup>2</sup> | SAMPLE LOCATION (DEPTH) |                  |                |                |                |                 |                  |              |                 |                 |                 |                 |
|--|---------------------------------------|--|-------------------------|------------------|----------------|----------------|----------------|-----------------|------------------|--------------|-----------------|-----------------|-----------------|-----------------|
|  |                                       |  | UST AREA                |                  |                |                |                |                 | PUMP ISLAND AREA |              |                 |                 |                 |                 |
|  |                                       |  | BOTTOM-1<br>(15')       | SW-1<br>(13-15') | SW-2<br>(7-9') | SW-3<br>(7-9') | SW-4<br>(7-9') | SW-5<br>(9-11') | SW-6<br>(7-9')   | B-2<br>(13') | SW-1<br>(8-10') | SW-2<br>(8-10') | SW-3<br>(8-10') | SW-4<br>(8-10') |
|  |                                       |  | 10/24/2017              |                  |                |                |                |                 | 10/25/2017       |              |                 |                 |                 |                 |
| Volatile Organic Compounds (VOCs) - mg/Kg <sup>3</sup>       |                                       |  |                         |                  |                |                |                |                 |                  |              |                 |                 |                 |                 |
| 1,2,4-Trimethylbenzene                                       | 3.6                                   | 52   | 0.012                   | 0.0016 J         | ND             | ND             | 0.00083 J      | 0.001 J         | 0.0061 J+        | ND           | ND              | ND              | 0.012           | ND              |
| 1,3,5-Trimethylbenzene                                       | 8.4                                   | 52   | 0.00087 J               | 0.0006 J         | ND             | ND             | 0.00024 J      | ND              | 0.001 J+         | ND           | ND              | ND              | 0.0087          | ND              |
| Benzene  | 0.06                                  | 4.8  | ND                      | ND               | ND             | ND             | ND             | 0.00043 J       | ND               | ND           | ND              | ND              | ND              | ND              |
| Ethylbenzene   | 1                                     | 41   | 0.0026                  | 0.00029 J        | ND             | ND             | 0.00088 J      | 0.013           | 0.0039 J+        | ND           | ND              | ND              | 0.0043          | ND              |
| Isopropylbenzene (Cumene)                                    | --                                    | --   | 0.00091 J               | ND               | ND             | ND             | 0.00084 J      | 0.0034          | 0.007 J+         | ND           | ND              | ND              | 0.003           | ND              |
| Methyl tert butyl ether (MTBE)                               | 0.93                                  | 100  | ND                      | ND               | ND             | ND             | ND             | ND              | ND               | ND           | ND              | ND              | ND              | ND              |
| n-Butylbenzene   | 12                                    | 100  | 0.0021                  | 0.001            | ND             | ND             | 0.0023         | ND              | 0.028 J+         | 0.0044       | 0.014           | ND              | 0.003           | ND              |
| n-Propylbenzene  | 3.9                                   | 100  | 0.003                   | 0.0012           | ND             | ND             | 0.0012         | 0.002           | 0.025 J+         | 0.0012       | 0.0013          | ND              | 0.0089          | ND              |
| p-Isopropyltoluene   | --                                    | --   | 0.0014                  | 0.00081 J        | ND             | ND             | 0.0022         | ND              | 0.017 J+         | ND           | 0.0027          | ND              | 0.0034          | ND              |
| sec-Butylbenzene   | 11                                    | 100  | 0.0011                  | 0.00083 J        | ND             | 0.00018 J      | 0.0047         | ND              | 0.022 J+         | 0.002        | 0.0098          | ND              | 0.0046          | ND              |
| tert-Butylbenzene  | 5.9                                   | 100  | ND                      | ND               | ND             | ND             | 0.0003 J       | ND              | 0.0014 J+        | ND           | ND              | ND              | 0.00045 J       | ND              |
| Toluene  | 0.7                                   | 100  | ND                      | ND               | ND             | 0.00023 J      | 0.00057 J      | 0.00038 J       | ND               | 0.00034 J    | ND              | ND              | 0.00024 J       | ND              |
| Total Xylenes  | 0.26                                  | 100  | 0.00276                 | 0.00079 J        | ND             | ND             | ND             | 0.0152          | 0.00174 J+       | ND           | ND              | ND              | 0.00802         | ND              |
| Semi-Volatile Organic Compounds (SVOCs) - mg/Kg <sup>3</sup> |                                       |  |                         |                  |                |                |                |                 |                  |              |                 |                 |                 |                 |
| Acenaphthene   | 20                                    | 100  | ND                      | 0.031 J          | ND             | ND             | ND             | ND              | ND               | ND           | ND              | ND              | ND              | ND              |
| Fluoranthene   | 100                                   | 100  | ND                      | 0.063 J          | ND             | ND             | ND             | ND              | ND               | ND           | ND              | ND              | ND              | ND              |
| Fluorene   | 30                                    | 100  | ND                      | 0.042 J          | ND             | ND             | 0.018 J        | ND              | ND               | ND           | ND              | ND              | ND              | ND              |
| Naphthalene  | 12                                    | 100  | ND                      | 0.068 J          | ND             | ND             | ND             | ND              | ND               | ND           | ND              | ND              | ND              | ND              |
| Phenanthrene   | 100                                   | 100  | ND                      | 0.12             | ND             | ND             | ND             | ND              | ND               | ND           | ND              | ND              | ND              | ND              |
| Pyrene   | 100                                   | 100  | ND                      | 0.041 J          | ND             | ND             | ND             | ND              | ND               | ND           | ND              | ND              | ND              | ND              |

Notes:

- Only those parameters detected at a minimum of one sample location are presented in this table; all other compounds were reported as non-detect.
- Values per 6NYCRR Part 375 Soil Cleanup Objectives (SCOs).
- Sample results were reported by the laboratory in ug/kg and converted to mg/kg for comparisons to SCOs

Definitions:

ND = Parameter not detected above laboratory detection limit.

-- = No value available for the parameter. Or parameter not analysed for.

J = Estimated value; result is less than the sample quantitation limit but greater than zero.

J+ = The analyte was positively identified; the associated numerical value is an estimated quantity that may be biased high.

|             |   |
|-------------|---|
| <b>Bold</b> | = Result exceeds Unrestricted Use SCOs.           |
| <b>Bold</b> | = Result exceeds Restricted Residential Use SCOs. |



TABLE 8

**SUMMARY OF AST IRM SOIL ANALYTICAL RESULTS  
REMEDIAL INVESTIGATION/ INTERIM REMEDIAL MEASURES/ ALTERNATIVES ANALYSIS REPORT  
MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)  
BUFFALO, NEW YORK**

| PARAMETER <sup>1</sup>   | Unrestricted<br>Use SCOs <sup>2</sup> | Restricted Residential<br>Use SCOs <sup>2</sup> | SAMPLE LOCATION (DEPTH)  |                 |
|--|---------------------------------------|---|--------------------------|-----------------|
|  |                                       |   | FORMER BASEMENT AST AREA |                 |
|  |                                       |   | BSB-1<br>(1-2')          | BSB-2<br>(4-5') |
|  |                                       |   | 11/13/2017               |                 |
| <b><i>Volatile Organic Compounds (VOCs) - mg/Kg <sup>3</sup></i></b>       |                                       |   |                          |                 |
| 1,2,4-Trimethylbenzene   | 3.6                                   | 52  | 4.9                      | 25              |
| 1,3,5-Trimethylbenzene   | 8.4                                   | 52  | 1.5 J                    | 6.2             |
| Benzene  | 0.06                                  | 4.8   | ND                       | 0.066 J         |
| Ethylbenzene   | 1                                     | 41  | 0.55                     | 2.9             |
| Isopropylbenzene (Cumene)  | --                                    | --  | 0.23 J                   | 1.8             |
| n-Butylbenzene   | 12                                    | 100   | 1.4                      | 5.2             |
| n-Propylbenzene  | 3.9                                   | 100   | 0.61                     | 3               |
| p-Isopropyltoluene   | --                                    | --  | 0.41                     | 1.8             |
| sec-Butylbenzene   | 11                                    | 100   | 0.38                     | 1.7             |
| tert-Butylbenzene  | 5.9                                   | 100   | 0.033 J                  | 0.15 J          |
| Toluene  | 0.7                                   | 100   | ND                       | 0.33            |
| Total Xylenes  | 0.26                                  | 100   | 1.639 J                  | 10.7            |
| <b><i>Semi-Volatile Organic Compounds (SVOCs) - mg/Kg <sup>3</sup></i></b> |                                       |   |                          |                 |
| Acenaphthene   | 20                                    | 100   | 1.2                      | 2.1             |
| Acenaphthylene   | 100                                   | 100   | ND                       | ND              |
| Anthracene   | 100                                   | 100   | 0.46 J                   | 0.85 J          |
| Fluorene   | 30                                    | 100   | 2.3                      | 4.6             |
| Naphthalene  | 12                                    | 100   | 8.4                      | 16              |
| Phenanthrene   | 100                                   | 100   | 5.3                      | 10              |
| Pyrene   | 100                                   | 100   | 0.13 J                   | 0.28 J          |

**Notes:**

- Only those parameters detected at a minimum of one sample location are presented in this table; all other compounds were reported as non-detect.
- Values per 6NYCRR Part 375 Soil Cleanup Objectives (SCOs).
- Sample results were reported by the laboratory in ug/kg and converted to mg/kg for comparisons to SCOs

**Definitions:**

ND = Parameter not detected above laboratory detection limit.  
J = Estimated value; result is less than the sample quantitation limit but greater than zero.

|             |   |
|-------------|---|
| <b>Bold</b> | = Result exceeds Unrestricted Use SCOs.           |
| <b>Bold</b> | = Result exceeds Restricted Residential Use SCOs. |



**TABLE 9**

**COST ESTIMATE FOR TRACK 1 UNRESTRICTED USE CLEANUP ALTERNATIVE  
REMEDIAL INVESTIGATION/ INTERIM REMEDIAL MEASURES/ ALTERNATIVES ANALYSIS REPORT  
MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)  
BUFFALO, NEW YORK**

| Item  | Quantity | Units | Unit Cost    | Total Cost          |
|---|----------|-------|--------------|---------------------|
| <b>Completed IRMs (UST and AST)</b>                       | 1        | CM    | \$ 100,000   | \$ <b>100,000</b>   |
| <b><u>Impacted Soil/Fill Removal</u></b>                  |          |       |              |                     |
| <b><u>USCO Excavation</u></b>                             |          |       |              |                     |
| Shoring (Internal Bldg and boudnary)                      | 1        | EST   | \$ 500,000   | \$ 500,000          |
| Soil/Fill Excavation & Hauling                            | 11650    | CY    | \$ 30.00     | \$ 349,500          |
| Disposal at TSDF (1.6 tons per CY)                        | 18640    | TON   | \$ 45.00     | \$ 838,800          |
| Waste Characterization Analytical                         | 8        | EA    | \$ 600.00    | \$ 4,800            |
| Post-Excavation Confirmatory Sampling                     | 100      | EA    | \$ 500.00    | \$ 50,000           |
| <b>Subtotal:</b>  |          |       |              | \$ <b>1,243,100</b> |
| <b><u>Backfill Excavation with Off-Site Soil/Fill</u></b> |          |       |              |                     |
| Haul, Place & Compact                                     | 11650    | CY    | \$ 35.00     | \$ 407,750          |
| Backfill Characterization and Sampling                    | 15       | EA    | \$ 750.00    | \$ 11,250           |
| <b>Subtotal:</b>  |          |       |              | \$ <b>419,000</b>   |
| <b><u>Groundwater Management</u></b>                      |          |       |              |                     |
| Temporary Groundwater Treatment System                    | 1        | EST   | \$ 50,000.00 | \$ 50,000           |
| Temporary Discharge Permit/Fees                           | 1        | EST   | \$ 1,000.00  | \$ 1,000            |
| Confirmatory and Waste Characterization Analytical        | 2        | EST   | \$ 2,000.00  | \$ 4,000            |
| <b>Subtotal:</b>  |          |       |              | \$ <b>55,000</b>    |
| <b>Subtotal Capital Cost</b>                              |          |       |              | \$ <b>1,817,100</b> |
| Contractor Mobilization/Demobilization (5%)               |          |       |              | \$ 90,855           |
| Health and Safety (2%)                                    |          |       |              | \$ 36,342           |
| Engineering/Contingency (35%)                             |          |       |              | \$ 635,985          |
| <b>Total Cost</b>   |          |       |              | \$ <b>2,581,000</b> |



TABLE 10

**COST ESTIMATE FOR TRACK 2 RESIDENTIAL USE CLEANUP ALTERNATIVE  
REMEDIAL INVESTIGATION/ INTERIM REMEDIAL MEASURES/ ALTERNATIVES ANALYSIS REPORT**

**MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)  
BUFFALO, NEW YORK**

| Item  | Quantity | Units | Unit Cost    | Total Cost          |
|---|----------|-------|--------------|---------------------|
| <b>Completed IRMs (UST and AST)</b>                       | 1        | CM    | \$ 100,000   | <b>\$ 100,000</b>   |
| <b><u>Impacted Soil/Fill Removal</u></b>                  |          |       |              |                     |
| <b><u>RSCO Excavation</u></b>                             |          |       |              |                     |
| Soil/Fill Excavation & Hauling                            | 7500     | CY    | \$ 30.00     | \$ 225,000          |
| Disposal at TSDF (1.6 tons per CY)                        | 12000    | TON   | \$ 45.00     | \$ 540,000          |
| Waste Characterization Analytical                         | 8        | EA    | \$ 600.00    | \$ 4,800            |
| Post-Excavation Confirmatory Sampling                     | 100      | EA    | \$ 500.00    | \$ 50,000           |
| <b>Subtotal:</b>  |          |       |              | <b>\$ 819,800</b>   |
| <b><u>Backfill Excavation with Off-Site Soil/Fill</u></b> |          |       |              |                     |
| Haul, Place & Compact                                     | 7500     | CY    | \$ 35.00     | \$ 262,500          |
| Backfill Characterization and Sampling                    | 15       | EA    | \$ 750.00    | \$ 11,250           |
| <b>Subtotal:</b>  |          |       |              | <b>\$ 273,750</b>   |
| <b><u>Groundwater Management</u></b>                      |          |       |              |                     |
| Temporary Groundwater Treatment System                    | 1        | EST   | \$ 35,000.00 | \$ 35,000           |
| Temporary Discharge Permit/Fees                           | 1        | EST   | \$ 1,000.00  | \$ 1,000            |
| Confirmatory and Waste Characterization Analytical        | 2        | EST   | \$ 2,000.00  | \$ 4,000            |
| <b>Subtotal:</b>  |          |       |              | <b>\$ 40,000</b>    |
| <b>Subtotal Capital Cost</b>                              |          |       |              | <b>\$ 1,233,550</b> |
| Contractor Mobilization/Demobilization (5%)               |          |       |              | \$ 61,678           |
| Health and Safety (2%)                                    |          |       |              | \$ 24,671           |
| Engineering/Contingency (35%)                             |          |       |              | \$ 431,743          |
| <b>Total Cost</b>   |          |       |              | <b>\$ 1,751,641</b> |



TABLE 11

COST ESTIMATE FOR TRACK 4 RESTRICTED RESIDENTIAL USE CLEANUP ALTERNATIVE  
REMEDIAL INVESTIGATION/ INTERIM REMEDIAL MEASURES/ ALTERNATIVES ANALYSIS REPORT

MAIN & EAST BALCOM STREET SITE (BCP SITE NO. C915306)  
BUFFALO, NEW YORK

| Item   | Quantity | Units | Unit Cost     | Total Cost          |
|--|----------|-------|---------------|---------------------|
| Completed IRMs (UST and AST)   | 1        | NA    | \$ 100,000    | \$ 100,000          |
| Confirmatory SVI and MW-4 cVOC Assessment                                  | 1        | EST   | \$ 25,000.00  | \$ 25,000           |
| <b><u>Impacted Soil/Fill Removal</u></b><br><b><u>RRSCO Excavation</u></b> |          |       |               |                     |
| Soil/Fill Excavation & Hauling   | 1200     | CY    | \$ 30.00      | \$ 36,000           |
| Disposal at TSDF (1.6 tons per CY)   | 1920     | TON   | \$ 45.00      | \$ 86,400           |
| Waste Characterization Analytical  | 8        | EA    | \$ 600.00     | \$ 4,800            |
| Post-Excavation Confirmatory Sampling                                      | 100      | EA    | \$ 500.00     | \$ 50,000           |
| <b>Subtotal:</b>   |          |       |               | <b>\$ 177,200</b>   |
| <b><u>Backfill Excavation with Off-Site Soil/Fill</u></b>                  |          |       |               |                     |
| Haul, Place & Compact  | 1200     | CY    | \$ 35.00      | \$ 42,000           |
| Backfill Characterization and Sampling                                     | 5        | EA    | \$ 750.00     | \$ 3,750            |
| <b>Subtotal:</b>   |          |       |               | <b>\$ 45,750</b>    |
| <b><u>Additional Soil/Fill Exceeding SCOs</u></b>                          |          |       |               |                     |
| Soil/Fill Excavation & Hauling   | 1000     | CY    | \$ 30.00      | \$ 30,000           |
| Disposal at TSDF (1.6 tons per CY)   | 1600     | TON   | \$ 45.00      | \$ 72,000           |
| Waste Characterization Analytical  | 2        | EA    | \$ 600.00     | \$ 1,200            |
| Post-Excavation Confirmatory Sampling                                      | 25       | EA    | \$ 500.00     | \$ 12,500           |
| <b>Subtotal:</b>   |          |       |               | <b>\$ 115,700</b>   |
| <b><u>Cover System</u></b>   |          |       |               |                     |
| Asphalt, concrete and soil cover   | 1        | EST   | \$ 150,000.00 | \$ 150,000          |
| Cover Soil Characterization and Sampling                                   | 5        | EA    | \$ 750.00     | \$ 3,750            |
| <b>Subtotal:</b>   |          |       |               | <b>\$ 161,250</b>   |
| <b>Subtotal Capital Cost</b>   |          |       |               | <b>\$ 624,900</b>   |
| Contractor Mobilization/Demobilization (5%)                                |          |       |               | \$ 31,245           |
| Health and Safety (2%)   |          |       |               | \$ 12,498           |
| Engineering/Contingency (35%)  |          |       |               | \$ 218,715          |
| <b>Total Capital Cost</b>  |          |       |               | <b>\$ 887,358</b>   |
| <b><u>Institutional Controls</u></b>                                       |          |       |               |                     |
| Environmental Easement   | 1        | LS    | \$ 10,000.00  | \$ 10,000           |
| Site Management Plan   | 1        | LS    | \$ 15,000.00  | \$ 15,000           |
| <b>Subtotal:</b>   |          |       |               | <b>\$ 25,000</b>    |
| <b><u>Annual Operation Maintenance &amp; Monitoring (OM&amp;M):</u></b>    |          |       |               |                     |
| Groundwater Monitoring   | 2        | EA    | \$ 5,000.00   | \$ 10,000           |
| Annual Certification   | 1        | YR    | \$ 3,500.00   | \$ 3,500            |
| <b>Total Annual OM&amp;M Cost</b>  |          |       |               | <b>\$ 13,500</b>    |
| <b><u>Engineering Controls (GWM) OM&amp;M Present Worth (PW):</u></b>      |          |       |               |                     |
| Number of Years ( n ):   |          |       |               | 5                   |
| Interest Rate ( I ):   |          |       |               | 3%                  |
| p/A value:   |          |       |               | 4.58                |
| <b>EC OM&amp;M Present Worth (PW):</b>                                     |          |       |               | <b>\$ 45,790</b>    |
| <b><u>Annual Certification OM&amp;M Present Worth (PW):</u></b>            |          |       |               |                     |
| Number of Years ( n ):   |          |       |               | 30                  |
| Interest Rate ( I ):   |          |       |               | 3%                  |
| p/A value:   |          |       |               | 19.6                |
| <b>Annual Certification OM&amp;M Present Worth (PW):</b>                   |          |       |               | <b>\$ 68,600</b>    |
| <b>Total OM&amp;M Present Worth (PW):</b>                                  |          |       |               | <b>\$ 114,390</b>   |
| <b>Total Cost</b>  |          |       |               | <b>\$ 1,027,000</b> |





**TABLE 12**  
**COMPARISON OF REMEDIAL ALTERNATIVES**  
**MAIN & EAST BALCOM STREET SITE**  
**BUFFALO, NEW YORK**

| Remedial Alternative              | NYSDEC DER-10 Evaluation Criteria |         |               |              |              |              |             |              |             |
|-----------------------------------|-----------------------------------|---------|---------------|--------------|--------------|--------------|-------------|--------------|-------------|
|                                   | 1. Overall                        | 2. SCGs | 3. Eff & Perm | 4. Reduction | 5. Imp & Eff | 6. Implement | 7. Cost Eff | 8. Community | 9. Land Use |
| Alternative 1 - No Further Action |                                   |         |               |              |              | ✓            | ✓           | TBE          |             |
| Alternative 2 - Track 1 Cleanup   | ✓                                 | ✓       | ✓             | ✓            |              |              |             | TBE          |             |
| Alternative 3 - Track 2 Cleanup   | ✓                                 | ✓       | ✓             | ✓            |              |              |             | TBE          | ✓           |
| Alternative 4 - Track 4 Cleanup   | ✓                                 | ✓       | ✓             | ✓            | ✓            | ✓            | ✓           | TBE          | ✓           |

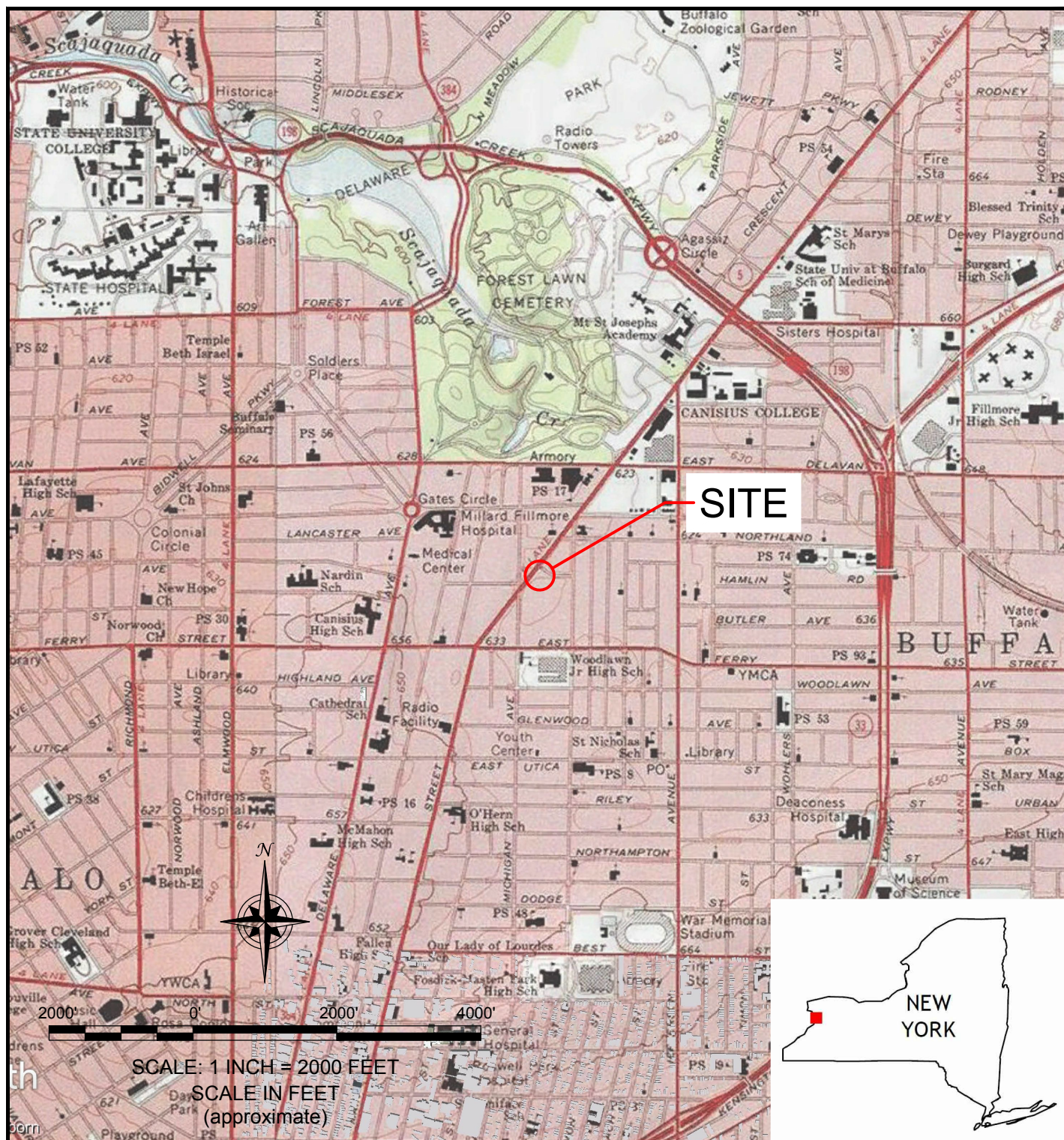
**Notes:**

1. Overall Protectiveness of Public Health and the Environment
2. Compliance with Standards, Criteria, and Guidance (SCGs)
3. Long-Term Effectiveness and Permanence
4. Reduction of Toxicity, Mobility, or Volume of Contamination through Treatment
5. Short-Term Impacts and Effectiveness
6. Implementability (Technical and Administrative)
7. Cost Effectiveness (Costs noted include costs of the IRMs completed)
8. Community Acceptance
9. Land Use

- ✓ = Alternative satisfies criterion  
TBE = To be evaluated following public comment period

## FIGURES

**FIGURE 1**



2558 HAMBURG TURNPIKE, SUITE 300, BUFFALO, NY 14218, (716) 856-0599



PROJECT NO.: B0239-016-001

DATE: DECEMBER 2017

DRAFTED BY: CMS

## SITE LOCATION AND VICINITY MAP

RI/IRM/AA REPORT

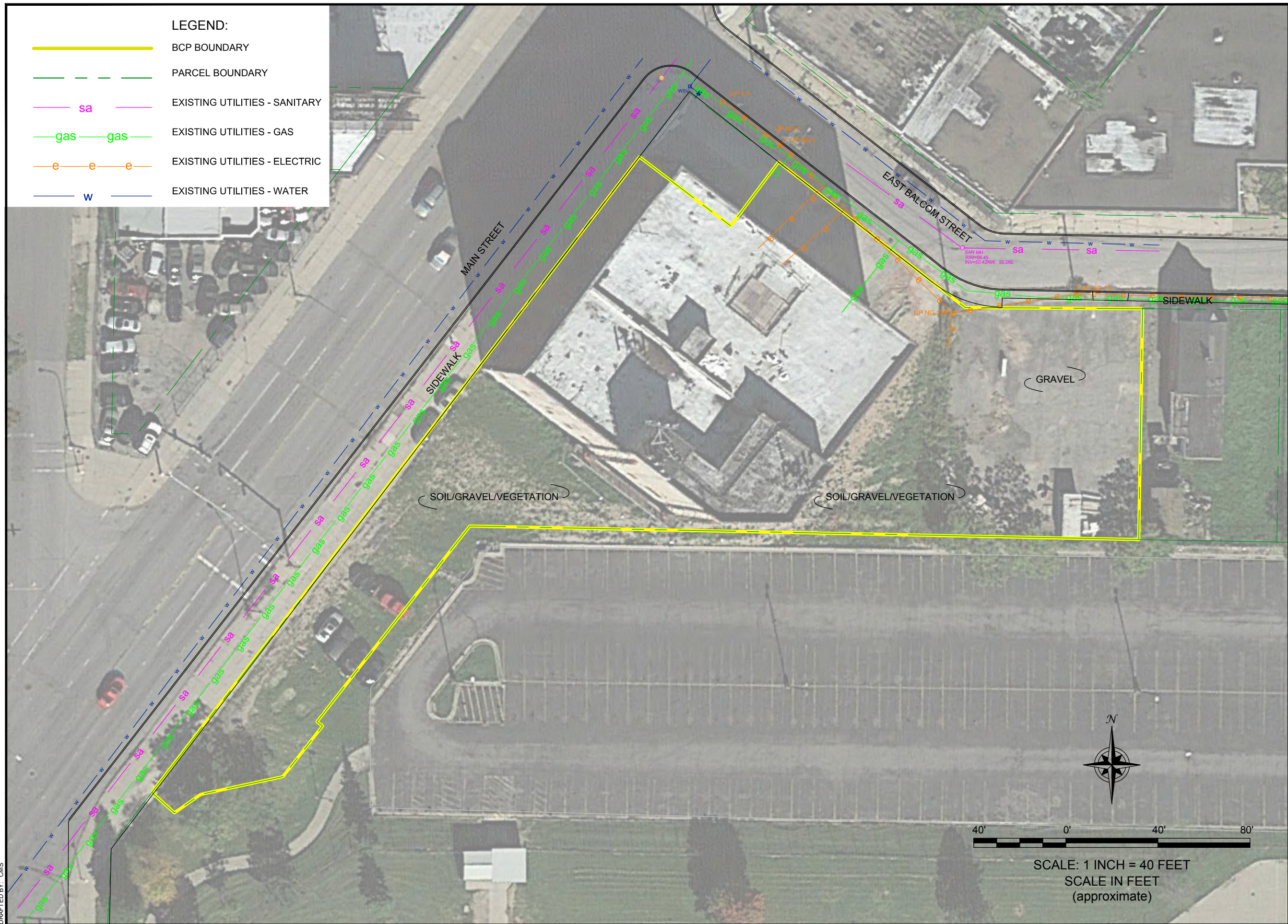
MAIN & EAST BALCOM STREET SITE  
BCP SITE NO. C915306  
BUFFALO, NEW YORK

PREPARED FOR

1665 MAIN STREET GROUP, LLC

**DISCLAIMER:** PROPERTY OF BENCHMARK ENVIRONMENTAL ENGINEERING & SCIENCE, PLLC. & TURNKEY ENVIRONMENTAL RESTORATION, LLC **IMPORTANT:** THIS DRAWING PRINT IS LOANED FOR MUTUAL ASSISTANCE AND AS SUCH IS SUBJECT TO RECALL AT ANY TIME. INFORMATION CONTAINED HEREON IS NOT TO BE DISCLOSED OR REPRODUCED IN ANY FORM FOR THE BENEFIT OF PARTIES OTHER THAN NECESSARY SUBCONTRACTORS & SUPPLIERS WITHOUT THE WRITTEN CONSENT OF BENCHMARK ENVIRONMENTAL ENGINEERING & SCIENCE, PLLC & TURNKEY ENVIRONMENTAL RESTORATION, LLC.





# **SITE PLAN (AERIAL)**

RI/IRM/AA REPORT  
MAIN & EAST BALCOM STREET SITE  
BCP SITE NO. C915306  
BUFFALO, NEW YORK  
PREPARED FOR  
1665 MAIN STREET GROUP, LLC



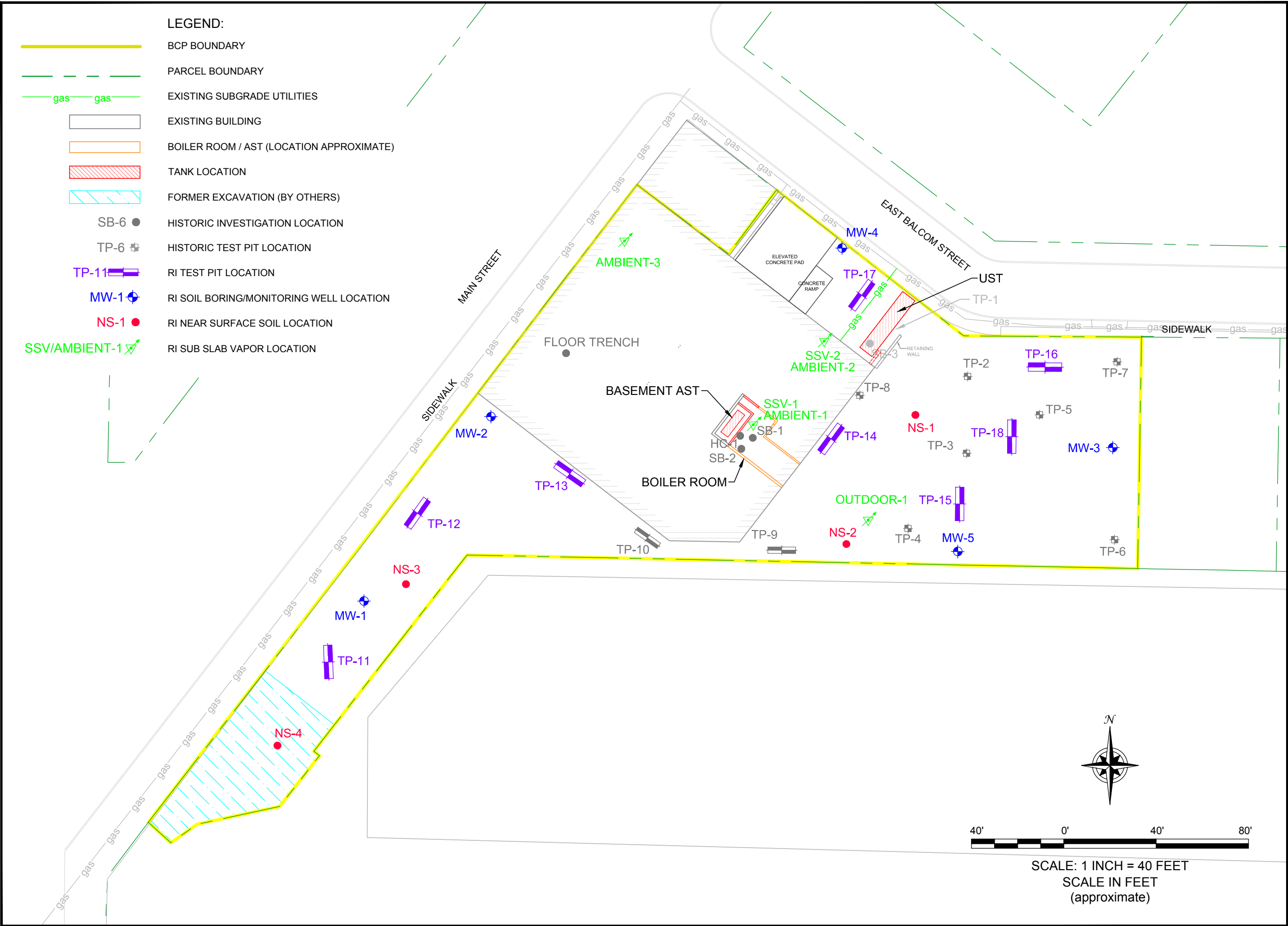
2558 HAMBURG TURNPIKE, SUITE 300, BUFFALO, NY 14218, (716) 856-0599

JOB NO.: 0239-016-001

## FIGURE 2

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2558 HAMBURG TURNPIKE, SUITE 300, BUFFALO, NY 14218, (716) 856-0599

**REMEDIAL INVESTIGATION SAMPLE LOCATIONS**

R/IRM/AA REPORT

MAIN & EAST BALCOM STREET SITE

BCP SITE NO. C915306

BUFFALO, NEW YORK

PREPARED FOR

1665 MAIN STREET GROUP, LLC

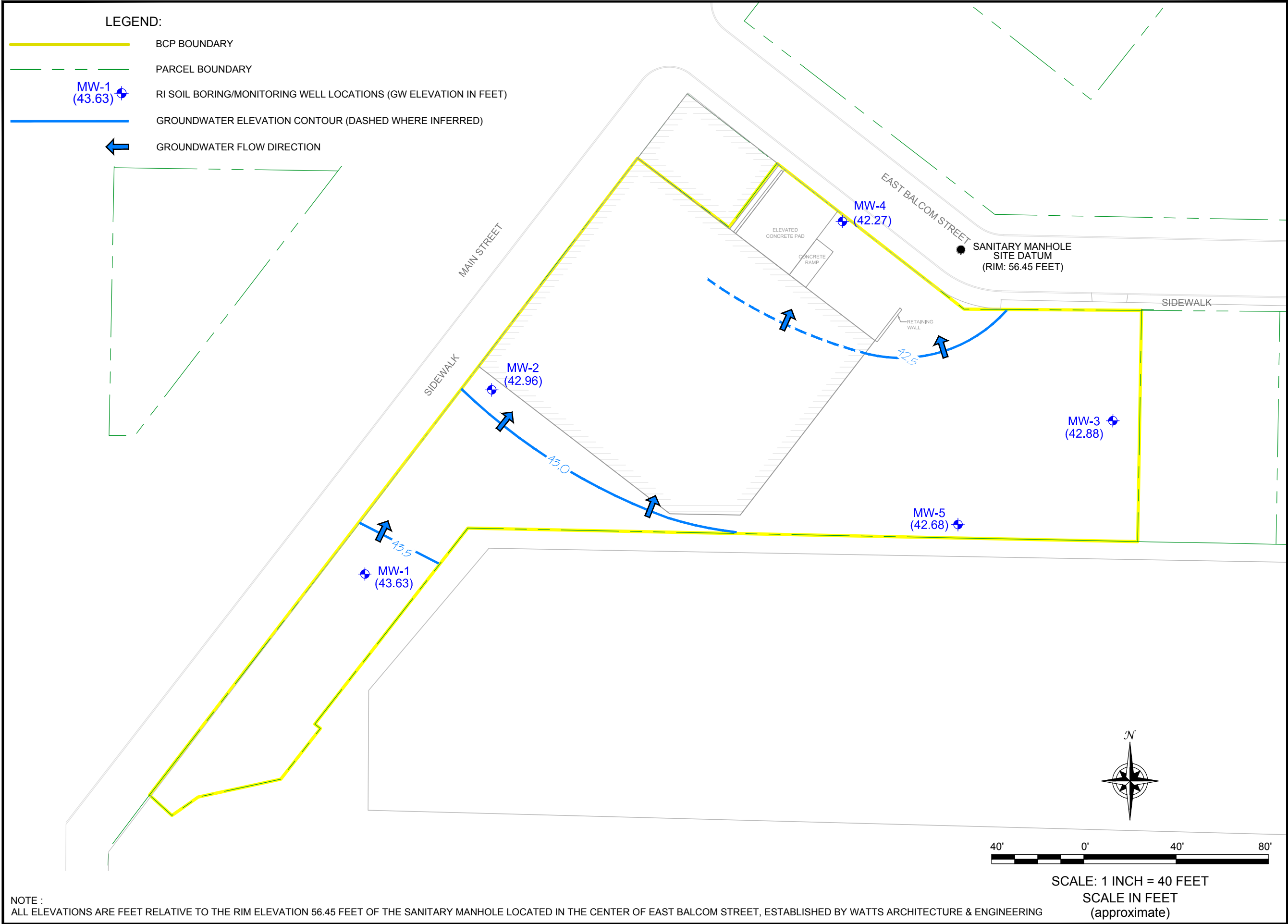
**FIGURE 3**

JOB NO.: 0239-016-001

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F:\CAD\TurnKey\Sinatra\1653-1661 Main Street Site\RI-IRM-AA Report\Figure 4 - Groundwater Isopotential Map.dwg

DATE: APRIL 2018  
DRAFTED BY: CMSCCB



GROUNDWATER ISOPOTENTIAL MAP

R/IRM/AA REPORT  
MAIN & EAST BALCOM STREET SITE  
BCP SITE NO. C915306  
BUFFALO, NEW YORK  
PREPARED FOR  
1665 MAIN STREET GROUP, LLC



2558 HAMBURG TURNPIKE, SUITE 300, BUFFALO, NY 14218, (716) 856-0599

JOB NO.: 0239-016-001

FIGURE 4

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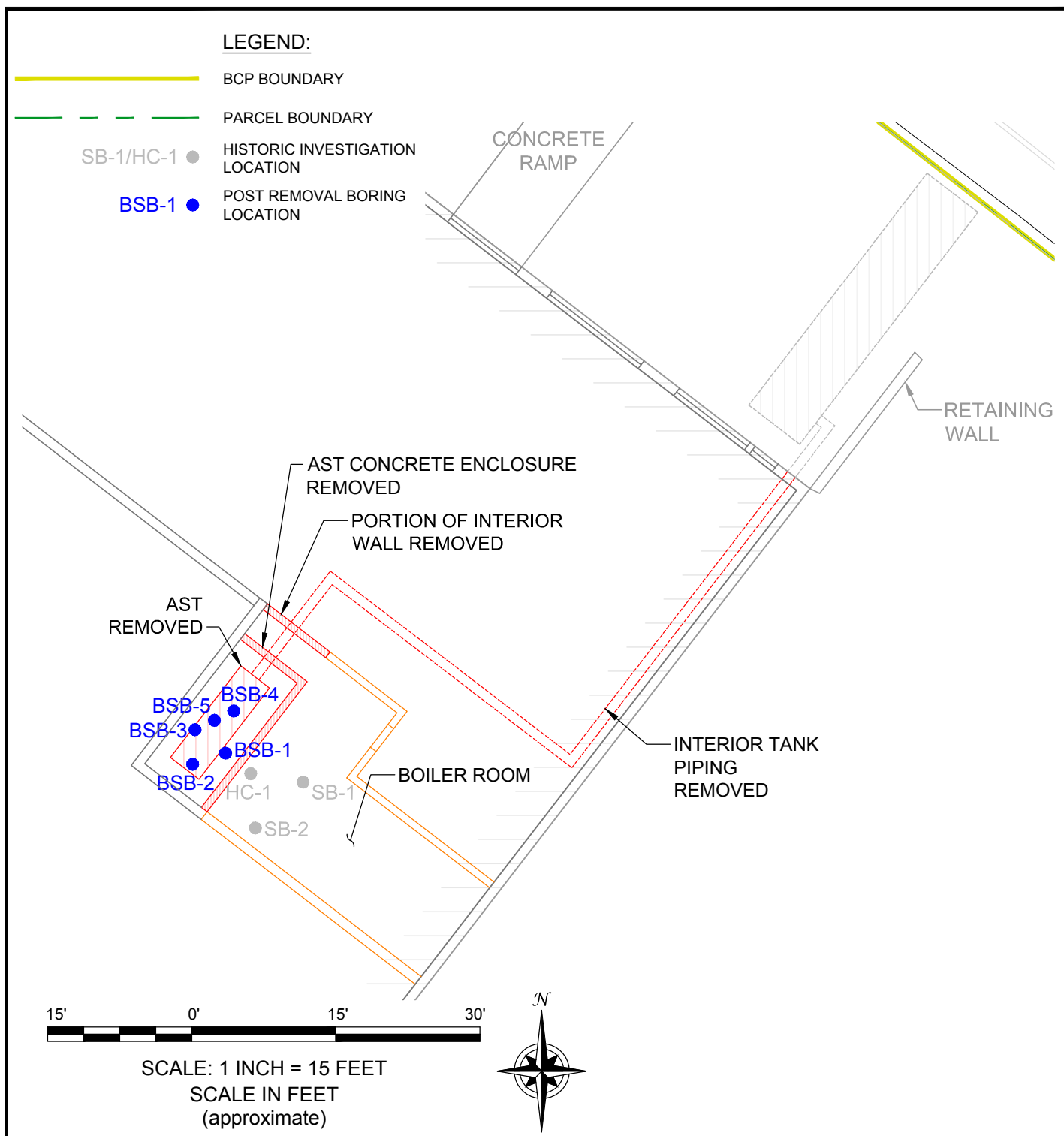


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1665 MAIN STREET GROUP, LLC

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# FIGURE 6



2558 HAMBURG TURNPIKE, SUITE 300, BUFFALO, NY 14218, (716) 856-0599

PROJECT NO.: 0239-016-001

DATE: DECEMBER 2017

DRAFTED BY: CMS



## INTERIOR AST IRM ACTIVITIES

RI/IRM/AA REPORT

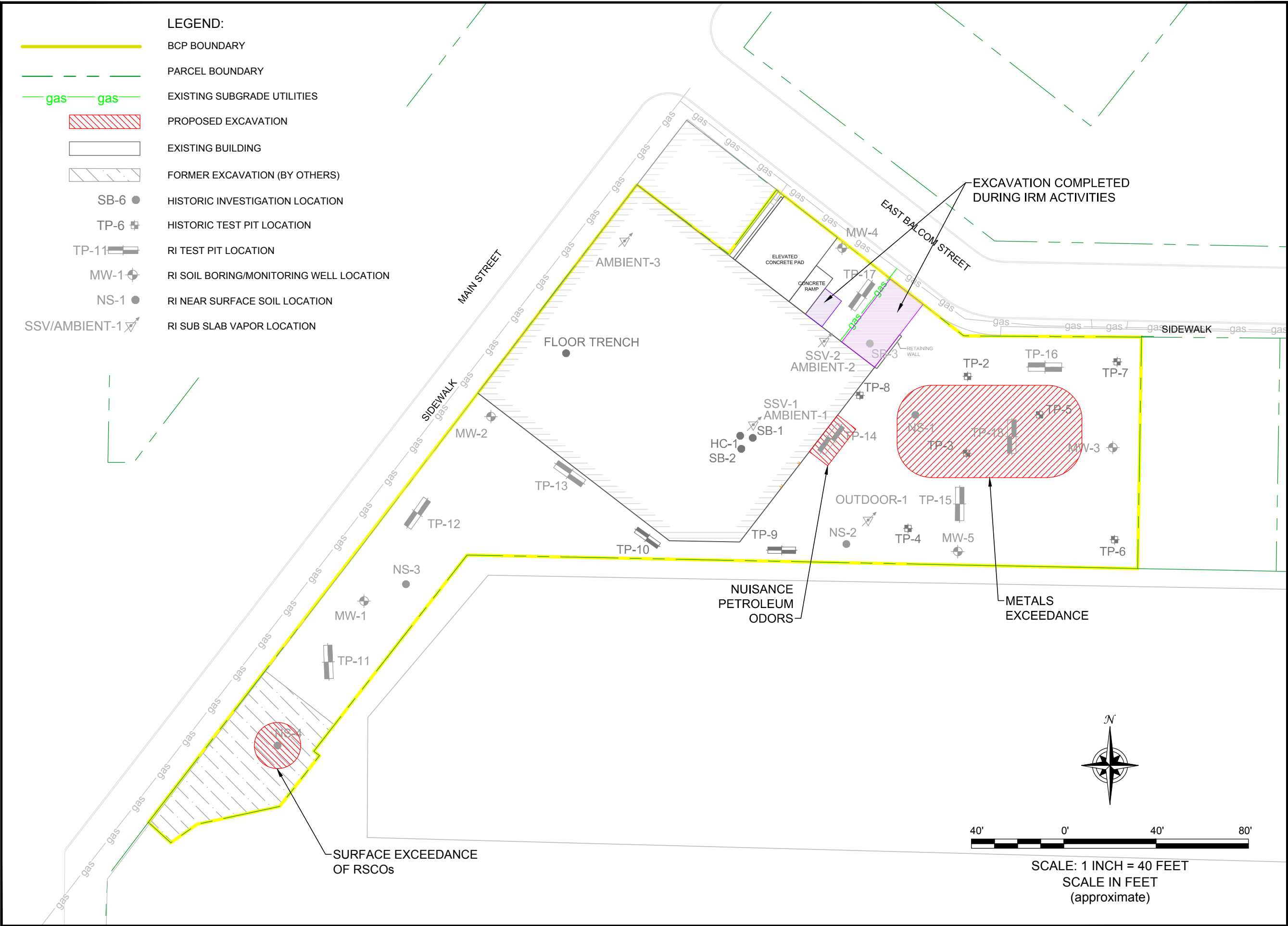
MAIN & EAST BALCOM STREET SITE  
BCP SITE NO. C915306  
BUFFALO, NEW YORK

PREPARED FOR

1665 MAIN STREET GROUP, LLC

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**TRACK 4 RESTRICTED RESIDENTIAL  
CLEANUP ALTERNATIVE**

R/IRM/AA REPORT  
MAIN & EAST BALCOM STREET SITE  
BCP SITE NO. C915306  
BUFFALO, NEW YORK  
PREPARED FOR  
1665 MAIN STREET GROUP, LLC



2558 HAMBURG TURNPIKE, SUITE 300, BUFFALO, NY 14218, (716) 856-0599

JOB NO.: 0239-016-001

**FIGURE 7**

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# APPENDIX A

## PROJECT PHOTOLOG

## SITE PHOTOGRAPHS

Photo 1:



Photo 2:



Photo 3:



Photo 4:



Photo 1: RI Test Pit (TP) – TP-14

Photo 2: RI TP – TP-14 soil-fill horizons – grey soils at 9-10'.

Photo 3: RI-TP – TP-15

Photo 4: RI TP - TP-15 (East Balcom parking lot) – fill horizons to 8 ft.



## SITE PHOTOGRAPHS

Photo 5:



Photo 6:

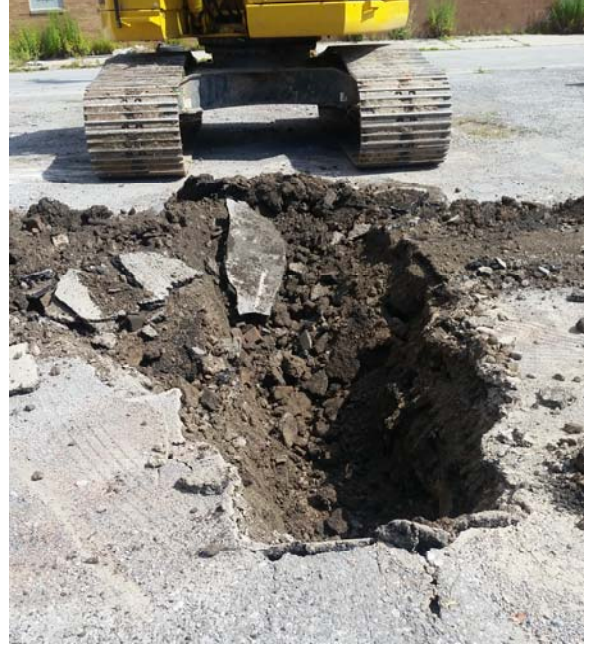


Photo 7:



Photo 8:



Photo 5: RI TP – TP-18 (East Balcom parking lot)

Photo 6: RI TP – TP-18 subgrade fill material ranging from 6-8 ft.

Photo 7: RI TP – Representative subgrade fill material East Balcom parking lot.

Photo 8: RI TP – TP-16 fill material.



## SITE PHOTOGRAPHS

Photo 9:



Photo 10:



Photo 11:



Photo 12:



Photo 9: RI TP – TP-13 Fill material

Photo 10: RI Near Surface (NS) – NS-3.

Photo 11: RI NS – NS-4 soil-fill horizon (former building demolition backfill).

Photo 12: RI NS – NS-1 Soil-fill.



## SITE PHOTOGRAPHS

Photo 13:



Photo 14:



Photo 15:



Photo 16:



Photo 13: RI Soil Boring (SB) – Representative soil boring and well installation (MW-3)

Photo 14: RI SB – Representative soil-fill sample retrieved.

Photo 15: RI MW – Installation of MW-2.

Photo 16: RI MW – Surface finished MW-2.

## SITE PHOTOGRAPHS

Photo 17:



Photo 18:



Photo 19:



Photo 20:



Photo 17: RI Soil Vapor Intrusion (SVI) Sampling – Pre-sampling conditions (SSV-2)

Photo 18: RI SVI – SSV-2 with BD.

Photo 19: RI SVI - SSV-1 (note basement sheeting).

Photo 20: RI SVI – SSV-1.



## SITE PHOTOGRAPHS

Photo 21:



Photo 22:



Photo 23:



Photo 24:



Photo 21: UST IRM: Excavation and uncovering of UST.

Photo 22: UST IRM: Uncovering UST.

Photo 23: UST IRM: Temporary stockpiling excavation spoils.

Photo 24: UST IRM: Uncovering UST fill and vent lines.



## SITE PHOTOGRAPHS

Photo 25:



Photo 26:



Photo 27:



Photo 28:



Photo 25: UST IRM: Vacuuming/Cleaning out UST contents

Photo 26: UST IRM: Removing UST and staging on temporary stockpile.

Photo 27: UST IRM: Cleaning of exterior soils.

Photo 28: UST IRM: Loading for offsite recycling as scrap.



## SITE PHOTOGRAPHS

Photo 29:



Photo 30:



Photo 31:



Photo 32:



Photo 29: UST IRM: Excavation of petroleum impacted soil-fill

Photo 30: UST IRM: Excavation of petroleum impacted soil-fill

Photo 31: UST IRM: Excavation of petroleum impacted soil-fill

Photo 32: UST IRM: UST excavation – note active gas line.



## SITE PHOTOGRAPHS

Photo 33:



Photo 34:



Photo 35:



Photo 36:



Photo 33: UST IRM: Confirmatory TP-17 – westside of gas line (no impacts)

Photo 34: UST IRM: Confirmatory TP-17 – westside of gas line (no impacts)

Photo 35: UST IRM: Backfilling UST excavation

Photo 36: Pump Island IRM: Excavation of TP-19 in vicinity of suspect pump island.



## SITE PHOTOGRAPHS

Photo 37:



Photo 38:



Photo 39:



Photo 40:



Photo 37: Pump Island IRM: Excavation of petroleum impacts.  
Photo 38: Pump Island IRM: Excavation of petroleum impacts  
Photo 39: Pump Island IRM: Backfilling Pump Island excavation  
Photo 40: UST & Pump Island IRMs: Backfill.

## SITE PHOTOGRAPHS

Photo 41:



Photo 42:



Photo 43:



Photo 44:

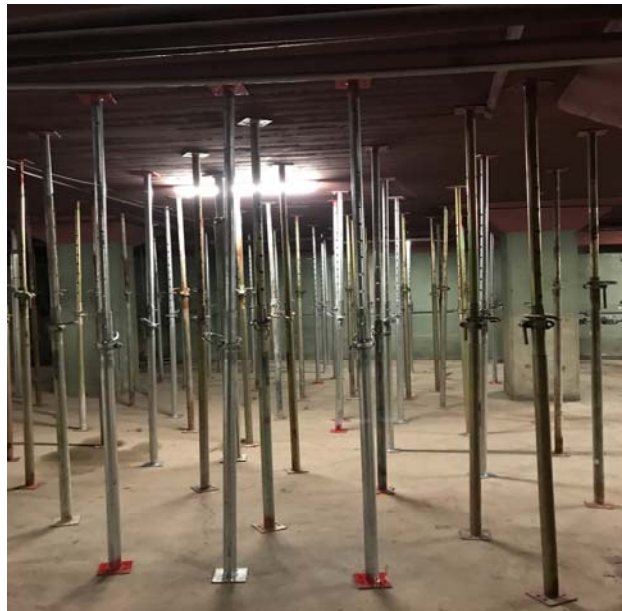


Photo 41: AST IRM: Basement AST within concrete enclosure

Photo 42: AST IRM: Exterior of concrete basement AST enclosure

Photo 43: AST IRM: Post shoring installation

Photo 44: AST IRM: Post shoring installation.



## SITE PHOTOGRAPHS

Photo 45:



Photo 46:



Photo 47:



Photo 48:

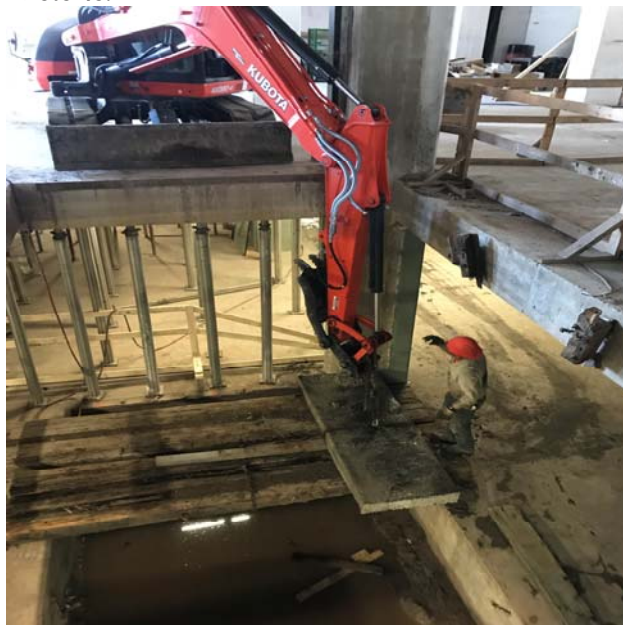


Photo 45: AST IRM: Lowering equipment for AST removal.

Photo 46: AST IRM: Cutting of concrete enclosure.

Photo 47: AST IRM:

Photo 48: AST IRM: Removal of concrete from basement.

## SITE PHOTOGRAPHS

Photo 49:



Photo 50:



Photo 51:



Photo 52:



Photo 49: AST IRM: Removal of contents from AST and lines.

Photo 50: AST IRM: Removal of AST

Photo 51: AST IRM: Removal of AST.

Photo 52: AST IRM: Removal of AST from basement.



## SITE PHOTOGRAPHS

Photo 53:



Photo 54:



Photo 55:



Photo 56:



Photo 53: AST IRM: AST fill and vent line removal.

Photo 54: AST IRM: Former AST enclosure area (post-removal).

Photo 55: AST IRM: Post-AST Removal subslab confirmatory sampling

Photo 56: AST IRM: Patching concrete floor post-sampling.



## APPENDIX B

### FIELD BOREHOLE LOGS AND WELL COMPLETION DETAILS

# TEST PIT EXCAVATION LOG

**Project No:** B0239-016-001

**Test Pit I.D.:** TP-11

**Project:** Main & East Balcom Street Site

**Logged By:** CCB

**Client:** 1665 Main Street Group, LLC

**Checked By:**

**Site Location:** Buffalo, NY

**TurnKey Environmental Restoration, LLC**  
2558 Hamburg Turnpike, Suite 300  
Buffalo, NY 14218  
(716) 856-0635



| SUBSURFACE PROFILE |                 |   |                   | PID<br>VOCs                   | Lab<br>Sample    | Remarks |
|--------------------|-----------------|---|-------------------|-------------------------------|------------------|---------|
| Depth<br>(fbgs)    | Elev.<br>/Depth | Description<br><br>(ASTM D2488: Visual-Manual Procedure)  | Lithologic Symbol |                               |                  |         |
|                    |                 |   |                   | 0    100    300    500<br>ppm |                  |         |
| 0.0                | 0.0             | Ground Surface  |                   |                               |                  |         |
|                    |                 | <b>Topsoil/Overburden Fill</b><br>Brown/grey, moist, loose when disturbed mostly low plasticity fines, some subrounded gravel, trace fine sand, no odors. |                   |                               |                  |         |
|                    | -1.5<br>1.5     | <b>Clay</b><br>Reddish brown, moist, mostly medium plasticity fines, few subrounded gravel, stiff, no odors.  |                   |                               |                  |         |
|                    |                 |   |                   |                               | Sample Collected |         |
|                    | -8.0<br>8.0     | End of Test Pit   |                   |                               |                  |         |
| 10.0               |                 |   |                   |                               |                  |         |

**Excavated By: R.E. Lorenze, Inc.**

**Excavator Type: Case**

**Excavation Date(s): 7/18/2017**

**Comments:**

**Length: 10**

**Width: 2**

**Depth: 8**

***Depth to Water: None***

**Visual Impacts: None**

**Olfactory Observations:** None

# TEST PIT EXCAVATION LOG

**Project No:** B0239-016-001

**Test Pit I.D.:** TP-12

**Project:** Main & East Balcom Street Site

**Logged By:** CCB

**Client:** 1665 Main Street Group, LLC

**Checked By:**

**Site Location:** Buffalo, NY



**TurnKey Environmental Restoration, LLC**  
 2558 Hamburg Turnpike, Suite 300  
 Buffalo, NY 14218  
 (716) 856-0635

| SUBSURFACE PROFILE |                 |   |                   | PID<br>VOCs | Lab<br>Sample    | Remarks |
|--------------------|-----------------|---|-------------------|-------------|------------------|---------|
| Depth<br>(fbgs)    | Elev.<br>/Depth | Description<br>(ASTM D2488: Visual-Manual Procedure)  | Lithologic Symbol |             |                  |         |
| 0.0                | 0.0             | Ground Surface  |                   | 0           |                  |         |
|                    |                 | <b>Topsoil</b><br>Brown, moist, loose when disturbed, mostly low plasticity fines, some fine sand, no odors.  |                   | 0.0         |                  |         |
|                    | -1.5            |   |                   |             |                  |         |
|                    | 1.5             | <b>Fill</b><br>Brown/black/grey, moist, loose when disturbed, mostly low to medium plasticity fines, few fine sand, few coarse gravel, trace brick, no odors.   |                   |             |                  |         |
|                    |                 |   |                   |             |                  |         |
|                    | -4.5            |   |                   |             |                  |         |
| 5.0                | 4.5             | <b>Fill with Slag and Ash</b><br>Black, moist, mostly non-plastic fines, some low plasticity fines, some slag, some coarse gravel, few wood, slight sewer odor. |                   | 0.3         | Sample Collected |         |
|                    |                 |   |                   |             |                  |         |
|                    | -6.5            |   |                   |             |                  |         |
|                    | 6.5             | <b>Fill</b><br>Brown/black/grey, moist, loose when disturbed, mostly low to medium plasticity fines, few fine sand, few coarse gravel, trace brick, no odors.   |                   | 0.0         |                  |         |
|                    |                 |   |                   |             |                  |         |
| 10.0               |                 | Building foundation observed at 11 fbgs.  |                   |             |                  |         |
|                    | -11.0           |   |                   |             |                  |         |
|                    | 11.0            | <b>Reworked Sandy Clay</b><br>Brown/grey, moist, mostly medium plasticity fines, some fine sand, few subrounded gravel, few brick, no odors.                    |                   |             |                  |         |
|                    | -12.0           |   |                   |             |                  |         |
|                    | 12.0            | <b>Sandy Clay</b><br>Brown, moist to wet (12.5'), mostly medium plasticity fines, some fine sand, few subrounded gravel, no odors.                              |                   | 0.0         |                  |         |
|                    | -13.0           |   |                   |             |                  |         |
|                    | 13.0            | End of Test Pit   |                   |             |                  |         |
| 15.0               |                 |   |                   |             |                  |         |

**Excavated By:** R.E. Lorenze, Inc.

**Length:** 10

**Depth to Water:** None

**Excavator Type:** Case

**Width:** 2

**Visual Impacts:** None

**Excavation Date(s):** 7/18/2017

**Depth:** 13

**Olfactory Observations:** Slight Sewer Odor

**Comments:**

# TEST PIT EXCAVATION LOG



TurnKey Environmental Restoration, LLC  
2558 Hamburg Turnpike, Suite 300  
Buffalo, NY 14218  
(716) 856-0635

**Project No:** B0239-016-001

**Test Pit I.D.:** TP-13

**Project:** Main & East Balcom Street Site

**Logged By:** CCB

**Client:** 1665 Main Street Group, LLC

**Checked By:**

**Site Location:** Buffalo, NY

| SUBSURFACE PROFILE |                 |  |                   | PID<br>VOCs       | Lab<br>Sample    | Remarks |
|--------------------|-----------------|--|-------------------|-------------------|------------------|---------|
| Depth<br>(fbgs)    | Elev.<br>/Depth | Description<br>(ASTM D2488: Visual-Manual Procedure)   | Lithologic Symbol |                   |                  |         |
| 0.0                | 0.0             | Ground Surface   |                   | 0 100 300 500 ppm |                  |         |
|                    |                 | <b>Topsoil/Overburden Fill</b><br>Brown, moist, loose when disturbed mostly low plasticity fines, some subrounded gravel, trace fine sand, no odors. |                   | 0.0               |                  |         |
|                    | -2.0            |  |                   |                   |                  |         |
|                    | 2.0             | <b>Reworked Overburden Fill</b><br>Reddish/brown, moist, mostly low to medium plasticity fines, some coarse gravel, no odors.                        |                   | 0.0               |                  |         |
|                    |                 |  |                   |                   |                  |         |
|                    | -4.0            |  |                   |                   |                  |         |
|                    | 4.0             | <b>Fine Sand</b><br>Brown, moist, loose, mostly non-plastic fines, few medium plasticity fines, few coarse gravel, no odors.                         |                   | 0.0               | Sample Collected |         |
| 5.0                |                 |  |                   |                   |                  |         |
|                    |                 |  |                   |                   |                  |         |
|                    |                 |  |                   |                   |                  |         |
|                    | -9.0            |  |                   | 0.0               |                  |         |
|                    | 9.0             | <b>Sandy Clay</b><br>Brown, wet (9.5) to moist, mostly medium plasticity fines, some fine sand, few subrounded gravel, trace silt stiff, no odors.   |                   |                   |                  |         |
| 10.0               |                 |  |                   |                   |                  |         |
|                    |                 |  |                   |                   |                  |         |
|                    |                 |  |                   |                   |                  |         |
|                    | -13.0           |  |                   | 0.0               |                  |         |
|                    | 13.0            | End of Test Pit  |                   |                   |                  |         |
| 15.0               |                 |  |                   |                   |                  |         |

**Excavated By:** R.E. Lorenze, Inc.

**Length:** 15

**Depth to Water:** None

**Excavator Type:** Case

**Width:** 2

**Visual Impacts:** None

**Excavation Date(s):** 7/18/2017

**Depth:** 13

**Olfactory Observations:** None

**Comments:**

# TEST PIT EXCAVATION LOG



TurnKey Environmental Restoration, LLC  
2558 Hamburg Turnpike, Suite 300  
Buffalo, NY 14218  
(716) 856-0635

**Project No:** B0239-016-001

**Test Pit I.D.:** TP-14

**Project:** Main & East Balcom Street Site

**Logged By:** CCB

**Client:** 1665 Main Street Group, LLC

**Checked By:**

**Site Location:** Buffalo, NY

| SUBSURFACE PROFILE |                 |  |                   | PID<br>VOCs | Lab<br>Sample    | Remarks |
|--------------------|-----------------|--|-------------------|-------------|------------------|---------|
| Depth<br>(fbgs)    | Elev.<br>/Depth | Description<br>(ASTM D2488: Visual-Manual Procedure)   | Lithologic Symbol |             |                  |         |
| 0.0                | 0.0             | Ground Surface   |                   | 0           |                  |         |
|                    |                 | <b>Topsoil</b><br>Brown, moist, loose when disturbed, low plasticity fines, trace sand, no odors.  |                   | 0.0         |                  |         |
|                    | -1.0            |  |                   |             |                  |         |
|                    | 1.0             | <b>Fill</b><br>Brown, moist, mostly low to medium plasticity fines, few fine sand, few coarse gravel, trace brick, stiff, no odors.  |                   |             |                  |         |
|                    |                 |  |                   |             |                  |         |
|                    |                 |  |                   |             |                  |         |
| 5.0                |                 | Sanitary pipe observed at 5.5 fbgs   |                   |             |                  |         |
|                    |                 |  |                   |             |                  |         |
|                    |                 |  |                   |             |                  |         |
|                    | -8.0            |  |                   |             |                  |         |
|                    | 8.0             | <b>Grey Sandy Clay</b><br>Grey, moist, mostly medium plasticity fines, little fine sand, stiff, slight petroleum-like odor.  |                   |             |                  |         |
|                    |                 |  |                   |             |                  |         |
|                    | -9.0            |  |                   | 56.0        |                  |         |
|                    | 9.0             | <b>Reddish Brown Sandy Clay</b><br>Reddish brown, moist to wet (10.75'), mostly medium to high plasticity fines, little fine sand, few subrounded gravel, stiff, slight petroleum-like odor. |                   |             |                  |         |
| 10.0               |                 |  |                   |             | Sample Collected |         |
|                    |                 |  |                   | 105.0       |                  |         |
|                    | -11.0           |  |                   |             |                  |         |
|                    | 11.0            | End of Test Pit  |                   | 0.0         |                  |         |

**Excavated By:** R.E. Lorenze, Inc.

**Length:** 10

**Depth to Water:** 10.75 fbgs

**Excavator Type:** Case

**Width:** 2

**Visual Impacts:** Slight sheen on water

**Excavation Date(s):** 7/18/2017

**Depth:** 11

**Olfactory Observations:** Slight Petroleum-like Odor

**Comments:**

Sheet: 1 of 1

# TEST PIT EXCAVATION LOG

**Project No:** B0239-016-001

**Test Pit I.D.:** TP-15

**Project:** Main & East Balcom Street Site

**Logged By:** CCB

**Client:** 1665 Main Street Group, LLC

**Checked By:**

**Site Location:** Buffalo, NY



**TurnKey Environmental Restoration, LLC**  
**2558 Hamburg Turnpike, Suite 300**  
**Buffalo, NY 14218**  
**(716) 856-0635**

| SUBSURFACE PROFILE |                 |   |                   | PID<br>VOCs       | Lab<br>Sample    | Remarks |
|--------------------|-----------------|---|-------------------|-------------------|------------------|---------|
| Depth<br>(fbgs)    | Elev.<br>/Depth | Description<br>(ASTM D2488: Visual-Manual Procedure)  | Lithologic Symbol |                   |                  |         |
| 0.0                | 0.0             | Ground Surface  |                   | 0 100 300 500 ppm |                  |         |
|                    | 0.0             | <b>Asphalt and Gravel</b><br>Black/grey, dry, no odors.   |                   | 0.0               |                  |         |
|                    | -1.5            | <b>Overburden Fill</b><br>Dark brown, moist, mostly low plasticity fines, some well sorted gravel, trace fine sand, no odors.                     |                   | 0.0               |                  |         |
|                    | 1.5             | <b>Reworked Overburden Fill</b><br>Reddish orange and black, moist, mostly low to medium plasticity fines, some coarse gravel and slag, no odors. |                   | 0.0               | Sample Collected |         |
|                    | -3.5            |   |                   |                   |                  |         |
|                    | 3.5             | <b>Clay</b><br>Reddish brown, moist, mostly medium plasticity fines, few subrounded gravel, stiff, no odors.                                      |                   | 0.0               |                  |         |
| 5.0                |                 |   |                   |                   |                  |         |
|                    |                 |   |                   |                   |                  |         |
|                    |                 |   |                   |                   |                  |         |
|                    |                 |   |                   |                   |                  |         |
|                    |                 |   |                   |                   |                  |         |
| 10.0               |                 |   |                   |                   |                  |         |
|                    | -10.5           |   |                   |                   |                  |         |
|                    | 10.5            | End of Test Pit   |                   | 0.0               |                  |         |

**Excavated By:** R.E. Lorenze, Inc.

**Length:** 10

**Depth to Water:** None

**Excavator Type:** Case

**Width:** 2

**Visual Impacts:** None

**Excavation Date(s):** 7/18/2017

**Depth:** 10.5

**Olfactory Observations:** None

**Comments:**

# TEST PIT EXCAVATION LOG



TurnKey Environmental Restoration, LLC  
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Buffalo, NY 14218  
(716) 856-0635

**Project No:** B0239-016-001

**Test Pit I.D.:** TP-16

**Project:** Main & East Balcom Street Site

**Logged By:** CCB

**Client:** 1665 Main Street Group, LLC

**Checked By:**

**Site Location:** Buffalo, NY

| SUBSURFACE PROFILE |                 |   |                   | PID<br>VOCs       | Lab<br>Sample    | Remarks |
|--------------------|-----------------|---|-------------------|-------------------|------------------|---------|
| Depth<br>(fbgs)    | Elev.<br>/Depth | Description<br>(ASTM D2488: Visual-Manual Procedure)  | Lithologic Symbol |                   |                  |         |
| 0.0                | 0.0<br>0.0      | Ground Surface  |                   | 0 100 300 500 ppm |                  |         |
|                    |                 | <b>Overburden Fill</b><br>Grey/brown, moist, loose, ashy, mostly low plasticity fines, some subrounded gravel, trace fine sand, no odors. |                   | 0.0               | Sample Collected |         |
|                    | -2.0<br>2.0     | <b>Clay</b><br>Reddish brown, moist, mostly medium plasticity fines, few subrounded gravel, stiff, no odors.                              |                   | 0.0               |                  |         |
| 5.0                |                 |   |                   |                   |                  |         |
|                    | -6.5<br>6.5     | End of Test Pit   |                   | 0.0               |                  |         |

**Excavated By:** R.E. Lorenze, Inc.

**Length:** 10

**Depth to Water:** None

**Excavator Type:** Case

**Width:** 2

**Visual Impacts:** None

**Excavation Date(s):** 7/18/2017

**Depth:** 6.5

**Olfactory Observations:** None

**Comments:**

# TEST PIT EXCAVATION LOG



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**Project No:** B0239-016-001

**Test Pit I.D.:** TP-18

**Project:** Main & East Balcom Street Site

**Logged By:** CCB

**Client:** 1665 Main Street Group, LLC

**Checked By:**

**Site Location:** Buffalo, NY

| SUBSURFACE PROFILE |                 |  |                   | PID<br>VOCs       | Lab<br>Sample | Remarks |
|--------------------|-----------------|--|-------------------|-------------------|---------------|---------|
| Depth<br>(fbgs)    | Elev.<br>/Depth | Description<br>(ASTM D2488: Visual-Manual Procedure)   | Lithologic Symbol |                   |               |         |
|                    |                 |  |                   | 0 100 ppm 300 500 |               |         |
| 0.0                | 0.0             | Ground Surface   |                   |                   |               |         |
|                    | 0.0             | <b>Asphalt and Gravel</b>  |                   |                   |               |         |
|                    | 0.3             | Black/grey, dry, no odors.   |                   |                   |               |         |
|                    |                 | <b>Fill</b>  |                   |                   |               |         |
|                    |                 | Black/ dark brown, moist,very loose when disturbed,<br>ashy mostly low plasticity fines, some brick, some<br>wood, no odors.<br>Likely basment fill from former residence. |                   |                   |               |         |
|                    | -4.5            |  |                   |                   |               |         |
|                    | 4.5             | <b>Concrete Floor</b>  |                   |                   |               |         |
| 5.0                | -5.0            |  |                   |                   |               |         |
|                    | 5.0             | <b>Clay</b>  |                   |                   |               |         |
|                    |                 | Brown, wet, mostly medium plasticity fines, trace<br>subrounded gravel, no odors.  |                   |                   |               |         |
|                    | -6.0            |  |                   |                   |               |         |
|                    | 6.0             | <b>Clay</b>  |                   |                   |               |         |
|                    |                 | Reddish brown, moist, mostly medium plasticity fines,<br>few subrounded gravel, stiff, no odors.   |                   |                   |               |         |
|                    | -9.0            |  |                   |                   |               |         |
|                    | 9.0             | End of Test Pit  |                   |                   |               |         |
| 10.0               |                 |  |                   |                   |               |         |

**Excavated By:** R.E. Lorenze, Inc.

**Length:** 10

**Depth to Water:** None

**Excavator Type:** Case

**Width:** 2

**Visual Impacts:** None

**Excavation Date(s):** 7/18/2017

**Depth:** 9

**Olfactory Observations:** None

**Comments:**



Project No: B0239-016-001

Borehole Number: MW-1

Project: Main & East Balcom Street Site

A.K.A.:

Client: 1665 Main Street Group, LLC

Logged By: NAS

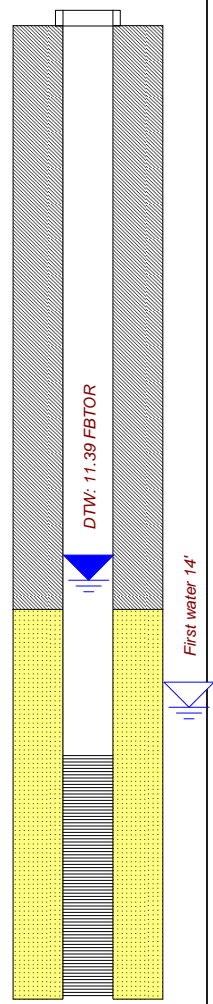
Site Location: Buffalo NY

Checked By: NTM



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2558 Hamburg Turnpike, Suite 300  
Buffalo, NY 14218  
(716) 856-0635

| SUBSURFACE PROFILE |                 |   | SAMPLE     |             |               |        | PID<br>VOCs  | Lab<br>Sample     | Well Completion<br>Details<br>or<br>Remarks |
|--------------------|-----------------|---|------------|-------------|---------------|--------|--------------|-------------------|---|
| Depth<br>(ftbgs)   | Elev.<br>/Depth | Description<br>(ASTM D2488: Visual-Manual Procedure)  | Sample No. | SPT N-Value | Recovery (ft) | Symbol |              |                   |   |
| -1.0               | 0.0             | Ground Surface  |            |             |               |        | 0 ppm 50 100 |                   |   |
|                    | 0.0             | <b>Fill</b><br>Brown, dry, mostly medium plasticity fines, few fine sand, little well sorted gravel, few brick, few cinders, firm, no odors         | 1          |             | 3             |        | 0.0          |                   |   |
| 4.0                |                 |   | 2          |             | 4             |        | 0.0          |                   |   |
|                    | -8.0            | <b>Sandy Lean Clay</b><br>Reddish brown, moist, mostly medium plasticity fines, little fine sand, trace subrounded gravel, stiff, massive, no odors | 3          |             | 4             |        | 0.0          |                   |   |
| 9.0                | 8.0             |   |            |             |               |        | 0.0          |                   |   |
|                    | -11.0           | <b>Fine Sand</b><br>Tannish brown, moist to wet (14'), mostly fine sand, few medium plasticity fines, medium dense, no odors                        | 4          |             | 4             |        | 0.0          |                   |   |
| 14.0               | 11.0            |   |            |             |               |        | 0.0          |                   |   |
|                    |                 |   | 5          |             | 4             |        | 0.0          | Sampled (16'-19') |   |
| 19.0               | -19.0           | <b>Sandy Lean Clay</b><br>Reddish brown, moist, mostly medium plasticity fines, little fine sand, trace subrounded gravel, stiff, massive, no odors |            |             |               |        | 0.0          |                   |   |
|                    | -20.0           | End of Borehole   |            |             |               |        | 0.0          |                   |   |
|                    | 20.0            |   |            |             |               |        |              |                   |   |



Drilled By: Trec Environmental

Drill Rig Type: Track mounted Geoprobe 6620DT

Drill Method: Direct Push with 4' Macro-core Sampler

Comments:

Drill Date(s): 9/18/17

Hole Size: 3"

Stick-up: N/A

Datum: Mean Sea Level

Sheet: 1 of 1

Project No: B0239-016-001

Borehole Number: MW-2

Project: Main & East Balcom Street Site

A.K.A.:

Client: 1665 Main Street Group. LLC

Logged By: NAS

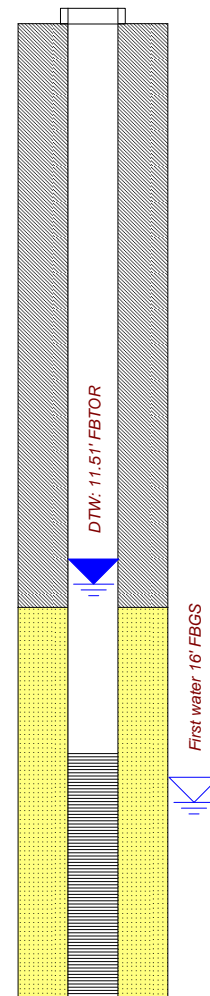
Site Location: Buffalo NY

Checked By: NTM



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2558 Hamburg Turnpike, Suite 300  
Buffalo, NY 14218  
(716) 856-0635

| SUBSURFACE PROFILE |                 |  | SAMPLE     |             |               |        | PID<br>VOCs  | Lab<br>Sample    | Well Completion<br>Details<br>or<br>Remarks |
|--------------------|-----------------|--|------------|-------------|---------------|--------|--------------|------------------|---|
| Depth<br>(ftbgs)   | Elev.<br>/Depth | Description<br>(ASTM D2488: Visual-Manual Procedure)   | Sample No. | SPT N-Value | Recovery (ft) | Symbol |              |                  |   |
| -1.0               | 0.0             | Ground Surface   |            |             |               |        | 0 ppm 50 100 |                  |   |
|                    | 0.0             | <b>Fill</b><br>Dark brown, moist, mostly medium plasticity fines, few fine sand, little well sorted gravel, few brick, few cinders, loose when disturbed, no odors | 1          |             | .5            |        | 0.0          |                  |   |
| 4.0                |                 |  | 2          |             | .5            |        | 0.0          |                  |   |
|                    | -8.5            | <b>Sandy Lean Clay</b><br>Reddish brown, moist, mostly medium plasticity fines, little fine sand, trace subrounded gravel, stiff, massive, no odors                | 3          |             | 3             |        | 0.0          |                  |   |
| 9.0                | 8.5             |  |            |             |               |        | 0.0          |                  |   |
|                    | -11.0           | <b>Fine Sand</b><br>Tannish brown, moist to wet (16), mostly fine sand, few medium plasticity fines, medium dense, no odors  | 4          |             | 4             |        | 0.0          |                  |   |
| 14.0               | 11.0            |  | 5          |             | 4             |        | 0.0          |                  |   |
| 19.0               | -20.0           | End of Borehole  |            |             |               |        | 0.0          | Sampled (18-20') |   |
|                    | 20.0            |  |            |             |               |        |              |                  |   |



Drilled By: Trec Environmental

Drill Rig Type: Track mounted Geoprobe 6620DT

Drill Method: Direct Push with 4' Macro-core Sampler

Comments:

Drill Date(s): 9/18/17

Hole Size: 3"

Stick-up: N/A

Datum: Mean Sea Level

Sheet: 1 of 1

Project No: B0239-016-001

Borehole Number: MW-3

Project: Main & East Balcom Street Site

A.K.A.:

Client: 1665 Main Street Group, LLC

Logged By: NAS

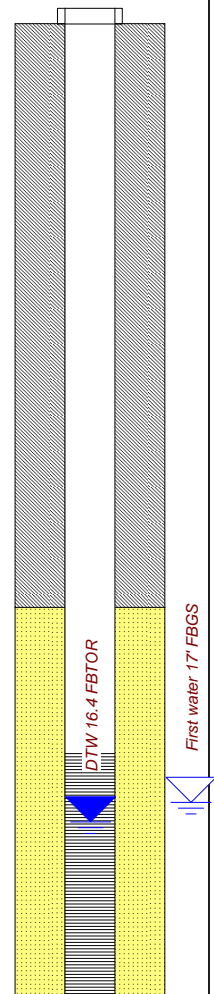
Site Location: Buffalo NY

Checked By: NTM



TurnKey Environmental Restoration, LLC  
2558 Hamburg Turnpike, Suite 300  
Buffalo, NY 14218  
(716) 856-0635

| SUBSURFACE PROFILE |                 |  | SAMPLE     |             |               |        | PID<br>VOCs  | Lab<br>Sample | Well Completion<br>Details<br>or<br>Remarks |
|--------------------|-----------------|--|------------|-------------|---------------|--------|--------------|---------------|---|
| Depth<br>(ftbgs)   | Elev.<br>/Depth | Description<br>(ASTM D2488: Visual-Manual Procedure)   | Sample No. | SPT N-Value | Recovery (ft) | Symbol |              |               |   |
| -1.0               | 0.0             | Ground Surface   |            |             |               |        | 0 ppm 50 100 |               |   |
|                    | 0.0             | <b>Fill</b><br>Black/ tan, moist, mostly slag, asphalt, some subangular gravel, some well graded sand, few cinders, loose when disturbed, no odors             | 1          |             | .5            |        | 0.0          |               |   |
|                    | -1.0            | <b>Fill</b><br>Tannish brown, moist, mostly medium plasticity fines, little fine sand, few subangular gravel, appears reworked, loose when disturbed, no odors |            |             |               |        | 0.0          |               |   |
| 4.0                | 1.0             |  |            |             |               |        | 0.0          |               |   |
|                    | -5.0            | <b>Sandy Lean Clay</b><br>Reddish brown, moist, mostly medium plasticity fines, little fine sand, trace subrounded gravel, stiff, massive, no odors            | 2          |             | .5            |        | 0.0          |               |   |
|                    | 5.0             |  |            |             |               |        | 0.0          |               |   |
|                    |                 |  |            |             |               |        | 0.0          |               |   |
| 9.0                |                 |  | 3          |             | 3             |        | 0.0          |               |   |
|                    |                 |  |            |             |               |        | 0.0          |               |   |
|                    |                 |  |            |             |               |        | 0.0          |               |   |
| 14.0               |                 |  | 4          |             | 4             |        | 0.0          |               |   |
|                    |                 |  |            |             |               |        | 0.0          |               |   |
|                    |                 |  |            |             |               |        | 0.0          |               |   |
|                    | -17.0           | <b>Fine Sand</b><br>Tannish brown, moist to wet (17), mostly fine sand, few medium plasticity fines decreasing with depth, medium dense, no odors              | 5          |             | 4             |        | 0.0          |               |   |
|                    | 17.0            |  |            |             |               |        | 0.0          |               |   |
| 19.0               |                 |  |            |             |               |        | 0.0          |               |   |
|                    | -20.0           |  |            |             |               |        | 0.0          |               |   |
|                    | 20.0            | End of Borehole  |            |             |               |        | 0.0          |               |   |



Drilled By: Trec Environmental  
Drill Rig Type: Track mounted Geoprobe 6620DT  
Drill Method: Direct Push with 4' Macro-core Sampler  
Comments:  
Drill Date(s): 9/19/17

Hole Size: 3"  
Stick-up: N/A  
Datum: Mean Sea Level  
Sheet: 1 of 1

Project No: B0239-016-001

Borehole Number: MW-4

Project: Main & East Balcom Street Site

A.K.A.:

Client: 1665 Main Street Group. LLC

Logged By: NAS

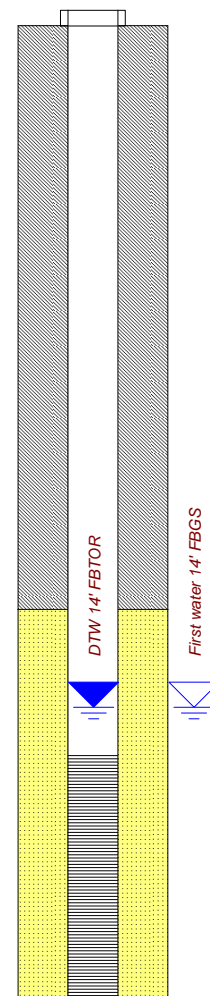
Site Location: Buffalo NY

Checked By: NTM



TurnKey Environmental Restoration, LLC  
2558 Hamburg Turnpike, Suite 300  
Buffalo, NY 14218  
(716) 856-0635

| SUBSURFACE PROFILE |                 |  | SAMPLE     |             |               |        | PID<br>VOCs  | Lab<br>Sample | Well Completion<br>Details<br>or<br>Remarks |
|--------------------|-----------------|--|------------|-------------|---------------|--------|--------------|---------------|---|
| Depth<br>(ftbgs)   | Elev.<br>/Depth | Description<br>(ASTM D2488: Visual-Manual Procedure)   | Sample No. | SPT N-Value | Recovery (ft) | Symbol |              |               |   |
| -1.0               | 0.0             | Ground Surface   |            |             |               |        | 0 ppm 50 100 |               |   |
|                    | 0.0             | <b>Fill</b><br>Black/ tan, moist, mostly asphalt, some subangular gravel, some well graded sand, few cinders, loose when disturbed, no odors                                     | 1          | 3.5         |               |        | 0.0          |               |   |
|                    | -1.0            | <b>Fill</b><br>Tan, reddish brown, moist, mostly medium plasticity fines, little fine sand, few subangular gravel, few cinders, appears reworked, loose when disturbed, no odors |            |             |               |        | 0.0          |               |   |
| 4.0                | 1.0             |  |            |             |               |        | 0.0          |               |   |
|                    | -5.0            | <b>Sandy Lean Clay</b><br>Reddish brown, moist, mostly medium plasticity fines, little fine sand, trace subrounded gravel, stiff, massive, no odors                              | 2          | 4           |               |        | 0.0          |               |   |
|                    | 5.0             |  |            |             |               |        | 0.0          |               |   |
|                    |                 |  |            |             |               |        | 0.0          |               |   |
| 9.0                |                 |  | 3          | 4           |               |        | 0.0          |               |   |
|                    |                 |  |            |             |               |        | 0.0          |               |   |
|                    |                 |  |            |             |               |        | 0.0          |               |   |
| 14.0               | -14.0           | <b>Silty Fine Sand</b><br>Tannish brown, moist to wet (14), mostly fine sand, few medium plasticity fines decreasing with depth, medium dense, no odors                          | 4          | 4           |               |        | 0.0          |               |   |
|                    | 14.0            |  |            |             |               |        | 0.0          |               |   |
|                    |                 |  |            |             |               |        | 0.0          |               |   |
|                    |                 |  |            |             |               |        | 0.0          |               |   |
| 19.0               |                 |  | 5          | 3           |               |        | 0.0          |               |   |
|                    | -20.0           |  |            |             |               |        | 0.0          |               |   |
|                    | 20.0            | End of Borehole  |            |             |               |        | 0.0          |               |   |



Drilled By: Trec Environmental

Drill Rig Type: Track mounted Geoprobe 6620DT

Drill Method: Direct Push with 4' Macro-core Sampler

Comments:

Drill Date(s): 11/13/17

Hole Size: 3"

Stick-up: N/A

Datum: Mean Sea Level

Sheet: 1 of 1

Project No: B0239-016-001

Borehole Number: MW-5

Project: Main & East Balcom Street Site

A.K.A.:

Client: 1665 Main Street Group. LLC

Logged By: NAS

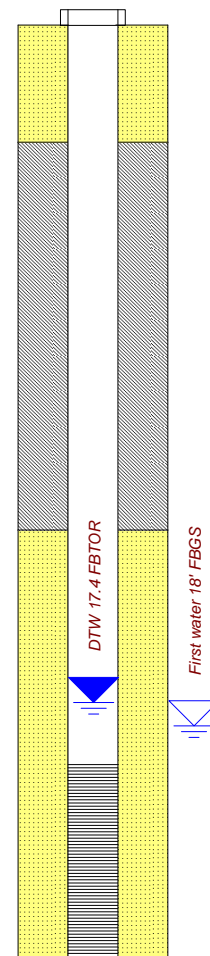
Site Location: Buffalo NY

Checked By: NTM



TurnKey Environmental Restoration, LLC  
2558 Hamburg Turnpike, Suite 300  
Buffalo, NY 14218  
(716) 856-0635

| SUBSURFACE PROFILE |                 |   | SAMPLE     |             |               |        | PID<br>VOCs<br><br>ppm<br>0 50 100 | Lab<br>Sample | Well Completion<br>Details<br>or<br>Remarks |
|--------------------|-----------------|---|------------|-------------|---------------|--------|------------------------------------|---------------|---|
| Depth<br>(ftbgs)   | Elev.<br>/Depth | Description<br>(ASTM D2488: Visual-Manual Procedure)  | Sample No. | SPT N-Value | Recovery (ft) | Symbol |                                    |               |   |
| -1.0               | 0.0             | Ground Surface  |            |             |               |        |                                    |               |   |
|                    | 0.0             | <b>Fill</b><br>Black/ tan, moist, mostly Well graded sand, some asphalt, some subrounded gravel, some well graded sand, few cinders, loose when disturbed, no odors | 1          |             | 2             |        | 0.0                                |               |   |
|                    | -1.5            |   |            |             |               |        | 0.0                                |               |   |
|                    | 1.5             | <b>Fill</b><br>Tannish brown, moist, mostly medium plasticity fines, little fine sand, few subangular gravel, appears reworked, loose when disturbed, no odors      |            |             |               |        | 0.0                                |               |   |
| 4.0                | -4.0            |   |            |             |               |        | 0.0                                |               |   |
|                    | 4.0             | <b>Reworked Sandy Lean Clay</b><br>Reddish brown, moist, mostly medium plasticity fines, little fine sand, trace subrounded gravel, no odors                        | 2          |             | 4             |        | 0.0                                |               |   |
|                    |                 |   |            |             |               |        | 0.0                                |               |   |
|                    |                 |   |            |             |               |        | 0.0                                |               |   |
| 9.0                | -10.0           |   |            |             |               |        | 0.0                                |               |   |
|                    | 10.0            | <b>Sandy Lean Clay</b><br>Reddish brown, moist, mostly medium plasticity fines, little fine sand, trace subrounded gravel, stiff, massive, no odors                 | 3          |             | 4             |        | 0.0                                |               |   |
|                    |                 |   |            |             |               |        | 0.0                                |               |   |
|                    |                 |   |            |             |               |        | 0.0                                |               |   |
| 14.0               |                 |   | 4          |             | 4             |        | 0.0                                |               |   |
|                    |                 |   |            |             |               |        | 0.0                                |               |   |
|                    |                 |   |            |             |               |        | 0.0                                |               |   |
|                    | -17.0           |   |            |             |               |        | 0.0                                |               |   |
|                    | 17.0            | <b>Fine Sand</b><br>Grey, moist to wet (18), mostly fine sand, few medium plasticity fines decreasing with depth, medium dense, no odors                            | 5          |             | 4             |        | 0.0                                |               |   |
| 19.0               |                 |   |            |             |               |        | 0.0                                |               |   |
|                    |                 |   |            |             |               |        | 0.0                                |               |   |
|                    |                 |   | 6          |             | 4             |        | 0.0                                |               |   |
|                    |                 |   |            |             |               |        | 0.0                                |               |   |
|                    |                 |   |            |             |               |        | 0.0                                |               |   |
| 24.0               | -24.0           | End of Borehole   |            |             |               |        | 0.0                                |               |   |
|                    | 24.0            |   |            |             |               |        |                                    |               |   |
|                    |                 |   |            |             |               |        |                                    |               |   |
| 29.0               |                 |   |            |             |               |        |                                    |               |   |



Drilled By: Trec Environmental

Drill Rig Type: Track mounted Geoprobe 6620DT

Drill Method: Direct Push with 4' Macro-core Sampler

Comments:

Drill Date(s): 2/8/2018

Hole Size: 3"

Stick-up: N/A

Datum: Mean Sea Level

Sheet: 1 of 1

## APPENDIX C

### SUBSLAB VAPOR INVESTIGATION INVENTORY AND FIELD LOG



# AIR CANISTER FIELD RECORD

## PROJECT INFORMATION:

Project: Main: East Balcom Street site  
Job No: B0239-016-001-004-002 (005) For samples  
Location: BUFFALO, NY  
Field Staff: NAS  
Client: Sinatra

### SAMPLE I.D.:

SSV-1

## WEATHER CONDITIONS:

Ambient Air Temp. - A.M.:

Ambient Air Temp. - P.M.:

Wind Direction:

Wind Speed:

Precipitation:

Size of Canister: 6L

Canister Serial No.: 2270

Flow Controller No.: 0239 0635

Sample Date(s): 2/11-2/12/18

Shipping Date:

Sample Type: ☐ Indoor Air ☐ Outdoor Air

☒ Subslab, complete section below

☐ Soil Gas

Soil Gas Probe Depth:

## FIELD SAMPLING INFORMATION:

| READING                           | TIME         | VACUUM (inches Hg)<br>or PRESSURE (psig) | DATE           | INITIALS   |
|-----------------------------------|--------------|--|----------------|------------|
| Lab Vacuum (on tag)               | <u>11:36</u> | <u>-30</u>                               | <u>2/11/18</u> | <u>NAS</u> |
| Field Vacuum Check <sup>1</sup>   | <u>12:07</u> | <u>-29.48</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Initial Field Vacuum <sup>2</sup> | <u>12:07</u> | <u>-29.47</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Final Field Vacuum <sup>3</sup>   | <u>5:46</u>  | <u>-8.03</u>                             | <u>2/12/18</u> | <u>NAS</u> |
| Duration of Sample Collection     | <u>17:39</u> |  |                |            |

## LABORATORY CANISTER PRESSURIZATION:

|                                     |                 |  |
|-------------------------------------|-----------------|--|
| Initial Vacuum (inches Hg and psia) | <u>-29.48</u>   |  |
| Final Pressure (psia) <u>17 Hg</u>  | <u>-8.03</u>    |  |
| Pressurization Gas                  | <u>Nitrogen</u> |  |

## SUBSLAB SHROUD:

Shroud Helium Concentration: 85

Calculated tubing volume: 12 x 3 = 36

Purged Tubing Volume Concentration: 0

Is the purged volume concentration less than or equal to 10% in shroud?

☒ YES, continue sampling

☐ NO, improve surface seal and retest

| COMPOSITE<br>TIME (hours) | FLOW RATE RANGE<br>(ml/min) |
|---------------------------|-----------------------------|
| 15 Min.                   | 316 - 333                   |
| 0.5 Hours                 | 158 - 166.7                 |
| 1                         | 79.2 - 83.3                 |
| 2                         | 39.6 - 41.7                 |
| 4                         | 19.8 - 20.8                 |
| 6                         | 13.2 - 13.9                 |
| 8                         | 9.9 - 10.4                  |
| 10                        | 7.92 - 8.3                  |
| 12                        | 6.6 - 6.9                   |
| 24                        | 3.5 - 4.0                   |

## NOTES:

1 Vacuum measured using portable vacuum gauge (provided by Lab)

2 Vacuum measured by canister gauge upon opening valve

3 Vacuum measured by canister gauge prior to closing valve

Signed: [Signature]

## AIR CANISTER FIELD RECORD

### PROJECT INFORMATION:

Project: Main & East Ballou Street Site  
Job No: B0239-016-001  
Location: BUFFALO, NY  
Field Staff: NAS  
Client: Sinutra

#### SAMPLE I.D.:

BD

### WEATHER CONDITIONS:

Ambient Air Temp. - A.M.:  
Ambient Air Temp. - P.M.:  
Wind Direction:  
Wind Speed:  
Precipitation:

Size of Canister: 6L

Canister Serial No.: 2200 2129

Flow Controller No.: 0237 0334

Sample Date(s): 2/11/18 - 2/12/18

Shipping Date:

Sample Type: ☐ Indoor Air ☐ Outdoor Air

☒ Subslab, complete section below ☐ Soil Gas

Soil Gas Probe Depth:

### FIELD SAMPLING INFORMATION:

| READING                           | TIME         | VACUUM (inches Hg)<br>or PRESSURE (psig) | DATE           | INITIALS     |
|-----------------------------------|--------------|--|----------------|--------------|
| Lab Vacuum (on tag)               | <u>11:20</u> | <u>-30</u>                               | <u>2/11/18</u> | <u>NAS</u>   |
| Field Vacuum Check <sup>1</sup>   | <u>12:07</u> | <u>-24.28</u>                            | <u>2/11/18</u> | <u>(WHS)</u> |
| Initial Field Vacuum <sup>2</sup> | <u>12:07</u> | <u>-24.27</u>                            | <u>2/11/18</u> | <u>(WHS)</u> |
| Final Field Vacuum <sup>3</sup>   | <u>5:47</u>  | <u>-7.89</u>                             | <u>2/12/18</u> | <u>NAS</u>   |
| Duration of Sample Collection     | <u>17:40</u> |  |                |              |

### LABORATORY CANISTER PRESSURIZATION:

|   |                 |
|---|-----------------|
| Initial Vacuum (inches Hg and psia)         | <u>-24.27</u>   |
| Final Pressure ( <u>psia</u> ) <u>17 Hg</u> | <u>-7.89</u>    |
| Pressurization Gas                          | <u>Nitrogen</u> |

### SUBSLAB SHROUD:

Shroud Helium Concentration: 85

Calculated tubing volume: 12 x 3 = 36

Purged Tubing Volume Concentration: 0

Is the purged volume concentration less than or equal to 10% in shroud?

☒ YES, continue sampling

☐ NO, improve surface seal and retest

| COMPOSITE<br>TIME (hours) | FLOW RATE RANGE<br>(ml/min) |
|---------------------------|-----------------------------|
| 15 Min.                   | 316 - 333                   |
| 0.5 Hours                 | 158 - 166.7                 |
| 1                         | 79.2 - 83.3                 |
| 2                         | 39.6 - 41.7                 |
| 4                         | 19.8 - 20.8                 |
| 6                         | 13.2 - 13.9                 |
| 8                         | 9.9 - 10.4                  |
| 10                        | 7.92 - 8.3                  |
| 12                        | 6.6 - 6.9                   |
| 24                        | 3.5 - 4.0                   |

### NOTES:

1 Vacuum measured using portable vacuum gauge (provided by Lab)

2 Vacuum measured by canister gauge upon opening valve

3 Vacuum measured by canister gauge prior to closing valve

Signed: [Signature]

# AIR CANISTER FIELD RECORD

## PROJECT INFORMATION:

Project: Main + East Ballou St. Site  
Job No: B0234-014-001-001-002  
Location: Buffalo, NY  
Field Staff: NAS  
Client: Simetry

### SAMPLE I.D.:

Ambient - I

## WEATHER CONDITIONS:

Ambient Air Temp. - A.M.:  
Ambient Air Temp. - P.M.:  
Wind Direction:  
Wind Speed:  
Precipitation:

Size of Canister: 6L

Canister Serial No.: 649

Flow Controller No.: 0868

Sample Date(s): 2/11-2/12/18

Shipping Date:

Sample Type: ☒ Indoor Air

☐ Outdoor Air

☒ Subslab, complete section below

☐ Soil Gas

Soil Gas Probe Depth:

## FIELD SAMPLING INFORMATION:

| READING                           | TIME               | VACUUM (inches Hg)<br>or PRESSURE (psig) | DATE           | INITIALS   |
|-----------------------------------|--------------------|--|----------------|------------|
| Lab Vacuum (on tag)               | <u>0801:20</u>     | <u>-30</u>                               | <u>2/11/18</u> | <u>NAS</u> |
| Field Vacuum Check <sup>1</sup>   | <u>12:04</u>       | <u>-24.70</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Initial Field Vacuum <sup>2</sup> | <u>12:04</u>       | <u>-24.18</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Final Field Vacuum <sup>3</sup>   | <u>5:47</u>        | <u>-8.30</u>                             | <u>2/12/18</u> | <u>NAS</u> |
| Duration of Sample Collection     | <u>12:07 17:38</u> |  |                |            |

## LABORATORY CANISTER PRESSURIZATION:

|                                     |                 |
|-------------------------------------|-----------------|
| Initial Vacuum (inches Hg and psia) | <u>-24.18</u>   |
| Final Pressure (psia) <u>12 Hg</u>  | <u>-8.30</u>    |
| Pressurization Gas                  | <u>Nitrogen</u> |

## SUBSLAB SHROUD:

N/A

Shroud Helium Concentration:

Calculated tubing volume: x 3 =

Purged Tubing Volume Concentration:

Is the purged volume concentration less than or equal to 10% in shroud?

☐ YES, continue sampling

☐ NO, improve surface seal and retest

## NOTES:

1 Vacuum measured using portable vacuum gauge (provided by Lab)

2 Vacuum measured by canister gauge upon opening valve

3 Vacuum measured by canister gauge prior to closing valve

| COMPOSITE<br>TIME (hours) | FLOW RATE RANGE<br>(ml/min) |
|---------------------------|-----------------------------|
| 15 Min.                   | 316 - 333                   |
| 0.5 Hours                 | 158 - 166.7                 |
| 1                         | 79.2 - 83.3                 |
| 2                         | 39.6 - 41.7                 |
| 4                         | 19.8 - 20.8                 |
| 6                         | 13.2 - 13.9                 |
| 8                         | 9.9 - 10.4                  |
| 10                        | 7.92 - 8.3                  |
| 12                        | 6.6 - 6.9                   |
| 24                        | 3.5 - 4.0                   |

Signed: [Signature]

# AIR CANISTER FIELD RECORD

## PROJECT INFORMATION:

Project: Main & East Balcom St Site  
 Job No: B0234-016-001-004-002  
 Location: Buffalo, NY  
 Field Staff: NAS  
 Client: Sinatra

### SAMPLE I.D.:

SSV-2

## WEATHER CONDITIONS:

Ambient Air Temp. - A.M.:

Ambient Air Temp. - P.M.:

Wind Direction:

Wind Speed:

Precipitation:

Size of Canister: 6L

Canister Serial No.: 1709

Flow Controller No.: 0037

Sample Date(s): 2/11-2/12/18

Shipping Date:

Sample Type: ☐ Indoor Air

☐ Outdoor Air

☒ Subslab, complete section below

☐ Soil Gas

Soil Gas Probe Depth:

## FIELD SAMPLING INFORMATION:

| READING                           | TIME         | VACUUM (inches Hg)<br>or PRESSURE (psig) | DATE           | INITIALS   |
|-----------------------------------|--------------|--|----------------|------------|
| Lab Vacuum (on tag)               | <u>12:51</u> | <u>-30</u>                               | <u>2/11/18</u> | <u>NAS</u> |
| Field Vacuum Check <sup>1</sup>   | <u>13:05</u> | <u>-24.71</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Initial Field Vacuum <sup>2</sup> | <u>13:06</u> | <u>-24.70</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Final Field Vacuum <sup>3</sup>   | <u>5:50</u>  | <u>-11.82</u>                            | <u>2/12/18</u> | <u>NAS</u> |
| Duration of Sample Collection     | <u>16:44</u> |  |                |            |

## LABORATORY CANISTER PRESSURIZATION:

|   |                 |
|---|-----------------|
| Initial Vacuum (inches Hg and psia)             | <u>-24.70</u>   |
| Final Pressure ( <del>psia</del> ) <u>in Hg</u> | <u>-11.82</u>   |
| Pressurization Gas                              | <u>Nitrogen</u> |

## SUBSLAB SHROUD:

Shroud Helium Concentration: 80

Calculated tubing volume: 12 x 3 = 36

Purged Tubing Volume Concentration: 0

Is the purged volume concentration less than or equal to 10% in shroud?

☒ YES, continue sampling

☐ NO, improve surface seal and retest

## NOTES:

1 Vacuum measured using portable vacuum gauge (provided by Lab)

2 Vacuum measured by canister gauge upon opening valve

3 Vacuum measured by canister gauge prior to closing valve

| COMPOSITE<br>TIME (hours) | FLOW RATE RANGE<br>(ml/min) |
|---------------------------|-----------------------------|
| 15 Min.                   | 316 - 333                   |
| 0.5 Hours                 | 158 - 166.7                 |
| 1                         | 79.2 - 83.3                 |
| 2                         | 39.6 - 41.7                 |
| 4                         | 19.8 - 20.8                 |
| 6                         | 13.2 - 13.9                 |
| 8                         | 9.9 - 10.4                  |
| 10                        | 7.92 - 8.3                  |
| 12                        | 6.6 - 6.9                   |
| 24                        | 3.5 - 4.0                   |

Signed: [Signature]

## AIR CANISTER FIELD RECORD

### PROJECT INFORMATION:

Project: MAIN; East Ballou St. Site  
Job No: B0234-04-001-004-002  
Location: Buffalo, NY  
Field Staff: NAS  
Client: Sinatra

#### SAMPLE I.D.:

Ambient-2

### WEATHER CONDITIONS:

Ambient Air Temp. - A.M.:

Ambient Air Temp. - P.M.:

Wind Direction:

Wind Speed:

Precipitation:

Size of Canister: 6L

Canister Serial No.: 1780

Flow Controller No.: 0150

Sample Date(s): 2/11/18 - 2/12/18

Shipping Date:

Sample Type: ☒ Indoor Air ☐ Outdoor Air

☐ Subslab, complete section below ☐ Soil Gas

Soil Gas Probe Depth:

### FIELD SAMPLING INFORMATION:

| READING                           | TIME               | VACUUM (inches Hg)<br>or PRESSURE (psig) | DATE           | INITIALS   |
|-----------------------------------|--------------------|--|----------------|------------|
| Lab Vacuum (on tag)               | <u>12:53</u>       | <u>-30</u>                               | <u>2/11/18</u> | <u>NAS</u> |
| Field Vacuum Check <sup>1</sup>   | <u>12:54</u>       | <u>-29.06</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Initial Field Vacuum <sup>2</sup> | <u>13:05</u>       | <u>-29.02</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Final Field Vacuum <sup>3</sup>   | <u>5:44</u>        | <u>-11.90</u>                            | <u>2/12/18</u> | <u>NAS</u> |
| Duration of Sample Collection     | <u>10:04 16:44</u> |  |                |            |

### LABORATORY CANISTER PRESSURIZATION:

|   |               |  |
|---|---------------|--|
| Initial Vacuum (inches Hg and psia)             | <u>-29.02</u> |  |
| Final Pressure ( <del>psia</del> ) <u>17 Hg</u> | <u>-11.90</u> |  |
| Pressurization Gas                              |               |  |

### SUBSLAB SHROUD:

Shroud Helium Concentration: NA

Calculated tubing volume: x 3 =

Purged Tubing Volume Concentration:

Is the purged volume concentration less than or equal to 10% in shroud?

☒ YES, continue sampling

☐ NO, improve surface seal and retest

| COMPOSITE<br>TIME (hours) | FLOW RATE RANGE<br>(ml/min) |
|---------------------------|-----------------------------|
| 15 Min.                   | 316 - 333                   |
| 0.5 Hours                 | 158 - 166.7                 |
| 1                         | 79.2 - 83.3                 |
| 2                         | 39.6 - 41.7                 |
| 4                         | 19.8 - 20.8                 |
| 6                         | 13.2 - 13.9                 |
| 8                         | 9.9 - 10.4                  |
| 10                        | 7.92 - 8.3                  |
| 12                        | 6.6 - 6.9                   |
| 24                        | 3.5 - 4.0                   |

### NOTES:

1 Vacuum measured using portable vacuum gauge (provided by Lab)

2 Vacuum measured by canister gauge upon opening valve

3 Vacuum measured by canister gauge prior to closing valve

Signed: [Signature]

## AIR CANISTER FIELD RECORD

### PROJECT INFORMATION:

Project: Mundy East Ballroom St site  
Job No: B0239-016-001-004-002  
Location: Buffalo, NY  
Field Staff: NAS  
Client: Sinatra

### SAMPLE I.D.:

Ambient-3

### WEATHER CONDITIONS:

Ambient Air Temp. - A.M.:

Ambient Air Temp. - P.M.:

Wind Direction:

Wind Speed:

Precipitation:

Size of Canister: 6L

Canister Serial No.: 2275

Flow Controller No.: 0408

Sample Date(s): 2/11 - 2/12 - 18

Shipping Date: 2/12/18

Sample Type: ☒ Indoor Air ☐ Outdoor Air

☐ Subslab, complete section below ☐ Soil Gas

Soil Gas Probe Depth:

### FIELD SAMPLING INFORMATION:

| READING                           | TIME         | VACUUM (inches Hg)<br>or PRESSURE (psig) | DATE           | INITIALS   |
|-----------------------------------|--------------|--|----------------|------------|
| Lab Vacuum (on tag)               | <u>13:10</u> | <u>-30</u>                               | <u>2/11/18</u> | <u>NAS</u> |
| Field Vacuum Check <sup>1</sup>   | <u>13:12</u> | <u>-28.98</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Initial Field Vacuum <sup>2</sup> | <u>13:14</u> | <u>-28.95</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Final Field Vacuum <sup>3</sup>   | <u>5:43</u>  | <u>-13.35</u>                            | <u>2/12/18</u> | <u>NAS</u> |
| Duration of Sample Collection     | <u>16:29</u> |  |                |            |

### LABORATORY CANISTER PRESSURIZATION:

|   |               |  |
|---|---------------|--|
| Initial Vacuum (inches Hg and psia)             | <u>-28.95</u> |  |
| Final Pressure ( <del>psia</del> ) <u>in Hg</u> | <u>-13.35</u> |  |
| Pressurization Gas                              |               |  |

### SUBSLAB SHROUD:

Shroud Helium Concentration: NA

Calculated tubing volume: NA x 3 =

Purged Tubing Volume Concentration:

Is the purged volume concentration less than or equal to 10% in shroud?

☒ YES, continue sampling

☐ NO, improve surface seal and retest

| COMPOSITE<br>TIME (hours) | FLOW RATE RANGE<br>(ml/min) |
|---------------------------|-----------------------------|
| 15 Min.                   | 316 - 333                   |
| 0.5 Hours                 | 158 - 166.7                 |
| 1                         | 79.2 - 83.3                 |
| 2                         | 39.6 - 41.7                 |
| 4                         | 19.8 - 20.8                 |
| 6                         | 13.2 - 13.9                 |
| 8                         | 9.9 - 10.4                  |
| 10                        | 7.92 - 8.3                  |
| 12                        | 6.6 - 6.9                   |
| 24                        | 3.5 - 4.0                   |

### NOTES:

1 Vacuum measured using portable vacuum gauge (provided by Lab)

2 Vacuum measured by canister gauge upon opening valve

3 Vacuum measured by canister gauge prior to closing valve

Signed: [Signature]



## AIR CANISTER FIELD RECORD

### PROJECT INFORMATION:

Project: NAH? East Baycom St Site  
Job No: B0234-016-001-004-002  
Location: Buffalo, NY  
Field Staff: NAS  
Client: Strutera

### SAMPLE I.D.:

Outdoor-1

### WEATHER CONDITIONS:

Ambient Air Temp. - A.M.: 29°  
Ambient Air Temp. - P.M.: 36°  
Wind Direction: N 7 mph  
Wind Speed: 7 mph  
Precipitation: None / Rain

Size of Canister: 6L

Canister Serial No.: 1988

Flow Controller No.: 0237

Sample Date(s): 2/11-2/12/18

Shipping Date:

Sample Type: ☐ Indoor Air ☒ Outdoor Air

☐ Subslab, complete section below ☐ Soil Gas

Soil Gas Probe Depth:

### FIELD SAMPLING INFORMATION:

| READING                           | TIME         | VACUUM (inches Hg)<br>or PRESSURE (psig) | DATE           | INITIALS   |
|-----------------------------------|--------------|--|----------------|------------|
| Lab Vacuum (on tag)               | <u>13:25</u> | <u>-30</u>                               | <u>2/11/18</u> | <u>NAS</u> |
| Field Vacuum Check <sup>1</sup>   | <u>13:26</u> | <u>-28.72</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Initial Field Vacuum <sup>2</sup> | <u>13:27</u> | <u>-28.64</u>                            | <u>2/11/18</u> | <u>NAS</u> |
| Final Field Vacuum <sup>3</sup>   | <u>5:50</u>  | <u>-13.18</u>                            | <u>2/12/18</u> | <u>NAS</u> |
| Duration of Sample Collection     | <u>16:23</u> |  |                |            |

### LABORATORY CANISTER PRESSURIZATION:

|  |               |  |
|--|---------------|--|
| Initial Vacuum (inches Hg and psia)        | <u>-28.64</u> |  |
| Final Pressure ( <del>psia</del> ) (in Hg) | <u>13.18</u>  |  |
| Pressurization Gas                         |               |  |

### SUBSLAB SHROUD:

Shroud Helium Concentration: NA

Calculated tubing volume: NA x 3 =

Purged Tubing Volume Concentration:

Is the purged volume concentration less than or equal to 10% in shroud?

☒ YES, continue sampling

☐ NO, improve surface seal and retest

| COMPOSITE<br>TIME (hours) | FLOW RATE RANGE<br>(ml/min) |
|---------------------------|-----------------------------|
| 15 Min.                   | 316 - 333                   |
| 0.5 Hours                 | 158 - 166.7                 |
| 1                         | 79.2 - 83.3                 |
| 2                         | 39.6 - 41.7                 |
| 4                         | 19.8 - 20.8                 |
| 6                         | 13.2 - 13.9                 |
| 8                         | 9.9 - 10.4                  |
| 10                        | 7.92 - 8.3                  |
| 12                        | 6.6 - 6.9                   |
| 24                        | 3.5 - 4.0                   |

### NOTES:

1 Vacuum measured using portable vacuum gauge (provided by Lab)

2 Vacuum measured by canister gauge upon opening valve

3 Vacuum measured by canister gauge prior to closing valve

Signed: [Signature]

## APPENDIX D

LABORATORY ANALYTICAL DATA  
(PROVIDED ELECTRONICALLY ON ENCLOSED CD)



## ANALYTICAL REPORT

|                 |   |
|-----------------|---|
| Lab Number:     | L1741810  |
| Client:         | Turnkey Environmental Restoration, LLC<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley   |
| Phone:          | (716) 856-0599  |
| Project Name:   | MAIN & E. BALCOM  |
| Project Number: | B0234-016-001-0040  |
| Report Date:    | 11/21/17  |

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Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

---

Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)



**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1741810-01                | BSB-1 (1-2')     | SOIL          | BUFFALO, NY                | 11/13/17 10:00                  | 11/14/17            |
| L1741810-02                | BSB-2 (4-5')     | SOIL          | BUFFALO, NY                | 11/13/17 10:45                  | 11/14/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

### Case Narrative (continued)

#### Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

#### Volatile Organics

Any reported concentrations that are below 200 ug/kg may be biased low due to the sample not being collected according to 5035-L/5035A-L low-level specifications.

L1741810-01: The analysis of Volatile Organics was performed from a methanol extract due to the elevated concentrations of non-target compounds in the sample.

L1741810-01: The sample has elevated detection limits due to the dilution required by the elevated concentrations of non-target compounds in the sample.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:



Cristin Walker

Title: Technical Director/Representative

Date: 11/21/17



# ORGANICS

# **VOLATILES**

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

**SAMPLE RESULTS**

**Lab ID:** L1741810-01      D  
**Client ID:** BSB-1 (1-2')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 11/13/17 10:00  
**Date Received:** 11/14/17  
**Field Prep:** Not Specified

**Matrix:** Soil  
**Analytical Method:** 1,8260C  
**Analytical Date:** 11/19/17 13:06  
**Analyst:** CBN  
**Percent Solids:** 87%

| Parameter                                    | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Benzene                                      | ND     |           | ug/kg | 110 | 22. | 2               |
| Toluene                                      | ND     |           | ug/kg | 170 | 22. | 2               |
| Ethylbenzene                                 | 550    |           | ug/kg | 110 | 19. | 2               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 230 | 17. | 2               |
| p/m-Xylene                                   | 1600   |           | ug/kg | 230 | 40. | 2               |
| o-Xylene                                     | 39     | J         | ug/kg | 230 | 38. | 2               |
| n-Butylbenzene                               | 1400   |           | ug/kg | 110 | 26. | 2               |
| sec-Butylbenzene                             | 380    |           | ug/kg | 110 | 24. | 2               |
| tert-Butylbenzene                            | 33     | J         | ug/kg | 560 | 28. | 2               |
| Isopropylbenzene                             | 230    |           | ug/kg | 110 | 22. | 2               |
| p-Isopropyltoluene                           | 410    |           | ug/kg | 110 | 23. | 2               |
| n-Propylbenzene                              | 610    |           | ug/kg | 110 | 24. | 2               |
| 1,3,5-Trimethylbenzene                       | 1500   |           | ug/kg | 560 | 18. | 2               |
| 1,2,4-Trimethylbenzene                       | 4900   |           | ug/kg | 560 | 21. | 2               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 109        |           | 70-130              |
| Toluene-d8            | 95         |           | 70-130              |
| 4-Bromofluorobenzene  | 109        |           | 70-130              |
| Dibromofluoromethane  | 106        |           | 70-130              |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

**SAMPLE RESULTS**

**Lab ID:** L1741810-02      D  
**Client ID:** BSB-2 (4-5')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 11/13/17 10:45  
**Date Received:** 11/14/17  
**Field Prep:** Not Specified

**Matrix:** Soil  
**Analytical Method:** 1,8260C  
**Analytical Date:** 11/19/17 13:32  
**Analyst:** CBN  
**Percent Solids:** 86%

| Parameter                                    | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Benzene                                      | 66     | J         | ug/kg | 130 | 24. | 2               |
| Toluene                                      | 330    |           | ug/kg | 190 | 25. | 2               |
| Ethylbenzene                                 | 2900   |           | ug/kg | 130 | 22. | 2               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 250 | 19. | 2               |
| p/m-Xylene                                   | 7500   |           | ug/kg | 250 | 44. | 2               |
| o-Xylene                                     | 3200   |           | ug/kg | 250 | 43. | 2               |
| n-Butylbenzene                               | 5200   |           | ug/kg | 130 | 29. | 2               |
| sec-Butylbenzene                             | 1700   |           | ug/kg | 130 | 27. | 2               |
| tert-Butylbenzene                            | 150    | J         | ug/kg | 630 | 31. | 2               |
| Isopropylbenzene                             | 1200   |           | ug/kg | 130 | 24. | 2               |
| p-Isopropyltoluene                           | 1800   |           | ug/kg | 130 | 26. | 2               |
| n-Propylbenzene                              | 3000   |           | ug/kg | 130 | 27. | 2               |
| 1,3,5-Trimethylbenzene                       | 6200   |           | ug/kg | 630 | 20. | 2               |
| 1,2,4-Trimethylbenzene                       | 25000  |           | ug/kg | 630 | 24. | 2               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 81         |           | 70-130              |
| Toluene-d8            | 98         |           | 70-130              |
| 4-Bromofluorobenzene  | 130        |           | 70-130              |
| Dibromofluoromethane  | 97         |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1741810

Project Number: B0234-016-001-0040

Report Date: 11/21/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 11/19/17 09:41  
 Analyst: CBN

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1064743-5 |        |           |       |     |     |
| Benzene  | ND     |           | ug/kg | 50  | 9.6 |
| Toluene  | ND     |           | ug/kg | 75  | 9.8 |
| Ethylbenzene   | ND     |           | ug/kg | 50  | 8.5 |
| Methyl tert butyl ether  | ND     |           | ug/kg | 100 | 7.6 |
| p/m-Xylene   | ND     |           | ug/kg | 100 | 18. |
| o-Xylene   | ND     |           | ug/kg | 100 | 17. |
| n-Butylbenzene   | ND     |           | ug/kg | 50  | 11. |
| sec-Butylbenzene   | ND     |           | ug/kg | 50  | 11. |
| tert-Butylbenzene  | ND     |           | ug/kg | 250 | 12. |
| Isopropylbenzene   | ND     |           | ug/kg | 50  | 9.7 |
| p-Isopropyltoluene   | ND     |           | ug/kg | 50  | 10. |
| n-Propylbenzene  | ND     |           | ug/kg | 50  | 11. |
| 1,3,5-Trimethylbenzene   | ND     |           | ug/kg | 250 | 8.0 |
| 1,2,4-Trimethylbenzene   | ND     |           | ug/kg | 250 | 9.3 |

| Surrogate             | %Recovery | Qualifier | Acceptance Criteria |
|-----------------------|-----------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 102       |           | 70-130              |
| Toluene-d8            | 96        |           | 70-130              |
| 4-Bromofluorobenzene  | 102       |           | 70-130              |
| Dibromofluoromethane  | 104       |           | 70-130              |



## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1064743-3 WG1064743-4 |                  |      |                   |      |                     |     |      |               |
| Benzene   | 110              |      | 108               |      | 70-130              | 2   |      | 30            |
| Toluene   | 104              |      | 102               |      | 70-130              | 2   |      | 30            |
| Ethylbenzene  | 108              |      | 105               |      | 70-130              | 3   |      | 30            |
| Methyl tert butyl ether   | 106              |      | 105               |      | 66-130              | 1   |      | 30            |
| p/m-Xylene  | 108              |      | 104               |      | 70-130              | 4   |      | 30            |
| o-Xylene  | 104              |      | 103               |      | 70-130              | 1   |      | 30            |
| n-Butylbenzene  | 108              |      | 108               |      | 70-130              | 0   |      | 30            |
| sec-Butylbenzene  | 108              |      | 108               |      | 70-130              | 0   |      | 30            |
| tert-Butylbenzene   | 108              |      | 105               |      | 70-130              | 3   |      | 30            |
| Isopropylbenzene  | 106              |      | 105               |      | 70-130              | 1   |      | 30            |
| p-Isopropyltoluene  | 108              |      | 106               |      | 70-130              | 2   |      | 30            |
| n-Propylbenzene   | 106              |      | 104               |      | 70-130              | 2   |      | 30            |
| 1,3,5-Trimethylbenzene  | 105              |      | 103               |      | 70-130              | 2   |      | 30            |
| 1,2,4-Trimethylbenzene  | 102              |      | 103               |      | 70-130              | 1   |      | 30            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 103              |      | 101               |      | 70-130                 |
| Toluene-d8            | 95               |      | 96                |      | 70-130                 |
| 4-Bromofluorobenzene  | 97               |      | 98                |      | 70-130                 |
| Dibromofluoromethane  | 105              |      | 103               |      | 70-130                 |

# SEMIVOLATILES

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

**SAMPLE RESULTS**

**Lab ID:** L1741810-01      **D**  
**Client ID:** BSB-1 (1-2')  
**Sample Location:** BUFFALO, NY  
  
**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 11/21/17 00:02  
**Analyst:** SZ  
**Percent Solids:** 87%

**Date Collected:** 11/13/17 10:00  
**Date Received:** 11/14/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 11/18/17 16:05

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | 1200   |           | ug/kg | 760 | 98. | 5               |
| Fluoranthene                                     | ND     |           | ug/kg | 570 | 110 | 5               |
| Naphthalene                                      | 8400   |           | ug/kg | 950 | 120 | 5               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 570 | 110 | 5               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 760 | 230 | 5               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 570 | 160 | 5               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 570 | 150 | 5               |
| Chrysene   | ND     |           | ug/kg | 570 | 99. | 5               |
| Acenaphthylene                                   | 680    | J         | ug/kg | 760 | 150 | 5               |
| Anthracene                                       | 460    | J         | ug/kg | 570 | 180 | 5               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 760 | 110 | 5               |
| Fluorene   | 2300   |           | ug/kg | 950 | 92. | 5               |
| Phenanthrene                                     | 5300   |           | ug/kg | 570 | 120 | 5               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 570 | 110 | 5               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 760 | 130 | 5               |
| Pyrene   | 130    | J         | ug/kg | 570 | 94. | 5               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 114        |           | 23-120              |
| 2-Fluorobiphenyl | 65         |           | 30-120              |
| 4-Terphenyl-d14  | 61         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

**SAMPLE RESULTS**

**Lab ID:** L1741810-02      **D**  
**Client ID:** BSB-2 (4-5')  
**Sample Location:** BUFFALO, NY  
  
**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 11/21/17 00:29  
**Analyst:** SZ  
**Percent Solids:** 86%

**Date Collected:** 11/13/17 10:45  
**Date Received:** 11/14/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 11/18/17 16:05

| Parameter  | Result | Qualifier | Units | RL   | MDL | Dilution Factor |
|--|--------|-----------|-------|------|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |      |     |                 |
| Acenaphthene                                     | 2100   |           | ug/kg | 1500 | 200 | 10              |
| Fluoranthene                                     | ND     |           | ug/kg | 1200 | 220 | 10              |
| Naphthalene                                      | 16000  |           | ug/kg | 1900 | 230 | 10              |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 1200 | 220 | 10              |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 1500 | 470 | 10              |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 1200 | 320 | 10              |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 1200 | 310 | 10              |
| Chrysene   | ND     |           | ug/kg | 1200 | 200 | 10              |
| Acenaphthylene                                   | 1300   | J         | ug/kg | 1500 | 300 | 10              |
| Anthracene                                       | 850    | J         | ug/kg | 1200 | 380 | 10              |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 1500 | 230 | 10              |
| Fluorene   | 4600   |           | ug/kg | 1900 | 190 | 10              |
| Phenanthrene                                     | 10000  |           | ug/kg | 1200 | 230 | 10              |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 1200 | 220 | 10              |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 1500 | 270 | 10              |
| Pyrene   | 280    | J         | ug/kg | 1200 | 190 | 10              |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 149        | Q         | 23-120              |
| 2-Fluorobiphenyl | 57         |           | 30-120              |
| 4-Terphenyl-d14  | 55         |           | 18-120              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1741810

Project Number: B0234-016-001-0040

Report Date: 11/21/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 11/20/17 15:48  
 Analyst: EK

Extraction Method: EPA 3546  
 Extraction Date: 11/18/17 16:05

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1064564-1 |        |           |       |     |     |
| Acenaphthene   | ND     |           | ug/kg | 130 | 17. |
| Fluoranthene   | ND     |           | ug/kg | 98  | 19. |
| Naphthalene  | ND     |           | ug/kg | 160 | 20. |
| Benzo(a)anthracene   | ND     |           | ug/kg | 98  | 18. |
| Benzo(a)pyrene   | ND     |           | ug/kg | 130 | 40. |
| Benzo(b)fluoranthene   | ND     |           | ug/kg | 98  | 28. |
| Benzo(k)fluoranthene   | ND     |           | ug/kg | 98  | 26. |
| Chrysene   | ND     |           | ug/kg | 98  | 17. |
| Acenaphthylene   | ND     |           | ug/kg | 130 | 25. |
| Anthracene   | ND     |           | ug/kg | 98  | 32. |
| Benzo(ghi)perylene   | ND     |           | ug/kg | 130 | 19. |
| Fluorene   | ND     |           | ug/kg | 160 | 16. |
| Phenanthrene   | ND     |           | ug/kg | 98  | 20. |
| Dibenzo(a,h)anthracene   | ND     |           | ug/kg | 98  | 19. |
| Indeno(1,2,3-cd)pyrene   | ND     |           | ug/kg | 130 | 23. |
| Pyrene   | ND     |           | ug/kg | 98  | 16. |

#### Tentatively Identified Compounds

No Tentatively Identified Compounds      ND      ug/kg



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1741810

Project Number: B0234-016-001-0040

Report Date: 11/21/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 11/20/17 15:48  
 Analyst: EK

Extraction Method: EPA 3546  
 Extraction Date: 11/18/17 16:05

| Parameter  | Result | Qualifier | Units | RL | MDL |
|--|--------|-----------|-------|----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1064564-1 |        |           |       |    |     |

| Surrogate            | %Recovery | Qualifier | Acceptance<br>Criteria |
|----------------------|-----------|-----------|------------------------|
| 2-Fluorophenol       | 87        |           | 25-120                 |
| Phenol-d6            | 90        |           | 10-120                 |
| Nitrobenzene-d5      | 81        |           | 23-120                 |
| 2-Fluorobiphenyl     | 79        |           | 30-120                 |
| 2,4,6-Tribromophenol | 90        |           | 10-136                 |
| 4-Terphenyl-d14      | 81        |           | 18-120                 |

# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1064564-2 WG1064564-3 |                  |      |                   |      |                     |     |      |               |
| Acenaphthene  | 80               |      | 78                |      | 31-137              | 3   |      | 50            |
| Fluoranthene  | 94               |      | 91                |      | 40-140              | 3   |      | 50            |
| Naphthalene   | 82               |      | 79                |      | 40-140              | 4   |      | 50            |
| Benzo(a)anthracene  | 93               |      | 90                |      | 40-140              | 3   |      | 50            |
| Benzo(a)pyrene  | 96               |      | 95                |      | 40-140              | 1   |      | 50            |
| Benzo(b)fluoranthene  | 96               |      | 95                |      | 40-140              | 1   |      | 50            |
| Benzo(k)fluoranthene  | 89               |      | 86                |      | 40-140              | 3   |      | 50            |
| Chrysene  | 88               |      | 86                |      | 40-140              | 2   |      | 50            |
| Acenaphthylene  | 90               |      | 85                |      | 40-140              | 6   |      | 50            |
| Anthracene  | 91               |      | 88                |      | 40-140              | 3   |      | 50            |
| Benzo(ghi)perylene  | 92               |      | 89                |      | 40-140              | 3   |      | 50            |
| Fluorene  | 88               |      | 82                |      | 40-140              | 7   |      | 50            |
| Phenanthrene  | 87               |      | 85                |      | 40-140              | 2   |      | 50            |
| Dibenzo(a,h)anthracene  | 91               |      | 90                |      | 40-140              | 1   |      | 50            |
| Indeno(1,2,3-cd)pyrene  | 93               |      | 92                |      | 40-140              | 1   |      | 50            |
| Pyrene  | 93               |      | 89                |      | 35-142              | 4   |      | 50            |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

| Parameter | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|-----------|------------------|------|-------------------|------|---------------------|-----|------|---------------|
|-----------|------------------|------|-------------------|------|---------------------|-----|------|---------------|

Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1064564-2 WG1064564-3

| Surrogate            | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|----------------------|------------------|------|-------------------|------|------------------------|
| 2-Fluorophenol       | 92               |      | 88                |      | 25-120                 |
| Phenol-d6            | 92               |      | 90                |      | 10-120                 |
| Nitrobenzene-d5      | 88               |      | 84                |      | 23-120                 |
| 2-Fluorobiphenyl     | 86               |      | 81                |      | 30-120                 |
| 2,4,6-Tribromophenol | 104              |      | 100               |      | 10-136                 |
| 4-Terphenyl-d14      | 91               |      | 87                |      | 18-120                 |

# **INORGANICS & MISCELLANEOUS**

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

### SAMPLE RESULTS

**Lab ID:** L1741810-01  
**Client ID:** BSB-1 (1-2')  
**Sample Location:** BUFFALO, NY  
**Matrix:** Soil

**Date Collected:** 11/13/17 10:00  
**Date Received:** 11/14/17  
**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 86.7   |           | %     | 0.100 | NA  | 1                  | -                | 11/16/17 10:45   | 121,2540G            | RI      |





**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

**SAMPLE RESULTS**

**Lab ID:** L1741810-02  
**Client ID:** BSB-2 (4-5')  
**Sample Location:** BUFFALO, NY  
**Matrix:** Soil

**Date Collected:** 11/13/17 10:45  
**Date Received:** 11/14/17  
**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 85.8   |           | %     | 0.100 | NA  | 1                  | -                | 11/16/17 10:45   | 121,2540G            | RI      |



**Lab Duplicate Analysis**  
Batch Quality Control**Project Name:** MAIN & E. BALCOM**Project Number:** B0234-016-001-00**Lab Number:** L1741810**Report Date:** 11/21/17

| Parameter   | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|---|---------------|------------------|-------|-----|------|------------|
| General Chemistry - Westborough Lab Associated sample(s): 01-02 QC Batch ID: WG1063633-1 QC Sample: L1741456-01 Client ID: DUP Sample |               |                  |       |     |      |            |
| Solids, Total   | 97.3          | 97.6             | %     | 0   |      | 20         |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1741810**Project Number:** B0234-016-001-0040**Report Date:** 11/21/17**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information****Cooler**                      **Custody Seal**

A                                  Absent

**Container Information**

| <b>Container ID</b> | <b>Container Type</b>       | <b>Cooler</b> | <b>Initial<br/>pH</b> | <b>Final<br/>pH</b> | <b>Temp<br/>deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen<br/>Date/Time</b> | <b>Analysis(*)</b>   |
|---------------------|-----------------------------|---------------|-----------------------|---------------------|-----------------------|-------------|-------------|-----------------------------|----------------------|
| L1741810-01A        | Glass 120ml/4oz unpreserved | A             | NA                    |                     | 3.6                   | Y           | Absent      |                             | NYTCL-8260(14)       |
| L1741810-01B        | Glass 120ml/4oz unpreserved | A             | NA                    |                     | 3.6                   | Y           | Absent      |                             | NYTCL-8270(14),TS(7) |
| L1741810-01X        | Vial MeOH preserved split   | A             | NA                    |                     | 3.6                   | Y           | Absent      |                             | NYTCL-8260(14)       |
| L1741810-01Y        | Vial Water preserved split  | A             | NA                    |                     | 3.6                   | Y           | Absent      | <b>16-NOV-17 00:00</b>      | NYTCL-8260(14)       |
| L1741810-01Z        | Vial Water preserved split  | A             | NA                    |                     | 3.6                   | Y           | Absent      | <b>16-NOV-17 00:00</b>      | NYTCL-8260(14)       |
| L1741810-02A        | Glass 120ml/4oz unpreserved | A             | NA                    |                     | 3.6                   | Y           | Absent      |                             | NYTCL-8260(14)       |
| L1741810-02B        | Glass 120ml/4oz unpreserved | A             | NA                    |                     | 3.6                   | Y           | Absent      |                             | NYTCL-8270(14),TS(7) |
| L1741810-02X        | Vial MeOH preserved split   | A             | NA                    |                     | 3.6                   | Y           | Absent      |                             | NYTCL-8260(14)       |
| L1741810-02Y        | Vial Water preserved split  | A             | NA                    |                     | 3.6                   | Y           | Absent      | <b>16-NOV-17 00:00</b>      | NYTCL-8260(14)       |
| L1741810-02Z        | Vial Water preserved split  | A             | NA                    |                     | 3.6                   | Y           | Absent      | <b>16-NOV-17 00:00</b>      | NYTCL-8260(14)       |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.





**Alpha Analytical, Inc.**

ID No.:17873

Facility: **Company-wide**

Revision 10

Department: **Quality Assurance**

Published Date: 1/16/2017 11:00:05 AM

Title: **Certificate/Approval Program Summary**

Page 1 of 1

**Certification Information**

The following analytes are not included in our Primary NELAP Scope of Accreditation:

**Westborough Facility****EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** NPW and SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**EPA 9012B:** NPW: Total Cyanide**EPA 9050A:** NPW: Specific Conductance**SM3500:** NPW: Ferrous Iron**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.**SM5310C:** DW: Dissolved Organic Carbon**Mansfield Facility****SM 2540D:** TSS**EPA 3005A** NPW**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

**Westborough Facility:****Drinking Water****EPA 300.0:** Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE, EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH, EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E.****Mansfield Facility:****Drinking Water****EPA 200.7:** Ba, Be, Cd, Cr, Cu, Ni, Na, Ca. **EPA 200.8:** Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Ni, Se, TL. **EPA 245.1 Hg.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.

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## ANALYTICAL REPORT

|                 |   |
|-----------------|---|
| Lab Number:     | L1738847  |
| Client:         | Turnkey Environmental Restoration, LLC<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley   |
| Phone:          | (716) 856-0599  |
| Project Name:   | MAIN & E. BALCOM  |
| Project Number: | T0239-016-001   |
| Report Date:    | 11/01/17  |

The original project report/data package is held by Alpha Analytical. This report/data package is paginated and should be reproduced only in its entirety. Alpha Analytical holds no responsibility for results and/or data that are not consistent with the original.

Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1738847-01                | B-2 (13')        | SOIL          | BUFFALO, NY                | 10/25/17 13:00                  | 10/25/17            |
| L1738847-02                | SW-1 (8-10')     | SOIL          | BUFFALO, NY                | 10/25/17 13:15                  | 10/25/17            |
| L1738847-03                | SW-2 (8-10')     | SOIL          | BUFFALO, NY                | 10/25/17 13:30                  | 10/25/17            |
| L1738847-04                | SW-3 (8-10')     | SOIL          | BUFFALO, NY                | 10/25/17 13:45                  | 10/25/17            |
| L1738847-05                | SW-4 (8-10')     | SOIL          | BUFFALO, NY                | 10/25/17 14:00                  | 10/25/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

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**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

### Case Narrative (continued)

#### Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

#### Volatile Organics

Any reported concentrations that are below 200 ug/kg may be biased low due to the sample not being collected according to 5035-L/5035A-L low-level specifications.

L1738847-05: The analysis of Volatile Organics was performed from a methanol extract due to the elevated concentrations of non-target compounds in the sample.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:

 Melissa Cripps

Title: Technical Director/Representative

Date: 11/01/17



# ORGANICS

# **VOLATILES**

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

**SAMPLE RESULTS**

**Lab ID:** L1738847-01  
**Client ID:** B-2 (13')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/25/17 13:00  
**Date Received:** 10/25/17  
**Field Prep:** Not Specified

**Matrix:** Soil  
**Analytical Method:** 1,8260C  
**Analytical Date:** 10/30/17 22:57  
**Analyst:** JC  
**Percent Solids:** 83%

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Benzene                                      | ND     |           | ug/kg | 1.2 | 0.23 | 1               |
| Toluene                                      | 0.34   | J         | ug/kg | 1.8 | 0.23 | 1               |
| Ethylbenzene                                 | ND     |           | ug/kg | 1.2 | 0.20 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 2.4 | 0.18 | 1               |
| p/m-Xylene                                   | ND     |           | ug/kg | 2.4 | 0.42 | 1               |
| o-Xylene                                     | ND     |           | ug/kg | 2.4 | 0.40 | 1               |
| n-Butylbenzene                               | 4.4    |           | ug/kg | 1.2 | 0.27 | 1               |
| sec-Butylbenzene                             | 2.0    |           | ug/kg | 1.2 | 0.26 | 1               |
| tert-Butylbenzene                            | ND     |           | ug/kg | 5.9 | 0.29 | 1               |
| Isopropylbenzene                             | ND     |           | ug/kg | 1.2 | 0.23 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/kg | 1.2 | 0.24 | 1               |
| n-Propylbenzene                              | 1.2    |           | ug/kg | 1.2 | 0.25 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/kg | 5.9 | 0.19 | 1               |
| 1,2,4-Trimethylbenzene                       | 0.39   | J         | ug/kg | 5.9 | 0.22 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 94         |           | 70-130              |
| Toluene-d8            | 100        |           | 70-130              |
| 4-Bromofluorobenzene  | 104        |           | 70-130              |
| Dibromofluoromethane  | 92         |           | 70-130              |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

**SAMPLE RESULTS**

**Lab ID:** L1738847-02  
**Client ID:** SW-1 (8-10')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/25/17 13:15  
**Date Received:** 10/25/17  
**Field Prep:** Not Specified

**Matrix:** Soil  
**Analytical Method:** 1,8260C  
**Analytical Date:** 10/30/17 23:23  
**Analyst:** JC  
**Percent Solids:** 86%

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Benzene                                      | ND     |           | ug/kg | 0.92 | 0.18 | 1               |
| Toluene                                      | ND     |           | ug/kg | 1.4  | 0.18 | 1               |
| Ethylbenzene                                 | ND     |           | ug/kg | 0.92 | 0.16 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 1.8  | 0.14 | 1               |
| p/m-Xylene                                   | ND     |           | ug/kg | 1.8  | 0.32 | 1               |
| o-Xylene                                     | ND     |           | ug/kg | 1.8  | 0.31 | 1               |
| n-Butylbenzene                               | 14     |           | ug/kg | 0.92 | 0.21 | 1               |
| sec-Butylbenzene                             | 9.8    |           | ug/kg | 0.92 | 0.20 | 1               |
| tert-Butylbenzene                            | 0.28   | J         | ug/kg | 4.6  | 0.23 | 1               |
| Isopropylbenzene                             | ND     |           | ug/kg | 0.92 | 0.18 | 1               |
| p-Isopropyltoluene                           | 2.7    |           | ug/kg | 0.92 | 0.18 | 1               |
| n-Propylbenzene                              | 1.3    |           | ug/kg | 0.92 | 0.20 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/kg | 4.6  | 0.15 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/kg | 4.6  | 0.17 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 96         |           | 70-130              |
| Toluene-d8            | 100        |           | 70-130              |
| 4-Bromofluorobenzene  | 115        |           | 70-130              |
| Dibromofluoromethane  | 94         |           | 70-130              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738847**Project Number:** T0239-016-001**Report Date:** 11/01/17**SAMPLE RESULTS**

Lab ID: L1738847-03  
 Client ID: SW-2 (8-10')  
 Sample Location: BUFFALO, NY

Date Collected: 10/25/17 13:30  
 Date Received: 10/25/17  
 Field Prep: Not Specified

Matrix: Soil  
 Analytical Method: 1,8260C  
 Analytical Date: 10/30/17 23:49  
 Analyst: JC  
 Percent Solids: 86%

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Benzene                                      | ND     |           | ug/kg | 1.0 | 0.20 | 1               |
| Toluene                                      | ND     |           | ug/kg | 1.6 | 0.20 | 1               |
| Ethylbenzene                                 | ND     |           | ug/kg | 1.0 | 0.18 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 2.1 | 0.16 | 1               |
| p/m-Xylene                                   | ND     |           | ug/kg | 2.1 | 0.36 | 1               |
| o-Xylene                                     | ND     |           | ug/kg | 2.1 | 0.35 | 1               |
| n-Butylbenzene                               | ND     |           | ug/kg | 1.0 | 0.24 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/kg | 1.0 | 0.22 | 1               |
| tert-Butylbenzene                            | ND     |           | ug/kg | 5.2 | 0.26 | 1               |
| Isopropylbenzene                             | ND     |           | ug/kg | 1.0 | 0.20 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/kg | 1.0 | 0.21 | 1               |
| n-Propylbenzene                              | ND     |           | ug/kg | 1.0 | 0.22 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/kg | 5.2 | 0.17 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/kg | 5.2 | 0.19 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 93         |           | 70-130              |
| Toluene-d8            | 105        |           | 70-130              |
| 4-Bromofluorobenzene  | 122        |           | 70-130              |
| Dibromofluoromethane  | 92         |           | 70-130              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738847**Project Number:** T0239-016-001**Report Date:** 11/01/17**SAMPLE RESULTS**

Lab ID: L1738847-04  
 Client ID: SW-3 (8-10')  
 Sample Location: BUFFALO, NY

Date Collected: 10/25/17 13:45  
 Date Received: 10/25/17  
 Field Prep: Not Specified

Matrix: Soil  
 Analytical Method: 1,8260C  
 Analytical Date: 10/31/17 00:15  
 Analyst: JC  
 Percent Solids: 87%

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Benzene                                      | ND     |           | ug/kg | 1.0 | 0.20 | 1               |
| Toluene                                      | 0.24   | J         | ug/kg | 1.5 | 0.20 | 1               |
| Ethylbenzene                                 | 4.3    |           | ug/kg | 1.0 | 0.17 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 2.0 | 0.15 | 1               |
| p/m-Xylene                                   | 7.4    |           | ug/kg | 2.0 | 0.36 | 1               |
| o-Xylene                                     | 0.62   | J         | ug/kg | 2.0 | 0.34 | 1               |
| n-Butylbenzene                               | 3.0    |           | ug/kg | 1.0 | 0.23 | 1               |
| sec-Butylbenzene                             | 4.6    |           | ug/kg | 1.0 | 0.22 | 1               |
| tert-Butylbenzene                            | 0.45   | J         | ug/kg | 5.1 | 0.25 | 1               |
| Isopropylbenzene                             | 3.0    |           | ug/kg | 1.0 | 0.20 | 1               |
| p-Isopropyltoluene                           | 3.4    |           | ug/kg | 1.0 | 0.20 | 1               |
| n-Propylbenzene                              | 8.9    |           | ug/kg | 1.0 | 0.22 | 1               |
| 1,3,5-Trimethylbenzene                       | 8.7    |           | ug/kg | 5.1 | 0.16 | 1               |
| 1,2,4-Trimethylbenzene                       | 12     |           | ug/kg | 5.1 | 0.19 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 92         |           | 70-130              |
| Toluene-d8            | 103        |           | 70-130              |
| 4-Bromofluorobenzene  | 123        |           | 70-130              |
| Dibromofluoromethane  | 91         |           | 70-130              |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738847**Project Number:** T0239-016-001**Report Date:** 11/01/17**SAMPLE RESULTS**

Lab ID: L1738847-05  
 Client ID: SW-4 (8-10')  
 Sample Location: BUFFALO, NY

Date Collected: 10/25/17 14:00  
 Date Received: 10/25/17  
 Field Prep: Not Specified

Matrix: Soil  
 Analytical Method: 1,8260C  
 Analytical Date: 10/30/17 22:31  
 Analyst: MV  
 Percent Solids: 86%

| Parameter                                    | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Benzene                                      | ND     |           | ug/kg | 45  | 8.7 | 1               |
| Toluene                                      | ND     |           | ug/kg | 68  | 8.8 | 1               |
| Ethylbenzene                                 | ND     |           | ug/kg | 45  | 7.7 | 1               |
| Methyl tert butyl ether                      | 8.0    | J         | ug/kg | 90  | 6.9 | 1               |
| p/m-Xylene                                   | ND     |           | ug/kg | 90  | 16. | 1               |
| o-Xylene                                     | ND     |           | ug/kg | 90  | 15. | 1               |
| n-Butylbenzene                               | ND     |           | ug/kg | 45  | 10. | 1               |
| sec-Butylbenzene                             | ND     |           | ug/kg | 45  | 9.8 | 1               |
| tert-Butylbenzene                            | ND     |           | ug/kg | 220 | 11. | 1               |
| Isopropylbenzene                             | ND     |           | ug/kg | 45  | 8.8 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/kg | 45  | 9.1 | 1               |
| n-Propylbenzene                              | ND     |           | ug/kg | 45  | 9.7 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/kg | 220 | 7.3 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/kg | 220 | 8.4 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 97         |           | 70-130              |
| Toluene-d8            | 98         |           | 70-130              |
| 4-Bromofluorobenzene  | 102        |           | 70-130              |
| Dibromofluoromethane  | 93         |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738847

Project Number: T0239-016-001

Report Date: 11/01/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 10/30/17 20:46  
 Analyst: KD

| Parameter   | Result | Qualifier | Units | RL  | MDL |
|---|--------|-----------|-------|-----|-----|
| Volatile Organics by 8260/5035 - Westborough Lab for sample(s): 05 Batch: WG1057995-5 |        |           |       |     |     |
| Benzene   | ND     |           | ug/kg | 50  | 9.6 |
| Toluene   | ND     |           | ug/kg | 75  | 9.8 |
| Ethylbenzene  | ND     |           | ug/kg | 50  | 8.5 |
| Methyl tert butyl ether   | 12     | J         | ug/kg | 100 | 7.6 |
| p/m-Xylene  | ND     |           | ug/kg | 100 | 18. |
| o-Xylene  | ND     |           | ug/kg | 100 | 17. |
| n-Butylbenzene  | ND     |           | ug/kg | 50  | 11. |
| sec-Butylbenzene  | ND     |           | ug/kg | 50  | 11. |
| tert-Butylbenzene   | ND     |           | ug/kg | 250 | 12. |
| Isopropylbenzene  | ND     |           | ug/kg | 50  | 9.7 |
| p-Isopropyltoluene  | ND     |           | ug/kg | 50  | 10. |
| n-Propylbenzene   | ND     |           | ug/kg | 50  | 11. |
| 1,3,5-Trimethylbenzene  | ND     |           | ug/kg | 250 | 8.0 |
| 1,2,4-Trimethylbenzene  | ND     |           | ug/kg | 250 | 9.3 |

| Surrogate             | %Recovery | Qualifier | Acceptance Criteria |
|-----------------------|-----------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 99        |           | 70-130              |
| Toluene-d8            | 98        |           | 70-130              |
| 4-Bromofluorobenzene  | 98        |           | 70-130              |
| Dibromofluoromethane  | 95        |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738847

Project Number: T0239-016-001

Report Date: 11/01/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 10/30/17 20:46  
 Analyst: KD

| Parameter  | Result | Qualifier | Units | RL  | MDL  |
|--|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-04 Batch: WG1057997-5 |        |           |       |     |      |
| Benzene  | ND     |           | ug/kg | 1.0 | 0.19 |
| Toluene  | ND     |           | ug/kg | 1.5 | 0.20 |
| Ethylbenzene   | ND     |           | ug/kg | 1.0 | 0.17 |
| Methyl tert butyl ether  | 0.23   | J         | ug/kg | 2.0 | 0.15 |
| p/m-Xylene   | ND     |           | ug/kg | 2.0 | 0.35 |
| o-Xylene   | ND     |           | ug/kg | 2.0 | 0.34 |
| n-Butylbenzene   | ND     |           | ug/kg | 1.0 | 0.23 |
| sec-Butylbenzene   | ND     |           | ug/kg | 1.0 | 0.22 |
| tert-Butylbenzene  | ND     |           | ug/kg | 5.0 | 0.25 |
| Isopropylbenzene   | ND     |           | ug/kg | 1.0 | 0.19 |
| p-Isopropyltoluene   | ND     |           | ug/kg | 1.0 | 0.20 |
| n-Propylbenzene  | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,3,5-Trimethylbenzene   | ND     |           | ug/kg | 5.0 | 0.16 |
| 1,2,4-Trimethylbenzene   | ND     |           | ug/kg | 5.0 | 0.19 |

| Surrogate             | %Recovery | Qualifier | Acceptance Criteria |
|-----------------------|-----------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 99        |           | 70-130              |
| Toluene-d8            | 98        |           | 70-130              |
| 4-Bromofluorobenzene  | 98        |           | 70-130              |
| Dibromofluoromethane  | 95        |           | 70-130              |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1738847

**Report Date:** 11/01/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 05 Batch: WG1057995-3 WG1057995-4 |                  |      |                   |      |                     |     |      |               |
| Benzene  | 100              |      | 98                |      | 70-130              | 2   |      | 30            |
| Toluene  | 107              |      | 106               |      | 70-130              | 1   |      | 30            |
| Ethylbenzene   | 108              |      | 107               |      | 70-130              | 1   |      | 30            |
| Methyl tert butyl ether  | 89               |      | 90                |      | 66-130              | 1   |      | 30            |
| p/m-Xylene   | 108              |      | 107               |      | 70-130              | 1   |      | 30            |
| o-Xylene   | 107              |      | 105               |      | 70-130              | 2   |      | 30            |
| n-Butylbenzene   | 121              |      | 116               |      | 70-130              | 4   |      | 30            |
| sec-Butylbenzene   | 122              |      | 117               |      | 70-130              | 4   |      | 30            |
| tert-Butylbenzene  | 118              |      | 115               |      | 70-130              | 3   |      | 30            |
| Isopropylbenzene   | 118              |      | 113               |      | 70-130              | 4   |      | 30            |
| p-Isopropyltoluene   | 119              |      | 114               |      | 70-130              | 4   |      | 30            |
| n-Propylbenzene  | 118              |      | 112               |      | 70-130              | 5   |      | 30            |
| 1,3,5-Trimethylbenzene   | 116              |      | 111               |      | 70-130              | 4   |      | 30            |
| 1,2,4-Trimethylbenzene   | 113              |      | 109               |      | 70-130              | 4   |      | 30            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 94               |      | 96                |      | 70-130                 |
| Toluene-d8            | 100              |      | 101               |      | 70-130                 |
| 4-Bromofluorobenzene  | 104              |      | 101               |      | 70-130                 |
| Dibromofluoromethane  | 92               |      | 93                |      | 70-130                 |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1738847

**Report Date:** 11/01/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-04 Batch: WG1057997-3 WG1057997-4 |                  |      |                   |      |                     |     |      |               |
| Benzene   | 100              |      | 98                |      | 70-130              | 2   |      | 30            |
| Toluene   | 107              |      | 106               |      | 70-130              | 1   |      | 30            |
| Ethylbenzene  | 108              |      | 107               |      | 70-130              | 1   |      | 30            |
| Methyl tert butyl ether   | 89               |      | 90                |      | 66-130              | 1   |      | 30            |
| p/m-Xylene  | 108              |      | 107               |      | 70-130              | 1   |      | 30            |
| o-Xylene  | 107              |      | 105               |      | 70-130              | 2   |      | 30            |
| n-Butylbenzene  | 121              |      | 116               |      | 70-130              | 4   |      | 30            |
| sec-Butylbenzene  | 122              |      | 117               |      | 70-130              | 4   |      | 30            |
| tert-Butylbenzene   | 118              |      | 115               |      | 70-130              | 3   |      | 30            |
| Isopropylbenzene  | 118              |      | 113               |      | 70-130              | 4   |      | 30            |
| p-Isopropyltoluene  | 119              |      | 114               |      | 70-130              | 4   |      | 30            |
| n-Propylbenzene   | 118              |      | 112               |      | 70-130              | 5   |      | 30            |
| 1,3,5-Trimethylbenzene  | 116              |      | 111               |      | 70-130              | 4   |      | 30            |
| 1,2,4-Trimethylbenzene  | 113              |      | 109               |      | 70-130              | 4   |      | 30            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 94               |      | 96                |      | 70-130                 |
| Toluene-d8            | 100              |      | 101               |      | 70-130                 |
| 4-Bromofluorobenzene  | 104              |      | 101               |      | 70-130                 |
| Dibromofluoromethane  | 92               |      | 93                |      | 70-130                 |

# SEMIVOLATILES



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

**SAMPLE RESULTS**

**Lab ID:** L1738847-01  
**Client ID:** B-2 (13')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/25/17 13:00  
**Date Received:** 10/25/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 10/29/17 15:59

**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 10/30/17 22:51  
**Analyst:** SZ  
**Percent Solids:** 83%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 160 | 21. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 120 | 23. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 200 | 24. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 120 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 160 | 49. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 120 | 34. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 120 | 32. | 1               |
| Chrysene   | ND     |           | ug/kg | 120 | 21. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 160 | 31. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 120 | 39. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 160 | 24. | 1               |
| Fluorene   | ND     |           | ug/kg | 200 | 19. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 120 | 24. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 120 | 23. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 160 | 28. | 1               |
| Pyrene   | ND     |           | ug/kg | 120 | 20. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 56         |           | 23-120              |
| 2-Fluorobiphenyl | 46         |           | 30-120              |
| 4-Terphenyl-d14  | 38         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

**SAMPLE RESULTS**

**Lab ID:** L1738847-02  
**Client ID:** SW-1 (8-10')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/25/17 13:15  
**Date Received:** 10/25/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 10/29/17 15:59

**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 10/30/17 23:16  
**Analyst:** SZ  
**Percent Solids:** 86%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 20. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 120 | 22. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 120 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 47. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 120 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 120 | 31. | 1               |
| Chrysene   | ND     |           | ug/kg | 120 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 30. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 120 | 38. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 23. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 19. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 120 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 120 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 27. | 1               |
| Pyrene   | ND     |           | ug/kg | 120 | 19. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 47         |           | 23-120              |
| 2-Fluorobiphenyl | 44         |           | 30-120              |
| 4-Terphenyl-d14  | 39         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738847**Project Number:** T0239-016-001**Report Date:** 11/01/17**SAMPLE RESULTS**

Lab ID: L1738847-03  
 Client ID: SW-2 (8-10')  
 Sample Location: BUFFALO, NY

Date Collected: 10/25/17 13:30  
 Date Received: 10/25/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3546  
 Extraction Date: 10/29/17 15:59

Matrix: Soil  
 Analytical Method: 1,8270D  
 Analytical Date: 10/30/17 23:41  
 Analyst: SZ  
 Percent Solids: 86%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 20. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 110 | 22. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 47. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 30. | 1               |
| Chrysene   | ND     |           | ug/kg | 110 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 29. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 37. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 27. | 1               |
| Pyrene   | ND     |           | ug/kg | 110 | 19. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 56         |           | 23-120              |
| 2-Fluorobiphenyl | 45         |           | 30-120              |
| 4-Terphenyl-d14  | 29         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

**SAMPLE RESULTS**

**Lab ID:** L1738847-04  
**Client ID:** SW-3 (8-10')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/25/17 13:45  
**Date Received:** 10/25/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 10/29/17 15:59

**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 10/31/17 00:07  
**Analyst:** SZ  
**Percent Solids:** 87%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 20. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 110 | 22. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 46. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 30. | 1               |
| Chrysene   | ND     |           | ug/kg | 110 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 29. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 37. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 26. | 1               |
| Pyrene   | ND     |           | ug/kg | 110 | 19. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 50         |           | 23-120              |
| 2-Fluorobiphenyl | 36         |           | 30-120              |
| 4-Terphenyl-d14  | 29         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

**SAMPLE RESULTS**

**Lab ID:** L1738847-05  
**Client ID:** SW-4 (8-10')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/25/17 14:00  
**Date Received:** 10/25/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 10/29/17 16:27

**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 10/31/17 00:32  
**Analyst:** SZ  
**Percent Solids:** 86%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 20. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 120 | 22. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 120 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 47. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 120 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 120 | 31. | 1               |
| Chrysene   | ND     |           | ug/kg | 120 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 30. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 120 | 38. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 23. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 19. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 120 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 120 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 27. | 1               |
| Pyrene   | ND     |           | ug/kg | 120 | 19. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 57         |           | 23-120              |
| 2-Fluorobiphenyl | 54         |           | 30-120              |
| 4-Terphenyl-d14  | 49         |           | 18-120              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738847

Project Number: T0239-016-001

Report Date: 11/01/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 10/30/17 21:35  
 Analyst: SZ

Extraction Method: EPA 3546  
 Extraction Date: 10/29/17 15:59

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-05 Batch: WG1057497-1 |        |           |       |     |     |
| Acenaphthene   | ND     |           | ug/kg | 130 | 17. |
| Fluoranthene   | ND     |           | ug/kg | 100 | 19. |
| Naphthalene  | ND     |           | ug/kg | 170 | 20. |
| Benzo(a)anthracene   | ND     |           | ug/kg | 100 | 19. |
| Benzo(a)pyrene   | ND     |           | ug/kg | 130 | 40. |
| Benzo(b)fluoranthene   | ND     |           | ug/kg | 100 | 28. |
| Benzo(k)fluoranthene   | ND     |           | ug/kg | 100 | 27. |
| Chrysene   | ND     |           | ug/kg | 100 | 17. |
| Acenaphthylene   | ND     |           | ug/kg | 130 | 26. |
| Anthracene   | ND     |           | ug/kg | 100 | 32. |
| Benzo(ghi)perylene   | ND     |           | ug/kg | 130 | 20. |
| Fluorene   | ND     |           | ug/kg | 170 | 16. |
| Phenanthrene   | ND     |           | ug/kg | 100 | 20. |
| Dibenzo(a,h)anthracene   | ND     |           | ug/kg | 100 | 19. |
| Indeno(1,2,3-cd)pyrene   | ND     |           | ug/kg | 130 | 23. |
| Pyrene   | ND     |           | ug/kg | 100 | 16. |

#### Tentatively Identified Compounds

No Tentatively Identified Compounds      ND      ug/kg



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738847**Project Number:** T0239-016-001**Report Date:** 11/01/17**Method Blank Analysis**  
**Batch Quality Control**Analytical Method: 1,8270D  
Analytical Date: 10/30/17 21:35  
Analyst: SZExtraction Method: EPA 3546  
Extraction Date: 10/29/17 15:59

| Parameter  | Result | Qualifier | Units | RL | MDL |
|--|--------|-----------|-------|----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-05 Batch: WG1057497-1 |        |           |       |    |     |

| Surrogate            | %Recovery | Qualifier | Acceptance<br>Criteria |
|----------------------|-----------|-----------|------------------------|
| 2-Fluorophenol       | 71        |           | 25-120                 |
| Phenol-d6            | 72        |           | 10-120                 |
| Nitrobenzene-d5      | 70        |           | 23-120                 |
| 2-Fluorobiphenyl     | 70        |           | 30-120                 |
| 2,4,6-Tribromophenol | 78        |           | 10-136                 |
| 4-Terphenyl-d14      | 82        |           | 18-120                 |

# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1738847

**Project Number:** T0239-016-001

**Report Date:** 11/01/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-05 Batch: WG1057497-2 WG1057497-3 |                  |      |                   |      |                     |     |      |               |
| Acenaphthene  | 88               |      | 98                |      | 31-137              | 11  |      | 50            |
| Fluoranthene  | 92               |      | 104               |      | 40-140              | 12  |      | 50            |
| Naphthalene   | 89               |      | 101               |      | 40-140              | 13  |      | 50            |
| Benzo(a)anthracene  | 89               |      | 102               |      | 40-140              | 14  |      | 50            |
| Benzo(a)pyrene  | 90               |      | 102               |      | 40-140              | 13  |      | 50            |
| Benzo(b)fluoranthene  | 88               |      | 101               |      | 40-140              | 14  |      | 50            |
| Benzo(k)fluoranthene  | 89               |      | 102               |      | 40-140              | 14  |      | 50            |
| Chrysene  | 88               |      | 101               |      | 40-140              | 14  |      | 50            |
| Acenaphthylene  | 96               |      | 108               |      | 40-140              | 12  |      | 50            |
| Anthracene  | 91               |      | 103               |      | 40-140              | 12  |      | 50            |
| Benzo(ghi)perylene  | 88               |      | 98                |      | 40-140              | 11  |      | 50            |
| Fluorene  | 90               |      | 101               |      | 40-140              | 12  |      | 50            |
| Phenanthrene  | 88               |      | 100               |      | 40-140              | 13  |      | 50            |
| Dibenzo(a,h)anthracene  | 88               |      | 100               |      | 40-140              | 13  |      | 50            |
| Indeno(1,2,3-cd)pyrene  | 89               |      | 100               |      | 40-140              | 12  |      | 50            |
| Pyrene  | 89               |      | 102               |      | 35-142              | 14  |      | 50            |

## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738847

Project Number: T0239-016-001

Report Date: 11/01/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-05 Batch: WG1057497-2 WG1057497-3 |                  |      |                   |      |                     |     |      |               |

| Surrogate            | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|----------------------|------------------|------|-------------------|------|------------------------|
| 2-Fluorophenol       | 69               |      | 77                |      | 25-120                 |
| Phenol-d6            | 71               |      | 78                |      | 10-120                 |
| Nitrobenzene-d5      | 69               |      | 77                |      | 23-120                 |
| 2-Fluorobiphenyl     | 65               |      | 72                |      | 30-120                 |
| 2,4,6-Tribromophenol | 67               |      | 73                |      | 10-136                 |
| 4-Terphenyl-d14      | 64               |      | 72                |      | 18-120                 |

# **INORGANICS & MISCELLANEOUS**

**Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1738847**Report Date:** 11/01/17**SAMPLE RESULTS****Lab ID:** L1738847-01**Client ID:** B-2 (13')**Sample Location:** BUFFALO, NY**Matrix:** Soil**Date Collected:** 10/25/17 13:00**Date Received:** 10/25/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 82.9   |           | %     | 0.100 | NA  | 1                  | -                | 10/30/17 10:37   | 121,2540G            | RI      |



Project Name: MAIN &amp; E. BALCOM

Project Number: T0239-016-001

Lab Number: L1738847

Report Date: 11/01/17

## SAMPLE RESULTS

Lab ID: L1738847-02

Client ID: SW-1 (8-10')

Sample Location: BUFFALO, NY

Matrix: Soil

Date Collected: 10/25/17 13:15

Date Received: 10/25/17

Field Prep: Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 86.2   |           | %     | 0.100 | NA  | 1                  | -                | 10/30/17 10:37   | 121,2540G            | RI      |





Project Name: MAIN &amp; E. BALCOM

Project Number: T0239-016-001

Lab Number: L1738847

Report Date: 11/01/17

**SAMPLE RESULTS**

Lab ID: L1738847-03

Client ID: SW-2 (8-10')

Sample Location: BUFFALO, NY

Matrix: Soil

Date Collected: 10/25/17 13:30

Date Received: 10/25/17

Field Prep: Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 86.1   |           | %     | 0.100 | NA  | 1                  | -                | 10/30/17 10:37   | 121,2540G            | RI      |



Project Name: MAIN &amp; E. BALCOM

Project Number: T0239-016-001

Lab Number: L1738847

Report Date: 11/01/17

**SAMPLE RESULTS**

Lab ID: L1738847-04

Client ID: SW-3 (8-10')

Sample Location: BUFFALO, NY

Matrix: Soil

Date Collected: 10/25/17 13:45

Date Received: 10/25/17

Field Prep: Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 86.6   |           | %     | 0.100 | NA  | 1                  | -                | 10/30/17 10:37   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1738847**Report Date:** 11/01/17**SAMPLE RESULTS****Lab ID:** L1738847-05**Client ID:** SW-4 (8-10')**Sample Location:** BUFFALO, NY**Matrix:** Soil**Date Collected:** 10/25/17 14:00**Date Received:** 10/25/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 85.8   |           | %     | 0.100 | NA  | 1                  | -                | 10/30/17 10:37   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Duplicate Analysis**  
**Batch Quality Control**

**Lab Number:** L1738847  
**Report Date:** 11/01/17

| Parameter  | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|--|---------------|------------------|-------|-----|------|------------|
| General Chemistry - Westborough Lab Associated sample(s): 01-05 QC Batch ID: WG1057598-1 QC Sample: L1738847-01 Client ID: B-2 (13') |               |                  |       |     |      |            |
| Solids, Total  | 82.9          | 80.2             | %     | 3   |      | 20         |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738847**Project Number:** T0239-016-001**Report Date:** 11/01/17**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information**

|               |                     |
|---------------|---------------------|
| <b>Cooler</b> | <b>Custody Seal</b> |
| A             | Absent              |

**Container Information**

| <b>Container ID</b> | <b>Container Type</b>       | <b>Cooler</b> | <b>Initial pH</b> | <b>Final pH</b> | <b>Temp deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen Date/Time</b> | <b>Analysis(*)</b>   |
|---------------------|-----------------------------|---------------|-------------------|-----------------|-------------------|-------------|-------------|-------------------------|----------------------|
| L1738847-01A        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738847-01B        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8270(14),TS(7) |
| L1738847-01X        | Vial MeOH preserved split   | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738847-01Y        | Vial Water preserved split  | A             | NA                |                 | 2.5               | Y           | Absent      | 27-OCT-17 08:48         | NYTCL-8260(14)       |
| L1738847-01Z        | Vial Water preserved split  | A             | NA                |                 | 2.5               | Y           | Absent      | 27-OCT-17 08:48         | NYTCL-8260(14)       |
| L1738847-02A        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738847-02B        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8270(14),TS(7) |
| L1738847-02X        | Vial MeOH preserved split   | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738847-02Y        | Vial Water preserved split  | A             | NA                |                 | 2.5               | Y           | Absent      | 27-OCT-17 08:48         | NYTCL-8260(14)       |
| L1738847-02Z        | Vial Water preserved split  | A             | NA                |                 | 2.5               | Y           | Absent      | 27-OCT-17 08:48         | NYTCL-8260(14)       |
| L1738847-03A        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738847-03B        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8270(14),TS(7) |
| L1738847-03X        | Vial MeOH preserved split   | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738847-03Y        | Vial Water preserved split  | A             | NA                |                 | 2.5               | Y           | Absent      | 27-OCT-17 08:48         | NYTCL-8260(14)       |
| L1738847-03Z        | Vial Water preserved split  | A             | NA                |                 | 2.5               | Y           | Absent      | 27-OCT-17 08:48         | NYTCL-8260(14)       |
| L1738847-04A        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738847-04B        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8270(14),TS(7) |
| L1738847-04X        | Vial MeOH preserved split   | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738847-04Y        | Vial Water preserved split  | A             | NA                |                 | 2.5               | Y           | Absent      | 27-OCT-17 08:48         | NYTCL-8260(14)       |
| L1738847-04Z        | Vial Water preserved split  | A             | NA                |                 | 2.5               | Y           | Absent      | 27-OCT-17 08:48         | NYTCL-8260(14)       |
| L1738847-05A        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738847-05B        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8270(14),TS(7) |
| L1738847-05X        | Vial MeOH preserved split   | A             | NA                |                 | 2.5               | Y           | Absent      |                         | NYTCL-8260(14)       |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

Serial\_No:11011715:21  
**Lab Number:** L1738847  
**Report Date:** 11/01/17

**Container Information**

| <b>Container ID</b> | <b>Container Type</b>      | <b>Cooler</b> | <b>Initial<br/>pH</b> | <b>Final<br/>pH</b> | <b>Temp<br/>deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen<br/>Date/Time</b> | <b>Analysis(*)</b> |
|---------------------|----------------------------|---------------|-----------------------|---------------------|-----------------------|-------------|-------------|-----------------------------|--------------------|
| L1738847-05Y        | Vial Water preserved split | A             | NA                    |                     | 2.5                   | Y           | Absent      | 27-OCT-17 08:48             | NYTCL-8260(14)     |
| L1738847-05Z        | Vial Water preserved split | A             | NA                    |                     | 2.5                   | Y           | Absent      | 27-OCT-17 08:48             | NYTCL-8260(14)     |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers





**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



**Alpha Analytical, Inc.**

ID No.:17873

Facility: **Company-wide**

Revision 10

Department: **Quality Assurance**

Published Date: 1/16/2017 11:00:05 AM

Title: **Certificate/Approval Program Summary**

Page 1 of 1

**Certification Information**

The following analytes are not included in our Primary NELAP Scope of Accreditation:

**Westborough Facility****EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** NPW and SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**EPA 9012B:** NPW: Total Cyanide**EPA 9050A:** NPW: Specific Conductance**SM3500:** NPW: Ferrous Iron**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.**SM5310C:** DW: Dissolved Organic Carbon**Mansfield Facility****SM 2540D:** TSS**EPA 3005A** NPW**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

**Westborough Facility:****Drinking Water****EPA 300.0:** Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE, EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH, EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E.****Mansfield Facility:****Drinking Water****EPA 200.7:** Ba, Be, Cd, Cr, Cu, Ni, Na, Ca. **EPA 200.8:** Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Ni, Se, TL. **EPA 245.1 Hg.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.

LN38247

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)



## ANALYTICAL REPORT

|                 |   |
|-----------------|---|
| Lab Number:     | L1738668  |
| Client:         | Turnkey Environmental Restoration, LLC<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley   |
| Phone:          | (716) 856-0599  |
| Project Name:   | MAIN & E. BALCOM  |
| Project Number: | T0239-016-001   |
| Report Date:    | 10/31/17  |

The original project report/data package is held by Alpha Analytical. This report/data package is paginated and should be reproduced only in its entirety. Alpha Analytical holds no responsibility for results and/or data that are not consistent with the original.

Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738668  
**Report Date:** 10/31/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1738668-01                | SW-1 (13-15')    | SOIL          | BUFFALO, NY                | 10/24/17 09:00                  | 10/24/17            |
| L1738668-02                | SW-2 (7-9')      | SOIL          | BUFFALO, NY                | 10/24/17 15:00                  | 10/24/17            |
| L1738668-03                | SW-3 (7-9')      | SOIL          | BUFFALO, NY                | 10/24/17 15:15                  | 10/24/17            |
| L1738668-04                | SW-4 (7-9')      | SOIL          | BUFFALO, NY                | 10/24/17 15:30                  | 10/24/17            |
| L1738668-05                | SW-5 (9-11')     | SOIL          | BUFFALO, NY                | 10/24/17 15:45                  | 10/24/17            |
| L1738668-06                | SW-6 (7-9')      | SOIL          | BUFFALO, NY                | 10/24/17 16:00                  | 10/24/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738668  
**Report Date:** 10/31/17

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

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**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738668  
**Report Date:** 10/31/17

### Case Narrative (continued)

#### Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

#### Volatile Organics

Any reported concentrations that are below 200 ug/kg may be low due to the sample not being collected according to 5035-L/5035A-L low-level specifications.

L1738668-06: The surrogate recovery is outside the acceptance criteria for 4-bromofluorobenzene (161%); however, the sample was not re-analyzed due to coelution with an obvious interference. A copy of the chromatogram is included as an attachment to this report. The results are not considered to be biased.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:

 Amita Naik

Title: Technical Director/Representative

Date: 10/31/17

# ORGANICS

# **VOLATILES**

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738668**Project Number:** T0239-016-001**Report Date:** 10/31/17**SAMPLE RESULTS**

Lab ID: L1738668-01  
 Client ID: SW-1 (13-15')  
 Sample Location: BUFFALO, NY

Date Collected: 10/24/17 09:00  
 Date Received: 10/24/17  
 Field Prep: Not Specified

Matrix: Soil  
 Analytical Method: 1,8260C  
 Analytical Date: 10/29/17 14:49  
 Analyst: CBN  
 Percent Solids: 86%

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Benzene                                      | ND     |           | ug/kg | 0.92 | 0.18 | 1               |
| Toluene                                      | ND     |           | ug/kg | 1.4  | 0.18 | 1               |
| Ethylbenzene                                 | 0.29   | J         | ug/kg | 0.92 | 0.16 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 1.8  | 0.14 | 1               |
| p/m-Xylene                                   | 0.79   | J         | ug/kg | 1.8  | 0.32 | 1               |
| o-Xylene                                     | ND     |           | ug/kg | 1.8  | 0.31 | 1               |
| n-Butylbenzene                               | 1.0    |           | ug/kg | 0.92 | 0.21 | 1               |
| sec-Butylbenzene                             | 0.83   | J         | ug/kg | 0.92 | 0.20 | 1               |
| tert-Butylbenzene                            | ND     |           | ug/kg | 4.6  | 0.23 | 1               |
| Isopropylbenzene                             | ND     |           | ug/kg | 0.92 | 0.18 | 1               |
| p-Isopropyltoluene                           | 0.81   | J         | ug/kg | 0.92 | 0.18 | 1               |
| n-Propylbenzene                              | 1.2    |           | ug/kg | 0.92 | 0.20 | 1               |
| 1,3,5-Trimethylbenzene                       | 0.60   | J         | ug/kg | 4.6  | 0.15 | 1               |
| 1,2,4-Trimethylbenzene                       | 1.6    | J         | ug/kg | 4.6  | 0.17 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 98         |           | 70-130              |
| Toluene-d8            | 100        |           | 70-130              |
| 4-Bromofluorobenzene  | 107        |           | 70-130              |
| Dibromofluoromethane  | 95         |           | 70-130              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738668**Project Number:** T0239-016-001**Report Date:** 10/31/17**SAMPLE RESULTS**

Lab ID: L1738668-02  
 Client ID: SW-2 (7-9')  
 Sample Location: BUFFALO, NY

Date Collected: 10/24/17 15:00  
 Date Received: 10/24/17  
 Field Prep: Not Specified

Matrix: Soil  
 Analytical Method: 1,8260C  
 Analytical Date: 10/29/17 15:15  
 Analyst: CBN  
 Percent Solids: 88%

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Benzene                                      | ND     |           | ug/kg | 1.1 | 0.22 | 1               |
| Toluene                                      | ND     |           | ug/kg | 1.7 | 0.22 | 1               |
| Ethylbenzene                                 | ND     |           | ug/kg | 1.1 | 0.19 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 2.3 | 0.17 | 1               |
| p/m-Xylene                                   | ND     |           | ug/kg | 2.3 | 0.40 | 1               |
| o-Xylene                                     | ND     |           | ug/kg | 2.3 | 0.38 | 1               |
| n-Butylbenzene                               | ND     |           | ug/kg | 1.1 | 0.26 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/kg | 1.1 | 0.25 | 1               |
| tert-Butylbenzene                            | ND     |           | ug/kg | 5.7 | 0.28 | 1               |
| Isopropylbenzene                             | ND     |           | ug/kg | 1.1 | 0.22 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/kg | 1.1 | 0.23 | 1               |
| n-Propylbenzene                              | ND     |           | ug/kg | 1.1 | 0.24 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/kg | 5.7 | 0.18 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/kg | 5.7 | 0.21 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 98         |           | 70-130              |
| Toluene-d8            | 99         |           | 70-130              |
| 4-Bromofluorobenzene  | 105        |           | 70-130              |
| Dibromofluoromethane  | 96         |           | 70-130              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738668**Project Number:** T0239-016-001**Report Date:** 10/31/17**SAMPLE RESULTS**

Lab ID: L1738668-03  
 Client ID: SW-3 (7-9')  
 Sample Location: BUFFALO, NY

Date Collected: 10/24/17 15:15  
 Date Received: 10/24/17  
 Field Prep: Not Specified

Matrix: Soil  
 Analytical Method: 1,8260C  
 Analytical Date: 10/29/17 15:41  
 Analyst: CBN  
 Percent Solids: 87%

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Benzene                                      | ND     |           | ug/kg | 0.82 | 0.16 | 1               |
| Toluene                                      | 0.23   | J         | ug/kg | 1.2  | 0.16 | 1               |
| Ethylbenzene                                 | ND     |           | ug/kg | 0.82 | 0.14 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 1.6  | 0.12 | 1               |
| p/m-Xylene                                   | ND     |           | ug/kg | 1.6  | 0.29 | 1               |
| o-Xylene                                     | ND     |           | ug/kg | 1.6  | 0.28 | 1               |
| n-Butylbenzene                               | ND     |           | ug/kg | 0.82 | 0.19 | 1               |
| sec-Butylbenzene                             | 0.18   | J         | ug/kg | 0.82 | 0.18 | 1               |
| tert-Butylbenzene                            | ND     |           | ug/kg | 4.1  | 0.20 | 1               |
| Isopropylbenzene                             | ND     |           | ug/kg | 0.82 | 0.16 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/kg | 0.82 | 0.17 | 1               |
| n-Propylbenzene                              | ND     |           | ug/kg | 0.82 | 0.18 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/kg | 4.1  | 0.13 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/kg | 4.1  | 0.15 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 100        |           | 70-130              |
| Toluene-d8            | 99         |           | 70-130              |
| 4-Bromofluorobenzene  | 105        |           | 70-130              |
| Dibromofluoromethane  | 96         |           | 70-130              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738668**Project Number:** T0239-016-001**Report Date:** 10/31/17**SAMPLE RESULTS**

Lab ID: L1738668-04  
 Client ID: SW-4 (7-9')  
 Sample Location: BUFFALO, NY

Date Collected: 10/24/17 15:30  
 Date Received: 10/24/17  
 Field Prep: Not Specified

Matrix: Soil  
 Analytical Method: 1,8260C  
 Analytical Date: 10/29/17 16:07  
 Analyst: CBN  
 Percent Solids: 86%

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Benzene                                      | ND     |           | ug/kg | 1.2 | 0.22 | 1               |
| Toluene                                      | 0.57   | J         | ug/kg | 1.8 | 0.23 | 1               |
| Ethylbenzene                                 | 0.88   | J         | ug/kg | 1.2 | 0.20 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 2.3 | 0.18 | 1               |
| p/m-Xylene                                   | ND     |           | ug/kg | 2.3 | 0.41 | 1               |
| o-Xylene                                     | ND     |           | ug/kg | 2.3 | 0.39 | 1               |
| n-Butylbenzene                               | 2.3    |           | ug/kg | 1.2 | 0.27 | 1               |
| sec-Butylbenzene                             | 4.7    |           | ug/kg | 1.2 | 0.25 | 1               |
| tert-Butylbenzene                            | 0.30   | J         | ug/kg | 5.8 | 0.29 | 1               |
| Isopropylbenzene                             | 0.84   | J         | ug/kg | 1.2 | 0.23 | 1               |
| p-Isopropyltoluene                           | 2.2    |           | ug/kg | 1.2 | 0.24 | 1               |
| n-Propylbenzene                              | 1.2    |           | ug/kg | 1.2 | 0.25 | 1               |
| 1,3,5-Trimethylbenzene                       | 0.24   | J         | ug/kg | 5.8 | 0.19 | 1               |
| 1,2,4-Trimethylbenzene                       | 0.83   | J         | ug/kg | 5.8 | 0.22 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 94         |           | 70-130              |
| Toluene-d8            | 102        |           | 70-130              |
| 4-Bromofluorobenzene  | 122        |           | 70-130              |
| Dibromofluoromethane  | 94         |           | 70-130              |



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738668  
**Report Date:** 10/31/17

**SAMPLE RESULTS**

**Lab ID:** L1738668-05  
**Client ID:** SW-5 (9-11')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/24/17 15:45  
**Date Received:** 10/24/17  
**Field Prep:** Not Specified

**Matrix:** Soil  
**Analytical Method:** 1,8260C  
**Analytical Date:** 10/29/17 16:33  
**Analyst:** CBN  
**Percent Solids:** 85%

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Benzene                                      | 0.43   | J         | ug/kg | 1.2 | 0.23 | 1               |
| Toluene                                      | 0.38   | J         | ug/kg | 1.8 | 0.23 | 1               |
| Ethylbenzene                                 | 13     |           | ug/kg | 1.2 | 0.20 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 2.3 | 0.18 | 1               |
| p/m-Xylene                                   | 14     |           | ug/kg | 2.3 | 0.41 | 1               |
| o-Xylene                                     | 1.2    | J         | ug/kg | 2.3 | 0.40 | 1               |
| n-Butylbenzene                               | ND     |           | ug/kg | 1.2 | 0.27 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/kg | 1.2 | 0.25 | 1               |
| tert-Butylbenzene                            | ND     |           | ug/kg | 5.9 | 0.29 | 1               |
| Isopropylbenzene                             | 3.4    |           | ug/kg | 1.2 | 0.23 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/kg | 1.2 | 0.24 | 1               |
| n-Propylbenzene                              | 2.0    |           | ug/kg | 1.2 | 0.25 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/kg | 5.9 | 0.19 | 1               |
| 1,2,4-Trimethylbenzene                       | 1.0    | J         | ug/kg | 5.9 | 0.22 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 95         |           | 70-130              |
| Toluene-d8            | 101        |           | 70-130              |
| 4-Bromofluorobenzene  | 103        |           | 70-130              |
| Dibromofluoromethane  | 89         |           | 70-130              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738668**Project Number:** T0239-016-001**Report Date:** 10/31/17**SAMPLE RESULTS**

Lab ID: L1738668-06  
 Client ID: SW-6 (7-9')  
 Sample Location: BUFFALO, NY

Date Collected: 10/24/17 16:00  
 Date Received: 10/24/17  
 Field Prep: Not Specified

Matrix: Soil  
 Analytical Method: 1,8260C  
 Analytical Date: 10/29/17 16:59  
 Analyst: CBN  
 Percent Solids: 84%

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Benzene                                      | ND     |           | ug/kg | 0.92 | 0.18 | 1               |
| Toluene                                      | ND     |           | ug/kg | 1.4  | 0.18 | 1               |
| Ethylbenzene                                 | 3.9    |           | ug/kg | 0.92 | 0.16 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 1.8  | 0.14 | 1               |
| p/m-Xylene                                   | 0.64   | J         | ug/kg | 1.8  | 0.32 | 1               |
| o-Xylene                                     | 1.1    | J         | ug/kg | 1.8  | 0.31 | 1               |
| n-Butylbenzene                               | 28     |           | ug/kg | 0.92 | 0.21 | 1               |
| sec-Butylbenzene                             | 22     |           | ug/kg | 0.92 | 0.20 | 1               |
| tert-Butylbenzene                            | 1.4    | J         | ug/kg | 4.6  | 0.23 | 1               |
| Isopropylbenzene                             | 7.0    |           | ug/kg | 0.92 | 0.18 | 1               |
| p-Isopropyltoluene                           | 17     |           | ug/kg | 0.92 | 0.18 | 1               |
| n-Propylbenzene                              | 25     |           | ug/kg | 0.92 | 0.20 | 1               |
| 1,3,5-Trimethylbenzene                       | 1.0    | J         | ug/kg | 4.6  | 0.15 | 1               |
| 1,2,4-Trimethylbenzene                       | 6.1    |           | ug/kg | 4.6  | 0.17 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 95         |           | 70-130              |
| Toluene-d8            | 113        |           | 70-130              |
| 4-Bromofluorobenzene  | 161        | Q         | 70-130              |
| Dibromofluoromethane  | 90         |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738668

Project Number: T0239-016-001

Report Date: 10/31/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 10/29/17 09:34  
 Analyst: CBN

| Parameter  | Result | Qualifier | Units | RL  | MDL  |
|--|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-06 Batch: WG1057636-5 |        |           |       |     |      |
| Benzene  | ND     |           | ug/kg | 1.0 | 0.19 |
| Toluene  | ND     |           | ug/kg | 1.5 | 0.20 |
| Ethylbenzene   | ND     |           | ug/kg | 1.0 | 0.17 |
| Methyl tert butyl ether  | ND     |           | ug/kg | 2.0 | 0.15 |
| p/m-Xylene   | ND     |           | ug/kg | 2.0 | 0.35 |
| o-Xylene   | ND     |           | ug/kg | 2.0 | 0.34 |
| n-Butylbenzene   | ND     |           | ug/kg | 1.0 | 0.23 |
| sec-Butylbenzene   | ND     |           | ug/kg | 1.0 | 0.22 |
| tert-Butylbenzene  | ND     |           | ug/kg | 5.0 | 0.25 |
| Isopropylbenzene   | ND     |           | ug/kg | 1.0 | 0.19 |
| p-Isopropyltoluene   | ND     |           | ug/kg | 1.0 | 0.20 |
| n-Propylbenzene  | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,3,5-Trimethylbenzene   | ND     |           | ug/kg | 5.0 | 0.16 |
| 1,2,4-Trimethylbenzene   | ND     |           | ug/kg | 5.0 | 0.19 |

| Surrogate             | %Recovery | Qualifier | Acceptance<br>Criteria |
|-----------------------|-----------|-----------|------------------------|
| 1,2-Dichloroethane-d4 | 101       |           | 70-130                 |
| Toluene-d8            | 98        |           | 70-130                 |
| 4-Bromofluorobenzene  | 99        |           | 70-130                 |
| Dibromofluoromethane  | 96        |           | 70-130                 |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1738668

**Report Date:** 10/31/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-06 Batch: WG1057636-3 WG1057636-4 |                  |      |                   |      |                     |     |      |               |
| Benzene   | 104              |      | 101               |      | 70-130              | 3   |      | 30            |
| Toluene   | 110              |      | 107               |      | 70-130              | 3   |      | 30            |
| Ethylbenzene  | 111              |      | 107               |      | 70-130              | 4   |      | 30            |
| Methyl tert butyl ether   | 91               |      | 90                |      | 66-130              | 1   |      | 30            |
| p/m-Xylene  | 112              |      | 110               |      | 70-130              | 2   |      | 30            |
| o-Xylene  | 109              |      | 106               |      | 70-130              | 3   |      | 30            |
| n-Butylbenzene  | 122              |      | 118               |      | 70-130              | 3   |      | 30            |
| sec-Butylbenzene  | 123              |      | 119               |      | 70-130              | 3   |      | 30            |
| tert-Butylbenzene   | 119              |      | 116               |      | 70-130              | 3   |      | 30            |
| Isopropylbenzene  | 118              |      | 114               |      | 70-130              | 3   |      | 30            |
| p-Isopropyltoluene  | 120              |      | 116               |      | 70-130              | 3   |      | 30            |
| n-Propylbenzene   | 118              |      | 114               |      | 70-130              | 3   |      | 30            |
| 1,3,5-Trimethylbenzene  | 116              |      | 113               |      | 70-130              | 3   |      | 30            |
| 1,2,4-Trimethylbenzene  | 113              |      | 110               |      | 70-130              | 3   |      | 30            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 94               |      | 94                |      | 70-130                 |
| Toluene-d8            | 99               |      | 100               |      | 70-130                 |
| 4-Bromofluorobenzene  | 101              |      | 100               |      | 70-130                 |
| Dibromofluoromethane  | 92               |      | 94                |      | 70-130                 |

# SEMIVOLATILES

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738668  
**Report Date:** 10/31/17

**SAMPLE RESULTS**

**Lab ID:** L1738668-01  
**Client ID:** SW-1 (13-15')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/24/17 09:00  
**Date Received:** 10/24/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 10/28/17 13:49

**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 10/29/17 22:29  
**Analyst:** TT  
**Percent Solids:** 86%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | 31     | J         | ug/kg | 150 | 20. | 1               |
| Fluoranthene                                     | 63     | J         | ug/kg | 110 | 22. | 1               |
| Naphthalene                                      | 68     | J         | ug/kg | 190 | 23. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 46. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 30. | 1               |
| Chrysene   | ND     |           | ug/kg | 110 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 29. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 37. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | 42     | J         | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | 120    |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 26. | 1               |
| Pyrene   | 41     | J         | ug/kg | 110 | 19. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 79         |           | 23-120              |
| 2-Fluorobiphenyl | 64         |           | 30-120              |
| 4-Terphenyl-d14  | 56         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738668**Project Number:** T0239-016-001**Report Date:** 10/31/17**SAMPLE RESULTS**

Lab ID: L1738668-02  
 Client ID: SW-2 (7-9')  
 Sample Location: BUFFALO, NY

Date Collected: 10/24/17 15:00  
 Date Received: 10/24/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3546  
 Extraction Date: 10/28/17 13:49

Matrix: Soil  
 Analytical Method: 1,8270D  
 Analytical Date: 10/29/17 22:56  
 Analyst: TT  
 Percent Solids: 88%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 19. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 110 | 21. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 180 | 22. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 45. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 31. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 29. | 1               |
| Chrysene   | ND     |           | ug/kg | 110 | 19. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 28. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 36. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | ND     |           | ug/kg | 180 | 18. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 110 | 22. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 21. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 26. | 1               |
| Pyrene   | ND     |           | ug/kg | 110 | 18. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 40         |           | 23-120              |
| 2-Fluorobiphenyl | 38         |           | 30-120              |
| 4-Terphenyl-d14  | 33         |           | 18-120              |



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738668  
**Report Date:** 10/31/17

**SAMPLE RESULTS**

**Lab ID:** L1738668-03  
**Client ID:** SW-3 (7-9')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/24/17 15:15  
**Date Received:** 10/24/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 10/28/17 13:49

**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 10/29/17 23:22  
**Analyst:** TT  
**Percent Solids:** 87%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 20. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 110 | 22. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 47. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 30. | 1               |
| Chrysene   | ND     |           | ug/kg | 110 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 30. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 37. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 27. | 1               |
| Pyrene   | ND     |           | ug/kg | 110 | 19. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 34         |           | 23-120              |
| 2-Fluorobiphenyl | 34         |           | 30-120              |
| 4-Terphenyl-d14  | 37         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738668**Project Number:** T0239-016-001**Report Date:** 10/31/17**SAMPLE RESULTS**

Lab ID: L1738668-04  
 Client ID: SW-4 (7-9')  
 Sample Location: BUFFALO, NY

Date Collected: 10/24/17 15:30  
 Date Received: 10/24/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3546  
 Extraction Date: 10/28/17 13:49

Matrix: Soil  
 Analytical Method: 1,8270D  
 Analytical Date: 10/29/17 23:48  
 Analyst: TT  
 Percent Solids: 86%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 20. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 110 | 22. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 46. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 30. | 1               |
| Chrysene   | ND     |           | ug/kg | 110 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 29. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 37. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | 18     | J         | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 26. | 1               |
| Pyrene   | ND     |           | ug/kg | 110 | 19. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 46         |           | 23-120              |
| 2-Fluorobiphenyl | 43         |           | 30-120              |
| 4-Terphenyl-d14  | 36         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738668  
**Report Date:** 10/31/17

**SAMPLE RESULTS**

**Lab ID:** L1738668-05  
**Client ID:** SW-5 (9-11')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/24/17 15:45  
**Date Received:** 10/24/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 10/28/17 13:49

**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 10/30/17 00:14  
**Analyst:** TT  
**Percent Solids:** 85%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 20. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 110 | 22. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 47. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 30. | 1               |
| Chrysene   | ND     |           | ug/kg | 110 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 30. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 37. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 27. | 1               |
| Pyrene   | ND     |           | ug/kg | 110 | 19. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 67         |           | 23-120              |
| 2-Fluorobiphenyl | 63         |           | 30-120              |
| 4-Terphenyl-d14  | 57         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738668  
**Report Date:** 10/31/17

**SAMPLE RESULTS**

**Lab ID:** L1738668-06  
**Client ID:** SW-6 (7-9')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/24/17 16:00  
**Date Received:** 10/24/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 10/28/17 13:49

**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 10/30/17 00:41  
**Analyst:** TT  
**Percent Solids:** 84%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 160 | 20. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 120 | 22. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 200 | 24. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 120 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 160 | 48. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 120 | 33. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 120 | 31. | 1               |
| Chrysene   | ND     |           | ug/kg | 120 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 160 | 30. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 120 | 38. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 160 | 23. | 1               |
| Fluorene   | ND     |           | ug/kg | 200 | 19. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 120 | 24. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 120 | 23. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 160 | 27. | 1               |
| Pyrene   | ND     |           | ug/kg | 120 | 19. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 77         |           | 23-120              |
| 2-Fluorobiphenyl | 72         |           | 30-120              |
| 4-Terphenyl-d14  | 75         |           | 18-120              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738668

Project Number: T0239-016-001

Report Date: 10/31/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 10/29/17 19:34  
 Analyst: SZ

Extraction Method: EPA 3546  
 Extraction Date: 10/28/17 13:49

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-06 Batch: WG1057377-1 |        |           |       |     |     |
| Acenaphthene   | ND     |           | ug/kg | 130 | 17. |
| Fluoranthene   | ND     |           | ug/kg | 97  | 19. |
| Naphthalene  | ND     |           | ug/kg | 160 | 20. |
| Benzo(a)anthracene   | ND     |           | ug/kg | 97  | 18. |
| Benzo(a)pyrene   | ND     |           | ug/kg | 130 | 40. |
| Benzo(b)fluoranthene   | ND     |           | ug/kg | 97  | 27. |
| Benzo(k)fluoranthene   | ND     |           | ug/kg | 97  | 26. |
| Chrysene   | ND     |           | ug/kg | 97  | 17. |
| Acenaphthylene   | ND     |           | ug/kg | 130 | 25. |
| Anthracene   | ND     |           | ug/kg | 97  | 32. |
| Benzo(ghi)perylene   | ND     |           | ug/kg | 130 | 19. |
| Fluorene   | ND     |           | ug/kg | 160 | 16. |
| Phenanthrene   | ND     |           | ug/kg | 97  | 20. |
| Dibenzo(a,h)anthracene   | ND     |           | ug/kg | 97  | 19. |
| Indeno(1,2,3-cd)pyrene   | ND     |           | ug/kg | 130 | 23. |
| Pyrene   | ND     |           | ug/kg | 97  | 16. |

#### Tentatively Identified Compounds

No Tentatively Identified Compounds      ND      ug/kg

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738668**Project Number:** T0239-016-001**Report Date:** 10/31/17**Method Blank Analysis**  
**Batch Quality Control**Analytical Method: 1,8270D  
Analytical Date: 10/29/17 19:34  
Analyst: SZExtraction Method: EPA 3546  
Extraction Date: 10/28/17 13:49

| Parameter  | Result | Qualifier | Units | RL | MDL |
|--|--------|-----------|-------|----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-06 Batch: WG1057377-1 |        |           |       |    |     |

| Surrogate            | %Recovery | Qualifier | Acceptance<br>Criteria |
|----------------------|-----------|-----------|------------------------|
| 2-Fluorophenol       | 72        |           | 25-120                 |
| Phenol-d6            | 76        |           | 10-120                 |
| Nitrobenzene-d5      | 77        |           | 23-120                 |
| 2-Fluorobiphenyl     | 75        |           | 30-120                 |
| 2,4,6-Tribromophenol | 86        |           | 10-136                 |
| 4-Terphenyl-d14      | 79        |           | 18-120                 |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1738668

**Project Number:** T0239-016-001

**Report Date:** 10/31/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-06 Batch: WG1057377-2 WG1057377-3 |                  |      |                   |      |                     |     |      |               |
| Acenaphthene  | 74               |      | 78                |      | 31-137              | 5   |      | 50            |
| Fluoranthene  | 86               |      | 91                |      | 40-140              | 6   |      | 50            |
| Naphthalene   | 83               |      | 83                |      | 40-140              | 0   |      | 50            |
| Benzo(a)anthracene  | 82               |      | 87                |      | 40-140              | 6   |      | 50            |
| Benzo(a)pyrene  | 92               |      | 96                |      | 40-140              | 4   |      | 50            |
| Benzo(b)fluoranthene  | 87               |      | 92                |      | 40-140              | 6   |      | 50            |
| Benzo(k)fluoranthene  | 88               |      | 90                |      | 40-140              | 2   |      | 50            |
| Chrysene  | 78               |      | 83                |      | 40-140              | 6   |      | 50            |
| Acenaphthylene  | 87               |      | 93                |      | 40-140              | 7   |      | 50            |
| Anthracene  | 82               |      | 87                |      | 40-140              | 6   |      | 50            |
| Benzo(ghi)perylene  | 84               |      | 88                |      | 40-140              | 5   |      | 50            |
| Fluorene  | 81               |      | 85                |      | 40-140              | 5   |      | 50            |
| Phenanthrene  | 78               |      | 83                |      | 40-140              | 6   |      | 50            |
| Dibenzo(a,h)anthracene  | 83               |      | 87                |      | 40-140              | 5   |      | 50            |
| Indeno(1,2,3-cd)pyrene  | 86               |      | 91                |      | 40-140              | 6   |      | 50            |
| Pyrene  | 83               |      | 87                |      | 35-142              | 5   |      | 50            |



# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1738668

**Project Number:** T0239-016-001

**Report Date:** 10/31/17

| <b>Parameter</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|

Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-06 Batch: WG1057377-2 WG1057377-3

| <b>Surrogate</b>     | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> |
|----------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|
| 2-Fluorophenol       | 75                       |             | 76                        |             | 25-120                         |
| Phenol-d6            | 76                       |             | 80                        |             | 10-120                         |
| Nitrobenzene-d5      | 80                       |             | 83                        |             | 23-120                         |
| 2-Fluorobiphenyl     | 72                       |             | 75                        |             | 30-120                         |
| 2,4,6-Tribromophenol | 86                       |             | 94                        |             | 10-136                         |
| 4-Terphenyl-d14      | 75                       |             | 79                        |             | 18-120                         |

# **INORGANICS & MISCELLANEOUS**

**Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1738668**Report Date:** 10/31/17**SAMPLE RESULTS****Lab ID:** L1738668-01**Client ID:** SW-1 (13-15')**Sample Location:** BUFFALO, NY**Matrix:** Soil**Date Collected:** 10/24/17 09:00**Date Received:** 10/24/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 86.2   |           | %     | 0.100 | NA  | 1                  | -                | 10/27/17 15:46   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1738668**Report Date:** 10/31/17**SAMPLE RESULTS****Lab ID:** L1738668-02**Client ID:** SW-2 (7-9')**Sample Location:** BUFFALO, NY**Matrix:** Soil**Date Collected:** 10/24/17 15:00**Date Received:** 10/24/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 87.9   |           | %     | 0.100 | NA  | 1                  | -                | 10/27/17 15:46   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1738668**Report Date:** 10/31/17**SAMPLE RESULTS****Lab ID:** L1738668-03**Client ID:** SW-3 (7-9')**Sample Location:** BUFFALO, NY**Matrix:** Soil**Date Collected:** 10/24/17 15:15**Date Received:** 10/24/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 86.8   |           | %     | 0.100 | NA  | 1                  | -                | 10/27/17 15:46   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1738668**Report Date:** 10/31/17**SAMPLE RESULTS****Lab ID:** L1738668-04**Client ID:** SW-4 (7-9')**Sample Location:** BUFFALO, NY**Matrix:** Soil**Date Collected:** 10/24/17 15:30**Date Received:** 10/24/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 85.7   |           | %     | 0.100 | NA  | 1                  | -                | 10/27/17 15:46   | 121,2540G            | RI      |



Project Name: MAIN &amp; E. BALCOM

Project Number: T0239-016-001

Lab Number: L1738668

Report Date: 10/31/17

## SAMPLE RESULTS

Lab ID: L1738668-05

Client ID: SW-5 (9-11')

Sample Location: BUFFALO, NY

Matrix: Soil

Date Collected: 10/24/17 15:45

Date Received: 10/24/17

Field Prep: Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 85.2   |           | %     | 0.100 | NA  | 1                  | -                | 10/27/17 15:46   | 121,2540G            | RI      |





**Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1738668**Report Date:** 10/31/17**SAMPLE RESULTS****Lab ID:** L1738668-06**Client ID:** SW-6 (7-9')**Sample Location:** BUFFALO, NY**Matrix:** Soil**Date Collected:** 10/24/17 16:00**Date Received:** 10/24/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 84.0   |           | %     | 0.100 | NA  | 1                  | -                | 10/27/17 15:46   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Duplicate Analysis**  
**Batch Quality Control**

**Lab Number:** L1738668  
**Report Date:** 10/31/17

| Parameter  | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|--|---------------|------------------|-------|-----|------|------------|
| General Chemistry - Westborough Lab Associated sample(s): 01-06 QC Batch ID: WG1057097-1 QC Sample: L1738668-01 Client ID: SW-1 (13-15') |               |                  |       |     |      |            |
| Solids, Total  | 86.2          | 86.1             | %     | 0   |      | 20         |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738668**Project Number:** T0239-016-001**Report Date:** 10/31/17**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information**

|               |                     |
|---------------|---------------------|
| <b>Cooler</b> | <b>Custody Seal</b> |
| A             | Absent              |

**Container Information**

| <b>Container ID</b> | <b>Container Type</b>       | <b>Cooler</b> | <b>Initial pH</b> | <b>Final pH</b> | <b>Temp deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen Date/Time</b> | <b>Analysis(*)</b>   |
|---------------------|-----------------------------|---------------|-------------------|-----------------|-------------------|-------------|-------------|-------------------------|----------------------|
| L1738668-01A        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738668-01B        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8270(14),TS(7) |
| L1738668-01X        | Vial MeOH preserved split   | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738668-01Y        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |
| L1738668-01Z        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |
| L1738668-02A        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738668-02B        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8270(14),TS(7) |
| L1738668-02X        | Vial MeOH preserved split   | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738668-02Y        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |
| L1738668-02Z        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |
| L1738668-03A        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738668-03B        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8270(14),TS(7) |
| L1738668-03X        | Vial MeOH preserved split   | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738668-03Y        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |
| L1738668-03Z        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |
| L1738668-04A        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738668-04B        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8270(14),TS(7) |
| L1738668-04X        | Vial MeOH preserved split   | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738668-04Y        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |
| L1738668-04Z        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |
| L1738668-05A        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738668-05B        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8270(14),TS(7) |
| L1738668-05X        | Vial MeOH preserved split   | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

Serial\_No:10311710:54  
**Lab Number:** L1738668  
**Report Date:** 10/31/17

**Container Information**

| <b>Container ID</b> | <b>Container Type</b>       | <b>Cooler</b> | <b>Initial pH</b> | <b>Final pH</b> | <b>Temp deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen Date/Time</b> | <b>Analysis(*)</b>   |
|---------------------|-----------------------------|---------------|-------------------|-----------------|-------------------|-------------|-------------|-------------------------|----------------------|
| L1738668-05Y        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |
| L1738668-05Z        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |
| L1738668-06A        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738668-06B        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8270(14),TS(7) |
| L1738668-06X        | Vial MeOH preserved split   | A             | NA                |                 | 4.9               | Y           | Absent      |                         | NYTCL-8260(14)       |
| L1738668-06Y        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |
| L1738668-06Z        | Vial Water preserved split  | A             | NA                |                 | 4.9               | Y           | Absent      | 26-OCT-17 09:47         | NYTCL-8260(14)       |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738668  
**Report Date:** 10/31/17

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738668  
**Report Date:** 10/31/17

#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738668**Project Number:** T0239-016-001**Report Date:** 10/31/17

## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.





**Alpha Analytical, Inc.**

ID No.:17873

Facility: **Company-wide**

Revision 10

Department: **Quality Assurance**

Published Date: 1/16/2017 11:00:05 AM

Title: **Certificate/Approval Program Summary**

Page 1 of 1

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**Certification Information**

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**The following analytes are not included in our Primary NELAP Scope of Accreditation:****Westborough Facility****EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** NPW and SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**EPA 9012B:** NPW: Total Cyanide**EPA 9050A:** NPW: Specific Conductance**SM3500:** NPW: Ferrous Iron**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.**SM5310C:** DW: Dissolved Organic Carbon**Mansfield Facility****SM 2540D:** TSS**EPA 3005A** NPW**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.**Biological Tissue Matrix:** EPA 3050B

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**The following analytes are included in our Massachusetts DEP Scope of Accreditation****Westborough Facility:****Drinking Water****EPA 300.0:** Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE, EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH, EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E.****Mansfield Facility:****Drinking Water****EPA 200.7:** Ba, Be, Cd, Cr, Cu, Ni, Na, Ca. **EPA 200.8:** Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Ni, Se, TL. **EPA 245.1 Hg.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**

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For a complete listing of analytes and methods, please contact your Alpha Project Manager.

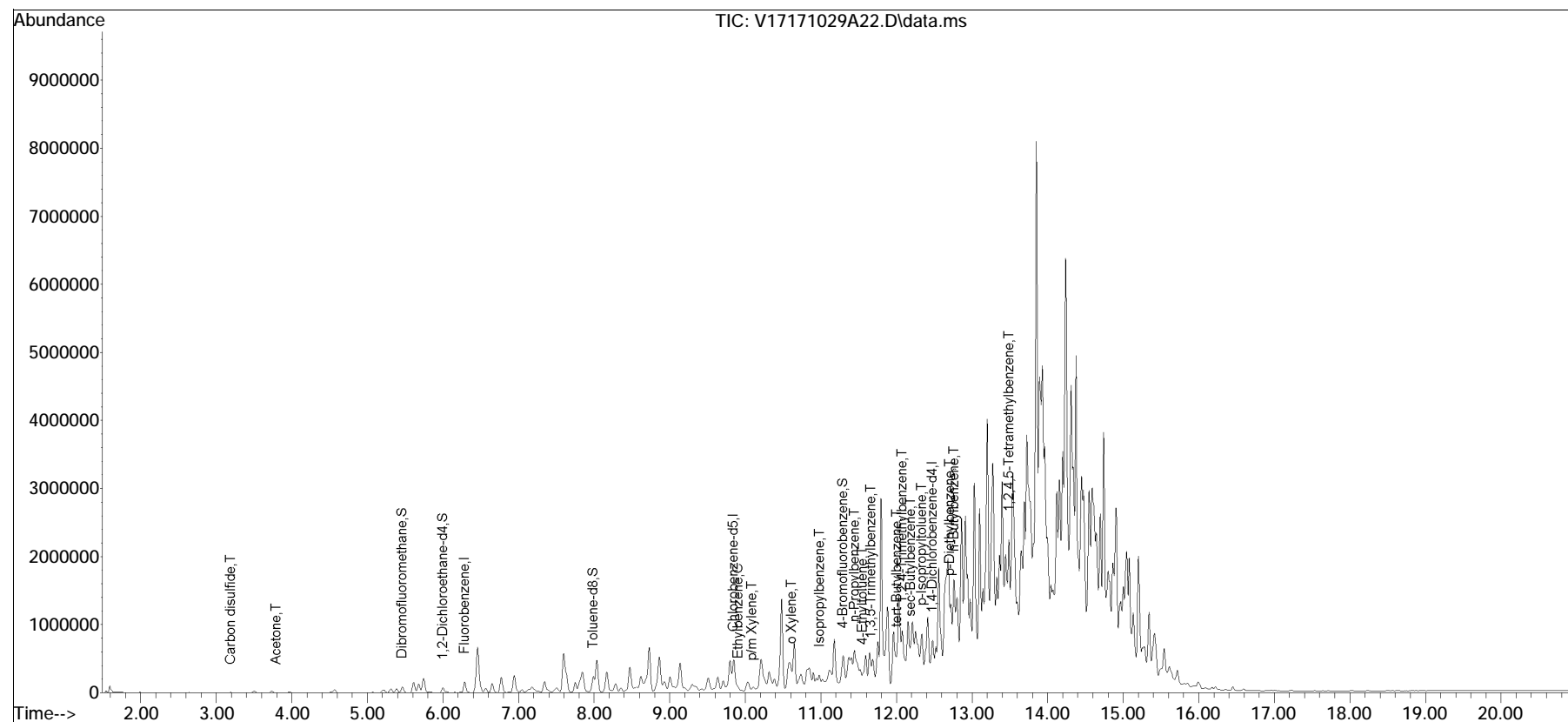


## Quantitation Report (QT Reviewed)

Data Path : I:\VOLATILES\VOA117\2017\171029A\  
Data File : V17171029A22.D  
Acq On : 29 Oct 2017 16:59  
Operator : VOA117:CBN  
Sample : 11738668-06,31,6.5,5,,y  
Misc : WG1057636,ICAL14088  
ALS Vial : 22 Sample Multiplier: 1

Quant Time: Oct 30 07:15:07 2017  
Quant Method : I:\VOLATILES\VOA117\2017\171029A\V117\_171012\_8260.m  
Quant Title : VOLATILES BY GC/MS  
QLast Update : Sun Oct 15 07:12:11 2017  
Response via : Initial Calibration

Sub List : 8260-NYTCL - Megamix plus Diox71029A\V17171029A01.D•





## ANALYTICAL REPORT

|                 |  |
|-----------------|--|
| Lab Number:     | L1724381   |
| Client:         | Benchmark & Turnkey Companies<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley  |
| Phone:          | (716) 225-3314   |
| Project Name:   | MAIN & E. BALCOM STREET  |
| Project Number: | 0239-016-001   |
| Report Date:    | 07/18/17   |

The original project report/data package is held by Alpha Analytical. This report/data package is paginated and should be reproduced only in its entirety. Alpha Analytical holds no responsibility for results and/or data that are not consistent with the original.

Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)



**Project Name:** MAIN & E. BALCOM STREET  
**Project Number:** 0239-016-001

**Lab Number:** L1724381  
**Report Date:** 07/18/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1724381-01                | UST BOTTOM-1     | SOIL          | BUFFALO, NY                | 07/17/17 13:30                  | 07/17/17            |

**Project Name:** MAIN & E. BALCOM STREET  
**Project Number:** 0239-016-001

**Lab Number:** L1724381  
**Report Date:** 07/18/17

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

**Project Name:** MAIN & E. BALCOM STREET  
**Project Number:** 0239-016-001

**Lab Number:** L1724381  
**Report Date:** 07/18/17

### Case Narrative (continued)

#### Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

#### Sample Receipt

The analyses performed were specified by the client.

#### Volatile Organics

Any reported concentrations that are below 200 ug/kg may be low due to the sample not being collected according to 5035-L/5035A-L low-level specifications.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:

 Amita Naik

Title: Technical Director/Representative

Date: 07/18/17



# ORGANICS

# **VOLATILES**

**Project Name:** MAIN & E. BALCOM STREET  
**Project Number:** 0239-016-001

**Lab Number:** L1724381  
**Report Date:** 07/18/17

**SAMPLE RESULTS**

**Lab ID:** L1724381-01  
**Client ID:** UST BOTTOM-1  
**Sample Location:** BUFFALO, NY

**Date Collected:** 07/17/17 13:30  
**Date Received:** 07/17/17  
**Field Prep:** Not Specified

**Matrix:** Soil  
**Analytical Method:** 1,8260C  
**Analytical Date:** 07/18/17 10:41  
**Analyst:** CBN  
**Percent Solids:** 86%

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Benzene                                      | ND     |           | ug/kg | 1.0 | 0.19 | 1               |
| Toluene                                      | ND     |           | ug/kg | 1.5 | 0.20 | 1               |
| Ethylbenzene                                 | 2.6    |           | ug/kg | 1.0 | 0.17 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 2.0 | 0.15 | 1               |
| p/m-Xylene                                   | 2.0    |           | ug/kg | 2.0 | 0.35 | 1               |
| o-Xylene                                     | 0.76   | J         | ug/kg | 2.0 | 0.34 | 1               |
| n-Butylbenzene                               | 2.1    |           | ug/kg | 1.0 | 0.23 | 1               |
| sec-Butylbenzene                             | 1.1    |           | ug/kg | 1.0 | 0.22 | 1               |
| tert-Butylbenzene                            | ND     |           | ug/kg | 5.0 | 0.25 | 1               |
| Isopropylbenzene                             | 0.91   | J         | ug/kg | 1.0 | 0.19 | 1               |
| p-Isopropyltoluene                           | 1.4    |           | ug/kg | 1.0 | 0.20 | 1               |
| n-Propylbenzene                              | 3.0    |           | ug/kg | 1.0 | 0.22 | 1               |
| 1,3,5-Trimethylbenzene                       | 0.87   | J         | ug/kg | 5.0 | 0.16 | 1               |
| 1,2,4-Trimethylbenzene                       | 12     |           | ug/kg | 5.0 | 0.19 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 109        |           | 70-130              |
| Toluene-d8            | 107        |           | 70-130              |
| 4-Bromofluorobenzene  | 111        |           | 70-130              |
| Dibromofluoromethane  | 102        |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM STREET

Lab Number: L1724381

Project Number: 0239-016-001

Report Date: 07/18/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 07/18/17 08:55  
 Analyst: CBN

| Parameter   | Result | Qualifier | Units | RL  | MDL  |
|---|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1023475-5 |        |           |       |     |      |
| Benzene   | ND     |           | ug/kg | 1.0 | 0.19 |
| Toluene   | ND     |           | ug/kg | 1.5 | 0.20 |
| Ethylbenzene  | ND     |           | ug/kg | 1.0 | 0.17 |
| Methyl tert butyl ether   | ND     |           | ug/kg | 2.0 | 0.15 |
| p/m-Xylene  | ND     |           | ug/kg | 2.0 | 0.35 |
| o-Xylene  | ND     |           | ug/kg | 2.0 | 0.34 |
| n-Butylbenzene  | ND     |           | ug/kg | 1.0 | 0.23 |
| sec-Butylbenzene  | ND     |           | ug/kg | 1.0 | 0.22 |
| tert-Butylbenzene   | ND     |           | ug/kg | 5.0 | 0.25 |
| Isopropylbenzene  | ND     |           | ug/kg | 1.0 | 0.19 |
| p-Isopropyltoluene  | ND     |           | ug/kg | 1.0 | 0.20 |
| n-Propylbenzene   | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,3,5-Trimethylbenzene  | ND     |           | ug/kg | 5.0 | 0.16 |
| 1,2,4-Trimethylbenzene  | ND     |           | ug/kg | 5.0 | 0.19 |

| Surrogate             | %Recovery | Qualifier | Acceptance Criteria |
|-----------------------|-----------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 112       |           | 70-130              |
| Toluene-d8            | 108       |           | 70-130              |
| 4-Bromofluorobenzene  | 106       |           | 70-130              |
| Dibromofluoromethane  | 101       |           | 70-130              |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM STREET

**Project Number:** 0239-016-001

**Lab Number:** L1724381

**Report Date:** 07/18/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1023475-3 WG1023475-4 |                  |      |                   |      |                     |     |      |               |
| Benzene  | 97               |      | 95                |      | 70-130              | 2   |      | 30            |
| Toluene  | 104              |      | 112               |      | 70-130              | 7   |      | 30            |
| Ethylbenzene   | 105              |      | 102               |      | 70-130              | 3   |      | 30            |
| Methyl tert butyl ether  | 91               |      | 93                |      | 66-130              | 2   |      | 30            |
| p/m-Xylene   | 104              |      | 101               |      | 70-130              | 3   |      | 30            |
| o-Xylene   | 100              |      | 99                |      | 70-130              | 1   |      | 30            |
| n-Butylbenzene   | 112              |      | 102               |      | 70-130              | 9   |      | 30            |
| sec-Butylbenzene   | 106              |      | 104               |      | 70-130              | 2   |      | 30            |
| tert-Butylbenzene  | 105              |      | 98                |      | 70-130              | 7   |      | 30            |
| Isopropylbenzene   | 108              |      | 98                |      | 70-130              | 10  |      | 30            |
| p-Isopropyltoluene   | 110              |      | 106               |      | 70-130              | 4   |      | 30            |
| n-Propylbenzene  | 110              |      | 98                |      | 70-130              | 12  |      | 30            |
| 1,3,5-Trimethylbenzene   | 108              |      | 98                |      | 70-130              | 10  |      | 30            |
| 1,2,4-Trimethylbenzene   | 107              |      | 98                |      | 70-130              | 9   |      | 30            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 105              |      | 110               |      | 70-130                 |
| Toluene-d8            | 111              |      | 121               |      | 70-130                 |
| 4-Bromofluorobenzene  | 106              |      | 98                |      | 70-130                 |
| Dibromofluoromethane  | 101              |      | 102               |      | 70-130                 |

# SEMIVOLATILES

**Project Name:** MAIN & E. BALCOM STREET  
**Project Number:** 0239-016-001

**Lab Number:** L1724381  
**Report Date:** 07/18/17

**SAMPLE RESULTS**

**Lab ID:** L1724381-01  
**Client ID:** UST BOTTOM-1  
**Sample Location:** BUFFALO, NY

**Date Collected:** 07/17/17 13:30  
**Date Received:** 07/17/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 07/18/17 02:07

**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 07/18/17 12:52  
**Analyst:** RC  
**Percent Solids:** 86%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 20. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 120 | 22. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 120 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 47. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 120 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 120 | 31. | 1               |
| Chrysene   | ND     |           | ug/kg | 120 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 30. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 120 | 37. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 19. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 120 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 120 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 27. | 1               |
| Pyrene   | ND     |           | ug/kg | 120 | 19. | 1               |

| Surrogate        | % Recovery | Qualifier | Acceptance Criteria |
|------------------|------------|-----------|---------------------|
| Nitrobenzene-d5  | 64         |           | 23-120              |
| 2-Fluorobiphenyl | 50         |           | 30-120              |
| 4-Terphenyl-d14  | 46         |           | 18-120              |



Project Name: MAIN &amp; E. BALCOM STREET

Lab Number: L1724381

Project Number: 0239-016-001

Report Date: 07/18/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 07/18/17 11:33  
 Analyst: RC

Extraction Method: EPA 3546  
 Extraction Date: 07/17/17 11:10

| Parameter   | Result | Qualifier | Units | RL  | MDL |
|---|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1023148-1 |        |           |       |     |     |
| Acenaphthene  | ND     |           | ug/kg | 130 | 17. |
| Fluoranthene  | ND     |           | ug/kg | 99  | 19. |
| Benzo(a)anthracene  | ND     |           | ug/kg | 99  | 18. |
| Benzo(a)pyrene  | ND     |           | ug/kg | 130 | 40. |
| Benzo(b)fluoranthene  | ND     |           | ug/kg | 99  | 28. |
| Benzo(k)fluoranthene  | ND     |           | ug/kg | 99  | 26. |
| Chrysene  | ND     |           | ug/kg | 99  | 17. |
| Acenaphthylene  | ND     |           | ug/kg | 130 | 25. |
| Anthracene  | ND     |           | ug/kg | 99  | 32. |
| Benzo(ghi)perylene  | ND     |           | ug/kg | 130 | 19. |
| Fluorene  | ND     |           | ug/kg | 160 | 16. |
| Phenanthrene  | ND     |           | ug/kg | 99  | 20. |
| Dibenzo(a,h)anthracene  | ND     |           | ug/kg | 99  | 19. |
| Indeno(1,2,3-cd)pyrene  | ND     |           | ug/kg | 130 | 23. |
| Pyrene  | ND     |           | ug/kg | 99  | 16. |

#### Tentatively Identified Compounds

No Tentatively Identified Compounds      ND      ug/kg

Project Name: MAIN &amp; E. BALCOM STREET

Lab Number: L1724381

Project Number: 0239-016-001

Report Date: 07/18/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 07/18/17 11:33  
 Analyst: RC

Extraction Method: EPA 3546  
 Extraction Date: 07/17/17 11:10

| Parameter   | Result | Qualifier | Units | RL | MDL |
|---|--------|-----------|-------|----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1023148-1 |        |           |       |    |     |

| Surrogate            | %Recovery | Qualifier | Acceptance<br>Criteria |
|----------------------|-----------|-----------|------------------------|
| 2-Fluorophenol       | 86        |           | 25-120                 |
| Phenol-d6            | 86        |           | 10-120                 |
| Nitrobenzene-d5      | 92        |           | 23-120                 |
| 2-Fluorobiphenyl     | 76        |           | 30-120                 |
| 2,4,6-Tribromophenol | 75        |           | 10-136                 |
| 4-Terphenyl-d14      | 78        |           | 18-120                 |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM STREET

**Project Number:** 0239-016-001

**Lab Number:** L1724381

**Report Date:** 07/18/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1023148-2 WG1023148-3 |                  |      |                   |      |                     |     |      |               |
| Acenaphthene   | 78               |      | 68                |      | 31-137              | 14  |      | 50            |
| Fluoranthene   | 77               |      | 66                |      | 40-140              | 15  |      | 50            |
| Benzo(a)anthracene   | 71               |      | 63                |      | 40-140              | 12  |      | 50            |
| Benzo(a)pyrene   | 72               |      | 62                |      | 40-140              | 15  |      | 50            |
| Benzo(b)fluoranthene   | 75               |      | 66                |      | 40-140              | 13  |      | 50            |
| Benzo(k)fluoranthene   | 69               |      | 59                |      | 40-140              | 16  |      | 50            |
| Chrysene   | 70               |      | 63                |      | 40-140              | 11  |      | 50            |
| Acenaphthylene   | 70               |      | 62                |      | 40-140              | 12  |      | 50            |
| Anthracene   | 76               |      | 66                |      | 40-140              | 14  |      | 50            |
| Benzo(ghi)perylene   | 68               |      | 62                |      | 40-140              | 9   |      | 50            |
| Fluorene   | 80               |      | 70                |      | 40-140              | 13  |      | 50            |
| Phenanthrene   | 74               |      | 64                |      | 40-140              | 14  |      | 50            |
| Dibenzo(a,h)anthracene   | 69               |      | 63                |      | 40-140              | 9   |      | 50            |
| Indeno(1,2,3-cd)pyrene   | 17               | Q    | 66                |      | 40-140              | 118 | Q    | 50            |
| Pyrene   | 75               |      | 65                |      | 35-142              | 14  |      | 50            |

| Surrogate            | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|----------------------|------------------|------|-------------------|------|------------------------|
| 2-Fluorophenol       | 81               |      | 71                |      | 25-120                 |
| Phenol-d6            | 82               |      | 70                |      | 10-120                 |
| Nitrobenzene-d5      | 86               |      | 77                |      | 23-120                 |
| 2-Fluorobiphenyl     | 73               |      | 61                |      | 30-120                 |
| 2,4,6-Tribromophenol | 74               |      | 62                |      | 10-136                 |
| 4-Terphenyl-d14      | 74               |      | 64                |      | 18-120                 |

# **INORGANICS & MISCELLANEOUS**

**Project Name:** MAIN & E. BALCOM STREET**Lab Number:** L1724381**Project Number:** 0239-016-001**Report Date:** 07/18/17**SAMPLE RESULTS****Lab ID:** L1724381-01**Date Collected:** 07/17/17 13:30**Client ID:** UST BOTTOM-1**Date Received:** 07/17/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified**Matrix:** Soil

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 85.8   |           | %     | 0.100 | NA  | 1                  | -                | 07/18/17 03:06   | 121,2540G            | SH      |



**Lab Duplicate Analysis**  
Batch Quality Control**Project Name:** MAIN & E. BALCOM STREET**Project Number:** 0239-016-001**Lab Number:** L1724381**Report Date:** 07/18/17

| Parameter  | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|--|---------------|------------------|-------|-----|------|------------|
| General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1023334-1 QC Sample: L1724214-01 Client ID: DUP Sample |               |                  |       |     |      |            |
| Solids, Total  | 70.5          | 70.2             | %     | 0   |      | 20         |

**Project Name:** MAIN & E. BALCOM STREET**Lab Number:** L1724381**Project Number:** 0239-016-001**Report Date:** 07/18/17**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information****Cooler**                      **Custody Seal**

A                                  Absent

**Container Information**

| <b>Container ID</b> | <b>Container Type</b>       | <b>Cooler</b> | <b>Initial<br/>pH</b> | <b>Final<br/>pH</b> | <b>Temp<br/>deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen<br/>Date/Time</b> | <b>Analysis(*)</b>   |
|---------------------|-----------------------------|---------------|-----------------------|---------------------|-----------------------|-------------|-------------|-----------------------------|----------------------|
| L1724381-01A        | Glass 120ml/4oz unpreserved | A             | NA                    |                     | 5.5                   | Y           | Absent      |                             | NYCP51-8260(14)      |
| L1724381-01B        | Glass 250ml/8oz unpreserved | A             | NA                    |                     | 5.5                   | Y           | Absent      |                             | NYCP51-PAH(14),TS(7) |
| L1724381-01X        | Vial MeOH preserved split   | A             | NA                    |                     | 5.5                   | Y           | Absent      |                             | NYCP51-8260(14)      |
| L1724381-01Y        | Vial Water preserved split  | A             | NA                    |                     | 5.5                   | Y           | Absent      | 18-JUL-17 03:28             | NYCP51-8260(14)      |
| L1724381-01Z        | Vial Water preserved split  | A             | NA                    |                     | 5.5                   | Y           | Absent      | 18-JUL-17 03:28             | NYCP51-8260(14)      |

**Project Name:** MAIN & E. BALCOM STREET  
**Project Number:** 0239-016-001

**Lab Number:** L1724381  
**Report Date:** 07/18/17

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers





**Project Name:** MAIN & E. BALCOM STREET  
**Project Number:** 0239-016-001

**Lab Number:** L1724381  
**Report Date:** 07/18/17

#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM STREET  
**Project Number:** 0239-016-001

**Lab Number:** L1724381  
**Report Date:** 07/18/17

## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



**Alpha Analytical, Inc.**

ID No.:17873

Facility: **Company-wide**

Revision 10

Department: **Quality Assurance**

Published Date: 1/16/2017 11:00:05 AM

Title: **Certificate/Approval Program Summary**

Page 1 of 1

**Certification Information**

The following analytes are not included in our Primary NELAP Scope of Accreditation:

**Westborough Facility****EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** NPW and SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**EPA 9012B:** NPW: Total Cyanide**EPA 9050A:** NPW: Specific Conductance**SM3500:** NPW: Ferrous Iron**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.**SM5310C:** DW: Dissolved Organic Carbon**Mansfield Facility****SM 2540D:** TSS**EPA 3005A** NPW**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene,

3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.

**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

**Westborough Facility:****Drinking Water****EPA 300.0:** Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE, EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH, EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E.****Mansfield Facility:****Drinking Water****EPA 200.7:** Ba, Be, Cd, Cr, Cu, Ni, Na, Ca. **EPA 200.8:** Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Ni, Se, TL. **EPA 245.1 Hg.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.

L1724381

**Total  
Bottle**



## ANALYTICAL REPORT

|                 |  |
|-----------------|--|
| Lab Number:     | L1724590   |
| Client:         | Benchmark & Turnkey Companies<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley  |
| Phone:          | (716) 225-3314   |
| Project Name:   | MAIN & E. BALCOM   |
| Project Number: | 0239-016-001   |
| Report Date:    | 07/25/17   |

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Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)



**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1724590-01                | TP-14            | SOIL          | Not Specified              | 07/18/17 09:40                  | 07/18/17            |
| L1724590-02                | NS-1             | SOIL          | Not Specified              | 07/18/17 10:00                  | 07/18/17            |
| L1724590-03                | TP-15            | SOIL          | Not Specified              | 07/18/17 10:40                  | 07/18/17            |
| L1724590-04                | TP-18            | SOIL          | Not Specified              | 07/18/17 11:30                  | 07/18/17            |
| L1724590-05                | TP-16            | SOIL          | Not Specified              | 07/18/17 11:50                  | 07/18/17            |
| L1724590-06                | NS-2             | SOIL          | Not Specified              | 07/18/17 12:30                  | 07/18/17            |
| L1724590-07                | TP-13            | SOIL          | Not Specified              | 07/18/17 13:15                  | 07/18/17            |
| L1724590-08                | BLINDDUP         | SOIL          | Not Specified              | 07/18/17 12:00                  | 07/18/17            |
| L1724590-09                | TP-12            | SOIL          | Not Specified              | 07/18/17 13:50                  | 07/18/17            |
| L1724590-10                | TP-11            | SOIL          | Not Specified              | 07/18/17 14:45                  | 07/18/17            |
| L1724590-11                | NS-3             | SOIL          | Not Specified              | 07/18/17 14:30                  | 07/18/17            |
| L1724590-12                | NS-4             | SOIL          | Not Specified              | 07/18/17 15:00                  | 07/18/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

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**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

### Case Narrative (continued)

#### Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

#### Volatile Organics

L1724590-11: Any reported concentrations that are below 200 ug/kg may be biased low due to the sample not being collected according to 5035-L/5035A-L low-level specifications.

#### Semivolatile Organics

L1724590-12: The sample has elevated detection limits due to the dilution required by the sample matrix. The WG1023759-4/-5 MS/MSD recoveries, performed on L1724590-01, are below the acceptance criteria for 2,4-dinitrophenol (0%/0%) due to the concentration of this compound falling below the reported detection limit.

#### Herbicides

The WG1023826-2 LCS recovery, associated with L1724590-01, -04, -08, and -11, is below the acceptance criteria for dinoseb (7%); however, the recovery is due to a noted method interference caused by the hydrolysis step of the extraction procedure. The results of the associated samples are reported.

The WG1023826-4/-5 MS/MSD recoveries, performed on L1724590-01, are below the acceptance criteria for dinoseb (6%/2%); however, the recoveries are due to a noted method interference caused by the hydrolysis step of the extraction procedure. The results of the associated samples are reported.

#### Total Metals

L1724590-01 through -12: The sample has elevated detection limits for all elements, with the exception of mercury, due to the dilution required by matrix interferences encountered during analysis.

The WG1023996-3/-4 MS/MSD recoveries for aluminum (610%/744%), calcium (158%/617%), iron (903%/1540%), magnesium (56%/242%) manganese (MSD 148%), performed on L1724590-01, do not apply because the sample concentrations are greater than four times the spike amounts added.

The WG1023996-3/-4 MS/MSD recoveries, performed on L1724590-01, are outside the acceptance criteria



**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

### Case Narrative (continued)

for antimony (MS 71%), cobalt (MS 72%), lead (MS 74%), nickel (MS 73%), potassium (MSD 126%) and thallium (58%/65%). A post digestion spike was performed and yielded unacceptable recoveries for cobalt (72%), lead (75%), nickel (72%), potassium (57%) and thallium (67%); all other compounds were within acceptance criteria. This has been attributed to sample matrix.

The WG1024082-3/-4 MS/MSD recoveries, performed on L1724590-01, are outside the acceptance criteria for mercury (126%/126%). A post digestion spike was performed and was within acceptance criteria.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:

 Melissa Cripps

Title: Technical Director/Representative

Date: 07/25/17

# ORGANICS

# VOLATILES

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-01

Date Collected: 07/18/17 09:40

Client ID: TP-14

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Analytical Method: 1,8260C

Analytical Date: 07/20/17 13:48

Analyst: BD

Percent Solids: 87%

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                               | ND     |           | ug/kg | 8.4  | 1.4  | 1               |
| 1,1-Dichloroethane                               | ND     |           | ug/kg | 1.3  | 0.23 | 1               |
| Chloroform                                       | ND     |           | ug/kg | 1.3  | 0.31 | 1               |
| Carbon tetrachloride                             | ND     |           | ug/kg | 0.84 | 0.29 | 1               |
| 1,2-Dichloropropane                              | ND     |           | ug/kg | 2.9  | 0.19 | 1               |
| Dibromochloromethane                             | ND     |           | ug/kg | 0.84 | 0.15 | 1               |
| 1,1,2-Trichloroethane                            | ND     |           | ug/kg | 1.3  | 0.26 | 1               |
| Tetrachloroethene                                | ND     |           | ug/kg | 0.84 | 0.25 | 1               |
| Chlorobenzene                                    | ND     |           | ug/kg | 0.84 | 0.29 | 1               |
| Trichlorofluoromethane                           | ND     |           | ug/kg | 4.2  | 0.35 | 1               |
| 1,2-Dichloroethane                               | ND     |           | ug/kg | 0.84 | 0.21 | 1               |
| 1,1,1-Trichloroethane                            | ND     |           | ug/kg | 0.84 | 0.29 | 1               |
| Bromodichloromethane                             | ND     |           | ug/kg | 0.84 | 0.26 | 1               |
| trans-1,3-Dichloropropene                        | ND     |           | ug/kg | 0.84 | 0.17 | 1               |
| cis-1,3-Dichloropropene                          | ND     |           | ug/kg | 0.84 | 0.19 | 1               |
| Bromoform  | ND     |           | ug/kg | 3.4  | 0.20 | 1               |
| 1,1,2,2-Tetrachloroethane                        | ND     |           | ug/kg | 0.84 | 0.25 | 1               |
| Benzene  | ND     |           | ug/kg | 0.84 | 0.16 | 1               |
| Toluene  | ND     |           | ug/kg | 1.3  | 0.16 | 1               |
| Ethylbenzene                                     | ND     |           | ug/kg | 0.84 | 0.14 | 1               |
| Chloromethane                                    | ND     |           | ug/kg | 4.2  | 0.37 | 1               |
| Bromomethane                                     | ND     |           | ug/kg | 1.7  | 0.28 | 1               |
| Vinyl chloride                                   | ND     |           | ug/kg | 1.7  | 0.26 | 1               |
| Chloroethane                                     | ND     |           | ug/kg | 1.7  | 0.26 | 1               |
| 1,1-Dichloroethene                               | ND     |           | ug/kg | 0.84 | 0.31 | 1               |
| trans-1,2-Dichloroethene                         | ND     |           | ug/kg | 1.3  | 0.20 | 1               |
| Trichloroethene                                  | ND     |           | ug/kg | 0.84 | 0.25 | 1               |
| 1,2-Dichlorobenzene                              | ND     |           | ug/kg | 4.2  | 0.15 | 1               |
| 1,3-Dichlorobenzene                              | ND     |           | ug/kg | 4.2  | 0.18 | 1               |
| 1,4-Dichlorobenzene                              | ND     |           | ug/kg | 4.2  | 0.15 | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-01

Date Collected: 07/18/17 09:40

Client ID: TP-14

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |      |      |                 |
| Methyl tert butyl ether                          | ND     |           | ug/kg | 1.7  | 0.13 | 1               |
| p/m-Xylene                                       | ND     |           | ug/kg | 1.7  | 0.30 | 1               |
| o-Xylene   | ND     |           | ug/kg | 1.7  | 0.28 | 1               |
| cis-1,2-Dichloroethene                           | ND     |           | ug/kg | 0.84 | 0.29 | 1               |
| Styrene  | ND     |           | ug/kg | 1.7  | 0.34 | 1               |
| Dichlorodifluoromethane                          | ND     |           | ug/kg | 8.4  | 0.42 | 1               |
| Acetone  | 5.5    | J         | ug/kg | 8.4  | 1.9  | 1               |
| Carbon disulfide                                 | ND     |           | ug/kg | 8.4  | 0.92 | 1               |
| 2-Butanone                                       | ND     |           | ug/kg | 8.4  | 0.58 | 1               |
| 4-Methyl-2-pentanone                             | ND     |           | ug/kg | 8.4  | 0.20 | 1               |
| 2-Hexanone                                       | ND     |           | ug/kg | 8.4  | 0.56 | 1               |
| Bromochloromethane                               | ND     |           | ug/kg | 4.2  | 0.30 | 1               |
| 1,2-Dibromoethane                                | ND     |           | ug/kg | 3.4  | 0.17 | 1               |
| n-Butylbenzene                                   | ND     |           | ug/kg | 0.84 | 0.19 | 1               |
| sec-Butylbenzene                                 | ND     |           | ug/kg | 0.84 | 0.18 | 1               |
| 1,2-Dibromo-3-chloropropane                      | ND     |           | ug/kg | 4.2  | 0.33 | 1               |
| Isopropylbenzene                                 | ND     |           | ug/kg | 0.84 | 0.16 | 1               |
| p-Isopropyltoluene                               | ND     |           | ug/kg | 0.84 | 0.17 | 1               |
| n-Propylbenzene                                  | ND     |           | ug/kg | 0.84 | 0.18 | 1               |
| 1,2,3-Trichlorobenzene                           | ND     |           | ug/kg | 4.2  | 0.21 | 1               |
| 1,2,4-Trichlorobenzene                           | ND     |           | ug/kg | 4.2  | 0.18 | 1               |
| 1,3,5-Trimethylbenzene                           | ND     |           | ug/kg | 4.2  | 0.14 | 1               |
| 1,2,4-Trimethylbenzene                           | ND     |           | ug/kg | 4.2  | 0.16 | 1               |
| Methyl Acetate                                   | ND     |           | ug/kg | 17   | 0.39 | 1               |
| Cyclohexane                                      | ND     |           | ug/kg | 17   | 0.36 | 1               |
| 1,4-Dioxane                                      | ND     |           | ug/kg | 34   | 12.  | 1               |
| Freon-113  | ND     |           | ug/kg | 17   | 0.43 | 1               |
| Methyl cyclohexane                               | ND     |           | ug/kg | 3.4  | 0.20 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 137        | Q         | 70-130              |
| Toluene-d8            | 106        |           | 70-130              |
| 4-Bromofluorobenzene  | 106        |           | 70-130              |
| Dibromofluoromethane  | 112        |           | 70-130              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-03

Date Collected: 07/18/17 10:40

Client ID: TP-15

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Analytical Method: 1,8260C

Analytical Date: 07/20/17 15:07

Analyst: BD

Percent Solids: 83%

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |     |      |                 |
| Methylene chloride                               | ND     |           | ug/kg | 13  | 2.2  | 1               |
| 1,1-Dichloroethane                               | ND     |           | ug/kg | 2.0 | 0.36 | 1               |
| Chloroform                                       | ND     |           | ug/kg | 2.0 | 0.49 | 1               |
| Carbon tetrachloride                             | ND     |           | ug/kg | 1.3 | 0.46 | 1               |
| 1,2-Dichloropropane                              | ND     |           | ug/kg | 4.7 | 0.30 | 1               |
| Dibromochloromethane                             | ND     |           | ug/kg | 1.3 | 0.24 | 1               |
| 1,1,2-Trichloroethane                            | ND     |           | ug/kg | 2.0 | 0.42 | 1               |
| Tetrachloroethene                                | ND     |           | ug/kg | 1.3 | 0.40 | 1               |
| Chlorobenzene                                    | ND     |           | ug/kg | 1.3 | 0.46 | 1               |
| Trichlorofluoromethane                           | ND     |           | ug/kg | 6.7 | 0.56 | 1               |
| 1,2-Dichloroethane                               | ND     |           | ug/kg | 1.3 | 0.33 | 1               |
| 1,1,1-Trichloroethane                            | ND     |           | ug/kg | 1.3 | 0.47 | 1               |
| Bromodichloromethane                             | ND     |           | ug/kg | 1.3 | 0.41 | 1               |
| trans-1,3-Dichloropropene                        | ND     |           | ug/kg | 1.3 | 0.28 | 1               |
| cis-1,3-Dichloropropene                          | ND     |           | ug/kg | 1.3 | 0.31 | 1               |
| Bromoform  | ND     |           | ug/kg | 5.3 | 0.32 | 1               |
| 1,1,2,2-Tetrachloroethane                        | ND     |           | ug/kg | 1.3 | 0.40 | 1               |
| Benzene  | ND     |           | ug/kg | 1.3 | 0.26 | 1               |
| Toluene  | ND     |           | ug/kg | 2.0 | 0.26 | 1               |
| Ethylbenzene                                     | ND     |           | ug/kg | 1.3 | 0.23 | 1               |
| Chloromethane                                    | ND     |           | ug/kg | 6.7 | 0.58 | 1               |
| Bromomethane                                     | ND     |           | ug/kg | 2.7 | 0.45 | 1               |
| Vinyl chloride                                   | ND     |           | ug/kg | 2.7 | 0.42 | 1               |
| Chloroethane                                     | ND     |           | ug/kg | 2.7 | 0.42 | 1               |
| 1,1-Dichloroethene                               | ND     |           | ug/kg | 1.3 | 0.50 | 1               |
| trans-1,2-Dichloroethene                         | ND     |           | ug/kg | 2.0 | 0.32 | 1               |
| Trichloroethene                                  | ND     |           | ug/kg | 1.3 | 0.40 | 1               |
| 1,2-Dichlorobenzene                              | ND     |           | ug/kg | 6.7 | 0.24 | 1               |
| 1,3-Dichlorobenzene                              | ND     |           | ug/kg | 6.7 | 0.29 | 1               |
| 1,4-Dichlorobenzene                              | ND     |           | ug/kg | 6.7 | 0.24 | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-03

Date Collected: 07/18/17 10:40

Client ID: TP-15

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |     |      |                 |
| Methyl tert butyl ether                          | ND     |           | ug/kg | 2.7 | 0.20 | 1               |
| p/m-Xylene                                       | ND     |           | ug/kg | 2.7 | 0.47 | 1               |
| o-Xylene   | ND     |           | ug/kg | 2.7 | 0.45 | 1               |
| cis-1,2-Dichloroethene                           | ND     |           | ug/kg | 1.3 | 0.46 | 1               |
| Styrene  | ND     |           | ug/kg | 2.7 | 0.54 | 1               |
| Dichlorodifluoromethane                          | ND     |           | ug/kg | 13  | 0.67 | 1               |
| Acetone  | 4.8    | J         | ug/kg | 13  | 3.0  | 1               |
| Carbon disulfide                                 | ND     |           | ug/kg | 13  | 1.5  | 1               |
| 2-Butanone                                       | ND     |           | ug/kg | 13  | 0.92 | 1               |
| 4-Methyl-2-pentanone                             | ND     |           | ug/kg | 13  | 0.32 | 1               |
| 2-Hexanone                                       | ND     |           | ug/kg | 13  | 0.89 | 1               |
| Bromochloromethane                               | ND     |           | ug/kg | 6.7 | 0.48 | 1               |
| 1,2-Dibromoethane                                | ND     |           | ug/kg | 5.3 | 0.26 | 1               |
| n-Butylbenzene                                   | ND     |           | ug/kg | 1.3 | 0.30 | 1               |
| sec-Butylbenzene                                 | ND     |           | ug/kg | 1.3 | 0.29 | 1               |
| 1,2-Dibromo-3-chloropropane                      | ND     |           | ug/kg | 6.7 | 0.53 | 1               |
| Isopropylbenzene                                 | ND     |           | ug/kg | 1.3 | 0.26 | 1               |
| p-Isopropyltoluene                               | ND     |           | ug/kg | 1.3 | 0.27 | 1               |
| n-Propylbenzene                                  | ND     |           | ug/kg | 1.3 | 0.29 | 1               |
| 1,2,3-Trichlorobenzene                           | ND     |           | ug/kg | 6.7 | 0.34 | 1               |
| 1,2,4-Trichlorobenzene                           | ND     |           | ug/kg | 6.7 | 0.29 | 1               |
| 1,3,5-Trimethylbenzene                           | ND     |           | ug/kg | 6.7 | 0.22 | 1               |
| 1,2,4-Trimethylbenzene                           | ND     |           | ug/kg | 6.7 | 0.25 | 1               |
| Methyl Acetate                                   | ND     |           | ug/kg | 27  | 0.62 | 1               |
| Cyclohexane                                      | ND     |           | ug/kg | 27  | 0.58 | 1               |
| 1,4-Dioxane                                      | ND     |           | ug/kg | 53  | 19.  | 1               |
| Freon-113  | ND     |           | ug/kg | 27  | 0.69 | 1               |
| Methyl cyclohexane                               | ND     |           | ug/kg | 5.3 | 0.32 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 114        |           | 70-130              |
| Toluene-d8            | 107        |           | 70-130              |
| 4-Bromofluorobenzene  | 105        |           | 70-130              |
| Dibromofluoromethane  | 105        |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-04

Date Collected: 07/18/17 11:30

Client ID: TP-18

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Analytical Method: 1,8260C

Analytical Date: 07/20/17 15:34

Analyst: BD

Percent Solids: 85%

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                               | ND     |           | ug/kg | 9.5  | 1.6  | 1               |
| 1,1-Dichloroethane                               | ND     |           | ug/kg | 1.4  | 0.26 | 1               |
| Chloroform                                       | ND     |           | ug/kg | 1.4  | 0.35 | 1               |
| Carbon tetrachloride                             | ND     |           | ug/kg | 0.95 | 0.33 | 1               |
| 1,2-Dichloropropane                              | ND     |           | ug/kg | 3.3  | 0.22 | 1               |
| Dibromochloromethane                             | ND     |           | ug/kg | 0.95 | 0.17 | 1               |
| 1,1,2-Trichloroethane                            | ND     |           | ug/kg | 1.4  | 0.30 | 1               |
| Tetrachloroethene                                | ND     |           | ug/kg | 0.95 | 0.29 | 1               |
| Chlorobenzene                                    | ND     |           | ug/kg | 0.95 | 0.33 | 1               |
| Trichlorofluoromethane                           | ND     |           | ug/kg | 4.8  | 0.40 | 1               |
| 1,2-Dichloroethane                               | ND     |           | ug/kg | 0.95 | 0.23 | 1               |
| 1,1,1-Trichloroethane                            | ND     |           | ug/kg | 0.95 | 0.33 | 1               |
| Bromodichloromethane                             | ND     |           | ug/kg | 0.95 | 0.29 | 1               |
| trans-1,3-Dichloropropene                        | ND     |           | ug/kg | 0.95 | 0.20 | 1               |
| cis-1,3-Dichloropropene                          | ND     |           | ug/kg | 0.95 | 0.22 | 1               |
| Bromoform  | ND     |           | ug/kg | 3.8  | 0.22 | 1               |
| 1,1,2,2-Tetrachloroethane                        | ND     |           | ug/kg | 0.95 | 0.28 | 1               |
| Benzene  | ND     |           | ug/kg | 0.95 | 0.18 | 1               |
| Toluene  | ND     |           | ug/kg | 1.4  | 0.18 | 1               |
| Ethylbenzene                                     | ND     |           | ug/kg | 0.95 | 0.16 | 1               |
| Chloromethane                                    | ND     |           | ug/kg | 4.8  | 0.42 | 1               |
| Bromomethane                                     | ND     |           | ug/kg | 1.9  | 0.32 | 1               |
| Vinyl chloride                                   | ND     |           | ug/kg | 1.9  | 0.30 | 1               |
| Chloroethane                                     | ND     |           | ug/kg | 1.9  | 0.30 | 1               |
| 1,1-Dichloroethene                               | ND     |           | ug/kg | 0.95 | 0.35 | 1               |
| trans-1,2-Dichloroethene                         | ND     |           | ug/kg | 1.4  | 0.23 | 1               |
| Trichloroethene                                  | ND     |           | ug/kg | 0.95 | 0.29 | 1               |
| 1,2-Dichlorobenzene                              | ND     |           | ug/kg | 4.8  | 0.17 | 1               |
| 1,3-Dichlorobenzene                              | ND     |           | ug/kg | 4.8  | 0.21 | 1               |
| 1,4-Dichlorobenzene                              | ND     |           | ug/kg | 4.8  | 0.17 | 1               |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-04

Date Collected: 07/18/17 11:30

Client ID: TP-18

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |      |      |                 |
| Methyl tert butyl ether                          | ND     |           | ug/kg | 1.9  | 0.14 | 1               |
| p/m-Xylene                                       | ND     |           | ug/kg | 1.9  | 0.33 | 1               |
| o-Xylene   | ND     |           | ug/kg | 1.9  | 0.32 | 1               |
| cis-1,2-Dichloroethene                           | ND     |           | ug/kg | 0.95 | 0.32 | 1               |
| Styrene  | ND     |           | ug/kg | 1.9  | 0.38 | 1               |
| Dichlorodifluoromethane                          | ND     |           | ug/kg | 9.5  | 0.48 | 1               |
| Acetone  | ND     |           | ug/kg | 9.5  | 2.2  | 1               |
| Carbon disulfide                                 | ND     |           | ug/kg | 9.5  | 1.0  | 1               |
| 2-Butanone                                       | ND     |           | ug/kg | 9.5  | 0.66 | 1               |
| 4-Methyl-2-pentanone                             | ND     |           | ug/kg | 9.5  | 0.23 | 1               |
| 2-Hexanone                                       | ND     |           | ug/kg | 9.5  | 0.63 | 1               |
| Bromochloromethane                               | ND     |           | ug/kg | 4.8  | 0.34 | 1               |
| 1,2-Dibromoethane                                | ND     |           | ug/kg | 3.8  | 0.19 | 1               |
| n-Butylbenzene                                   | ND     |           | ug/kg | 0.95 | 0.22 | 1               |
| sec-Butylbenzene                                 | ND     |           | ug/kg | 0.95 | 0.21 | 1               |
| 1,2-Dibromo-3-chloropropane                      | ND     |           | ug/kg | 4.8  | 0.38 | 1               |
| Isopropylbenzene                                 | ND     |           | ug/kg | 0.95 | 0.18 | 1               |
| p-Isopropyltoluene                               | ND     |           | ug/kg | 0.95 | 0.19 | 1               |
| n-Propylbenzene                                  | ND     |           | ug/kg | 0.95 | 0.20 | 1               |
| 1,2,3-Trichlorobenzene                           | ND     |           | ug/kg | 4.8  | 0.24 | 1               |
| 1,2,4-Trichlorobenzene                           | ND     |           | ug/kg | 4.8  | 0.20 | 1               |
| 1,3,5-Trimethylbenzene                           | ND     |           | ug/kg | 4.8  | 0.15 | 1               |
| 1,2,4-Trimethylbenzene                           | ND     |           | ug/kg | 4.8  | 0.18 | 1               |
| Methyl Acetate                                   | ND     |           | ug/kg | 19   | 0.44 | 1               |
| Cyclohexane                                      | ND     |           | ug/kg | 19   | 0.41 | 1               |
| 1,4-Dioxane                                      | ND     |           | ug/kg | 38   | 14.  | 1               |
| Freon-113  | ND     |           | ug/kg | 19   | 0.49 | 1               |
| Methyl cyclohexane                               | ND     |           | ug/kg | 3.8  | 0.23 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 113        |           | 70-130              |
| Toluene-d8            | 104        |           | 70-130              |
| 4-Bromofluorobenzene  | 107        |           | 70-130              |
| Dibromofluoromethane  | 103        |           | 70-130              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-07

Date Collected: 07/18/17 13:15

Client ID: TP-13

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Analytical Method: 1,8260C

Analytical Date: 07/20/17 16:00

Analyst: BD

Percent Solids: 86%

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |     |      |                 |
| Methylene chloride                               | ND     |           | ug/kg | 11  | 1.8  | 1               |
| 1,1-Dichloroethane                               | ND     |           | ug/kg | 1.6 | 0.29 | 1               |
| Chloroform                                       | ND     |           | ug/kg | 1.6 | 0.39 | 1               |
| Carbon tetrachloride                             | ND     |           | ug/kg | 1.1 | 0.36 | 1               |
| 1,2-Dichloropropane                              | ND     |           | ug/kg | 3.7 | 0.24 | 1               |
| Dibromochloromethane                             | ND     |           | ug/kg | 1.1 | 0.19 | 1               |
| 1,1,2-Trichloroethane                            | ND     |           | ug/kg | 1.6 | 0.33 | 1               |
| Tetrachloroethene                                | ND     |           | ug/kg | 1.1 | 0.32 | 1               |
| Chlorobenzene                                    | ND     |           | ug/kg | 1.1 | 0.37 | 1               |
| Trichlorofluoromethane                           | ND     |           | ug/kg | 5.3 | 0.44 | 1               |
| 1,2-Dichloroethane                               | ND     |           | ug/kg | 1.1 | 0.26 | 1               |
| 1,1,1-Trichloroethane                            | ND     |           | ug/kg | 1.1 | 0.37 | 1               |
| Bromodichloromethane                             | ND     |           | ug/kg | 1.1 | 0.33 | 1               |
| trans-1,3-Dichloropropene                        | ND     |           | ug/kg | 1.1 | 0.22 | 1               |
| cis-1,3-Dichloropropene                          | ND     |           | ug/kg | 1.1 | 0.24 | 1               |
| Bromoform  | ND     |           | ug/kg | 4.2 | 0.25 | 1               |
| 1,1,2,2-Tetrachloroethane                        | ND     |           | ug/kg | 1.1 | 0.32 | 1               |
| Benzene  | ND     |           | ug/kg | 1.1 | 0.20 | 1               |
| Toluene  | ND     |           | ug/kg | 1.6 | 0.21 | 1               |
| Ethylbenzene                                     | ND     |           | ug/kg | 1.1 | 0.18 | 1               |
| Chloromethane                                    | ND     |           | ug/kg | 5.3 | 0.46 | 1               |
| Bromomethane                                     | ND     |           | ug/kg | 2.1 | 0.36 | 1               |
| Vinyl chloride                                   | ND     |           | ug/kg | 2.1 | 0.33 | 1               |
| Chloroethane                                     | ND     |           | ug/kg | 2.1 | 0.34 | 1               |
| 1,1-Dichloroethene                               | ND     |           | ug/kg | 1.1 | 0.39 | 1               |
| trans-1,2-Dichloroethene                         | ND     |           | ug/kg | 1.6 | 0.26 | 1               |
| Trichloroethene                                  | ND     |           | ug/kg | 1.1 | 0.32 | 1               |
| 1,2-Dichlorobenzene                              | ND     |           | ug/kg | 5.3 | 0.19 | 1               |
| 1,3-Dichlorobenzene                              | ND     |           | ug/kg | 5.3 | 0.23 | 1               |
| 1,4-Dichlorobenzene                              | ND     |           | ug/kg | 5.3 | 0.19 | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-07

Date Collected: 07/18/17 13:15

Client ID: TP-13

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |     |      |                 |
| Methyl tert butyl ether                          | ND     |           | ug/kg | 2.1 | 0.16 | 1               |
| p/m-Xylene                                       | ND     |           | ug/kg | 2.1 | 0.37 | 1               |
| o-Xylene   | ND     |           | ug/kg | 2.1 | 0.36 | 1               |
| cis-1,2-Dichloroethene                           | ND     |           | ug/kg | 1.1 | 0.36 | 1               |
| Styrene  | ND     |           | ug/kg | 2.1 | 0.42 | 1               |
| Dichlorodifluoromethane                          | ND     |           | ug/kg | 11  | 0.53 | 1               |
| Acetone  | 12     |           | ug/kg | 11  | 2.4  | 1               |
| Carbon disulfide                                 | 1.4    | J         | ug/kg | 11  | 1.2  | 1               |
| 2-Butanone                                       | ND     |           | ug/kg | 11  | 0.73 | 1               |
| 4-Methyl-2-pentanone                             | ND     |           | ug/kg | 11  | 0.26 | 1               |
| 2-Hexanone                                       | ND     |           | ug/kg | 11  | 0.71 | 1               |
| Bromochloromethane                               | ND     |           | ug/kg | 5.3 | 0.38 | 1               |
| 1,2-Dibromoethane                                | ND     |           | ug/kg | 4.2 | 0.21 | 1               |
| n-Butylbenzene                                   | ND     |           | ug/kg | 1.1 | 0.24 | 1               |
| sec-Butylbenzene                                 | ND     |           | ug/kg | 1.1 | 0.23 | 1               |
| 1,2-Dibromo-3-chloropropane                      | ND     |           | ug/kg | 5.3 | 0.42 | 1               |
| Isopropylbenzene                                 | ND     |           | ug/kg | 1.1 | 0.20 | 1               |
| p-Isopropyltoluene                               | ND     |           | ug/kg | 1.1 | 0.21 | 1               |
| n-Propylbenzene                                  | ND     |           | ug/kg | 1.1 | 0.23 | 1               |
| 1,2,3-Trichlorobenzene                           | ND     |           | ug/kg | 5.3 | 0.27 | 1               |
| 1,2,4-Trichlorobenzene                           | ND     |           | ug/kg | 5.3 | 0.23 | 1               |
| 1,3,5-Trimethylbenzene                           | ND     |           | ug/kg | 5.3 | 0.17 | 1               |
| 1,2,4-Trimethylbenzene                           | ND     |           | ug/kg | 5.3 | 0.20 | 1               |
| Methyl Acetate                                   | ND     |           | ug/kg | 21  | 0.49 | 1               |
| Cyclohexane                                      | ND     |           | ug/kg | 21  | 0.46 | 1               |
| 1,4-Dioxane                                      | ND     |           | ug/kg | 42  | 15.  | 1               |
| Freon-113  | ND     |           | ug/kg | 21  | 0.54 | 1               |
| Methyl cyclohexane                               | ND     |           | ug/kg | 4.2 | 0.25 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 111        |           | 70-130              |
| Toluene-d8            | 110        |           | 70-130              |
| 4-Bromofluorobenzene  | 108        |           | 70-130              |
| Dibromofluoromethane  | 102        |           | 70-130              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-08

Date Collected: 07/18/17 12:00

Client ID: BLINDDUP

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Analytical Method: 1,8260C

Analytical Date: 07/20/17 16:26

Analyst: BD

Percent Solids: 87%

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |     |      |                 |
| Methylene chloride                               | ND     |           | ug/kg | 11  | 1.8  | 1               |
| 1,1-Dichloroethane                               | ND     |           | ug/kg | 1.6 | 0.29 | 1               |
| Chloroform                                       | ND     |           | ug/kg | 1.6 | 0.39 | 1               |
| Carbon tetrachloride                             | ND     |           | ug/kg | 1.1 | 0.37 | 1               |
| 1,2-Dichloropropane                              | ND     |           | ug/kg | 3.7 | 0.24 | 1               |
| Dibromochloromethane                             | ND     |           | ug/kg | 1.1 | 0.19 | 1               |
| 1,1,2-Trichloroethane                            | ND     |           | ug/kg | 1.6 | 0.33 | 1               |
| Tetrachloroethene                                | ND     |           | ug/kg | 1.1 | 0.32 | 1               |
| Chlorobenzene                                    | ND     |           | ug/kg | 1.1 | 0.37 | 1               |
| Trichlorofluoromethane                           | ND     |           | ug/kg | 5.3 | 0.44 | 1               |
| 1,2-Dichloroethane                               | ND     |           | ug/kg | 1.1 | 0.26 | 1               |
| 1,1,1-Trichloroethane                            | ND     |           | ug/kg | 1.1 | 0.37 | 1               |
| Bromodichloromethane                             | ND     |           | ug/kg | 1.1 | 0.33 | 1               |
| trans-1,3-Dichloropropene                        | ND     |           | ug/kg | 1.1 | 0.22 | 1               |
| cis-1,3-Dichloropropene                          | ND     |           | ug/kg | 1.1 | 0.24 | 1               |
| Bromoform  | ND     |           | ug/kg | 4.2 | 0.25 | 1               |
| 1,1,2,2-Tetrachloroethane                        | ND     |           | ug/kg | 1.1 | 0.32 | 1               |
| Benzene  | ND     |           | ug/kg | 1.1 | 0.20 | 1               |
| Toluene  | ND     |           | ug/kg | 1.6 | 0.21 | 1               |
| Ethylbenzene                                     | ND     |           | ug/kg | 1.1 | 0.18 | 1               |
| Chloromethane                                    | ND     |           | ug/kg | 5.3 | 0.46 | 1               |
| Bromomethane                                     | ND     |           | ug/kg | 2.1 | 0.36 | 1               |
| Vinyl chloride                                   | ND     |           | ug/kg | 2.1 | 0.33 | 1               |
| Chloroethane                                     | ND     |           | ug/kg | 2.1 | 0.34 | 1               |
| 1,1-Dichloroethene                               | ND     |           | ug/kg | 1.1 | 0.40 | 1               |
| trans-1,2-Dichloroethene                         | ND     |           | ug/kg | 1.6 | 0.26 | 1               |
| Trichloroethene                                  | ND     |           | ug/kg | 1.1 | 0.32 | 1               |
| 1,2-Dichlorobenzene                              | ND     |           | ug/kg | 5.3 | 0.19 | 1               |
| 1,3-Dichlorobenzene                              | ND     |           | ug/kg | 5.3 | 0.23 | 1               |
| 1,4-Dichlorobenzene                              | ND     |           | ug/kg | 5.3 | 0.19 | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-08

Date Collected: 07/18/17 12:00

Client ID: BLINDDUP

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |     |      |                 |
| Methyl tert butyl ether                          | ND     |           | ug/kg | 2.1 | 0.16 | 1               |
| p/m-Xylene                                       | ND     |           | ug/kg | 2.1 | 0.37 | 1               |
| o-Xylene   | ND     |           | ug/kg | 2.1 | 0.36 | 1               |
| cis-1,2-Dichloroethene                           | ND     |           | ug/kg | 1.1 | 0.36 | 1               |
| Styrene  | ND     |           | ug/kg | 2.1 | 0.42 | 1               |
| Dichlorodifluoromethane                          | ND     |           | ug/kg | 11  | 0.53 | 1               |
| Acetone  | ND     |           | ug/kg | 11  | 2.4  | 1               |
| Carbon disulfide                                 | ND     |           | ug/kg | 11  | 1.2  | 1               |
| 2-Butanone                                       | ND     |           | ug/kg | 11  | 0.73 | 1               |
| 4-Methyl-2-pentanone                             | ND     |           | ug/kg | 11  | 0.26 | 1               |
| 2-Hexanone                                       | ND     |           | ug/kg | 11  | 0.71 | 1               |
| Bromochloromethane                               | ND     |           | ug/kg | 5.3 | 0.38 | 1               |
| 1,2-Dibromoethane                                | ND     |           | ug/kg | 4.2 | 0.21 | 1               |
| n-Butylbenzene                                   | ND     |           | ug/kg | 1.1 | 0.24 | 1               |
| sec-Butylbenzene                                 | ND     |           | ug/kg | 1.1 | 0.23 | 1               |
| 1,2-Dibromo-3-chloropropane                      | ND     |           | ug/kg | 5.3 | 0.42 | 1               |
| Isopropylbenzene                                 | ND     |           | ug/kg | 1.1 | 0.20 | 1               |
| p-Isopropyltoluene                               | ND     |           | ug/kg | 1.1 | 0.21 | 1               |
| n-Propylbenzene                                  | ND     |           | ug/kg | 1.1 | 0.23 | 1               |
| 1,2,3-Trichlorobenzene                           | ND     |           | ug/kg | 5.3 | 0.27 | 1               |
| 1,2,4-Trichlorobenzene                           | ND     |           | ug/kg | 5.3 | 0.23 | 1               |
| 1,3,5-Trimethylbenzene                           | ND     |           | ug/kg | 5.3 | 0.17 | 1               |
| 1,2,4-Trimethylbenzene                           | ND     |           | ug/kg | 5.3 | 0.20 | 1               |
| Methyl Acetate                                   | ND     |           | ug/kg | 21  | 0.49 | 1               |
| Cyclohexane                                      | ND     |           | ug/kg | 21  | 0.46 | 1               |
| 1,4-Dioxane                                      | ND     |           | ug/kg | 42  | 15.  | 1               |
| Freon-113  | ND     |           | ug/kg | 21  | 0.54 | 1               |
| Methyl cyclohexane                               | ND     |           | ug/kg | 4.2 | 0.25 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 115        |           | 70-130              |
| Toluene-d8            | 107        |           | 70-130              |
| 4-Bromofluorobenzene  | 103        |           | 70-130              |
| Dibromofluoromethane  | 107        |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-11

Date Collected: 07/18/17 14:30

Client ID: NS-3

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Analytical Method: 1,8260C

Analytical Date: 07/23/17 17:10

Analyst: MV

Percent Solids: 88%

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Methylene chloride                           | ND     |           | ug/kg | 11  | 1.8  | 1               |
| 1,1-Dichloroethane                           | ND     |           | ug/kg | 1.6 | 0.30 | 1               |
| Chloroform                                   | ND     |           | ug/kg | 1.6 | 0.41 | 1               |
| Carbon tetrachloride                         | ND     |           | ug/kg | 1.1 | 0.38 | 1               |
| 1,2-Dichloropropane                          | ND     |           | ug/kg | 3.8 | 0.25 | 1               |
| Dibromochloromethane                         | ND     |           | ug/kg | 1.1 | 0.19 | 1               |
| 1,1,2-Trichloroethane                        | ND     |           | ug/kg | 1.6 | 0.34 | 1               |
| Tetrachloroethene                            | ND     |           | ug/kg | 1.1 | 0.33 | 1               |
| Chlorobenzene                                | ND     |           | ug/kg | 1.1 | 0.38 | 1               |
| Trichlorofluoromethane                       | ND     |           | ug/kg | 5.5 | 0.46 | 1               |
| 1,2-Dichloroethane                           | ND     |           | ug/kg | 1.1 | 0.27 | 1               |
| 1,1,1-Trichloroethane                        | ND     |           | ug/kg | 1.1 | 0.38 | 1               |
| Bromodichloromethane                         | ND     |           | ug/kg | 1.1 | 0.34 | 1               |
| trans-1,3-Dichloropropene                    | ND     |           | ug/kg | 1.1 | 0.23 | 1               |
| cis-1,3-Dichloropropene                      | ND     |           | ug/kg | 1.1 | 0.25 | 1               |
| Bromoform                                    | ND     |           | ug/kg | 4.4 | 0.26 | 1               |
| 1,1,2,2-Tetrachloroethane                    | ND     |           | ug/kg | 1.1 | 0.33 | 1               |
| Benzene                                      | ND     |           | ug/kg | 1.1 | 0.21 | 1               |
| Toluene                                      | ND     |           | ug/kg | 1.6 | 0.21 | 1               |
| Ethylbenzene                                 | ND     |           | ug/kg | 1.1 | 0.19 | 1               |
| Chloromethane                                | ND     |           | ug/kg | 5.5 | 0.48 | 1               |
| Bromomethane                                 | ND     |           | ug/kg | 2.2 | 0.37 | 1               |
| Vinyl chloride                               | ND     |           | ug/kg | 2.2 | 0.34 | 1               |
| Chloroethane                                 | ND     |           | ug/kg | 2.2 | 0.35 | 1               |
| 1,1-Dichloroethene                           | ND     |           | ug/kg | 1.1 | 0.41 | 1               |
| trans-1,2-Dichloroethene                     | ND     |           | ug/kg | 1.6 | 0.26 | 1               |
| Trichloroethene                              | ND     |           | ug/kg | 1.1 | 0.33 | 1               |
| 1,2-Dichlorobenzene                          | ND     |           | ug/kg | 5.5 | 0.20 | 1               |
| 1,3-Dichlorobenzene                          | ND     |           | ug/kg | 5.5 | 0.24 | 1               |
| 1,4-Dichlorobenzene                          | ND     |           | ug/kg | 5.5 | 0.20 | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-11

Date Collected: 07/18/17 14:30

Client ID: NS-3

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 2.2 | 0.17 | 1               |
| p/m-Xylene                                   | ND     |           | ug/kg | 2.2 | 0.38 | 1               |
| o-Xylene                                     | ND     |           | ug/kg | 2.2 | 0.37 | 1               |
| cis-1,2-Dichloroethene                       | ND     |           | ug/kg | 1.1 | 0.38 | 1               |
| Styrene                                      | ND     |           | ug/kg | 2.2 | 0.44 | 1               |
| Dichlorodifluoromethane                      | ND     |           | ug/kg | 11  | 0.55 | 1               |
| Acetone                                      | ND     |           | ug/kg | 11  | 2.5  | 1               |
| Carbon disulfide                             | ND     |           | ug/kg | 11  | 1.2  | 1               |
| 2-Butanone                                   | ND     |           | ug/kg | 11  | 0.76 | 1               |
| 4-Methyl-2-pentanone                         | ND     |           | ug/kg | 11  | 0.27 | 1               |
| 2-Hexanone                                   | ND     |           | ug/kg | 11  | 0.73 | 1               |
| Bromochloromethane                           | ND     |           | ug/kg | 5.5 | 0.39 | 1               |
| 1,2-Dibromoethane                            | ND     |           | ug/kg | 4.4 | 0.22 | 1               |
| n-Butylbenzene                               | ND     |           | ug/kg | 1.1 | 0.25 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/kg | 1.1 | 0.24 | 1               |
| 1,2-Dibromo-3-chloropropane                  | ND     |           | ug/kg | 5.5 | 0.43 | 1               |
| Isopropylbenzene                             | ND     |           | ug/kg | 1.1 | 0.21 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/kg | 1.1 | 0.22 | 1               |
| n-Propylbenzene                              | ND     |           | ug/kg | 1.1 | 0.24 | 1               |
| 1,2,3-Trichlorobenzene                       | ND     |           | ug/kg | 5.5 | 0.28 | 1               |
| 1,2,4-Trichlorobenzene                       | ND     |           | ug/kg | 5.5 | 0.24 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/kg | 5.5 | 0.18 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/kg | 5.5 | 0.20 | 1               |
| Methyl Acetate                               | ND     |           | ug/kg | 22  | 0.51 | 1               |
| Cyclohexane                                  | ND     |           | ug/kg | 22  | 0.48 | 1               |
| 1,4-Dioxane                                  | ND     |           | ug/kg | 44  | 16.  | 1               |
| Freon-113                                    | ND     |           | ug/kg | 22  | 0.56 | 1               |
| Methyl cyclohexane                           | ND     |           | ug/kg | 4.4 | 0.26 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 116        |           | 70-130              |
| Toluene-d8            | 103        |           | 70-130              |
| 4-Bromofluorobenzene  | 90         |           | 70-130              |
| Dibromofluoromethane  | 100        |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 07/20/17 08:58  
 Analyst: CBN

| Parameter   | Result | Qualifier | Units | RL  | MDL  |
|---|--------|-----------|-------|-----|------|
| Volatile Organics by 8260/5035 - Westborough Lab for sample(s): 01,03-04,07-08 Batch: WG1024239-5 |        |           |       |     |      |
| Methylene chloride  | ND     |           | ug/kg | 10  | 1.6  |
| 1,1-Dichloroethane  | ND     |           | ug/kg | 1.5 | 0.27 |
| Chloroform  | ND     |           | ug/kg | 1.5 | 0.37 |
| Carbon tetrachloride  | ND     |           | ug/kg | 1.0 | 0.34 |
| 1,2-Dichloropropane   | ND     |           | ug/kg | 3.5 | 0.23 |
| Dibromochloromethane  | ND     |           | ug/kg | 1.0 | 0.18 |
| 1,1,2-Trichloroethane   | ND     |           | ug/kg | 1.5 | 0.31 |
| Tetrachloroethene   | ND     |           | ug/kg | 1.0 | 0.30 |
| Chlorobenzene   | ND     |           | ug/kg | 1.0 | 0.35 |
| Trichlorofluoromethane  | ND     |           | ug/kg | 5.0 | 0.42 |
| 1,2-Dichloroethane  | ND     |           | ug/kg | 1.0 | 0.25 |
| 1,1,1-Trichloroethane   | ND     |           | ug/kg | 1.0 | 0.35 |
| Bromodichloromethane  | ND     |           | ug/kg | 1.0 | 0.31 |
| trans-1,3-Dichloropropene   | ND     |           | ug/kg | 1.0 | 0.21 |
| cis-1,3-Dichloropropene   | ND     |           | ug/kg | 1.0 | 0.23 |
| Bromoform   | ND     |           | ug/kg | 4.0 | 0.24 |
| 1,1,2,2-Tetrachloroethane   | ND     |           | ug/kg | 1.0 | 0.30 |
| Benzene   | ND     |           | ug/kg | 1.0 | 0.19 |
| Toluene   | ND     |           | ug/kg | 1.5 | 0.20 |
| Ethylbenzene  | ND     |           | ug/kg | 1.0 | 0.17 |
| Chloromethane   | ND     |           | ug/kg | 5.0 | 0.44 |
| Bromomethane  | 0.55   | J         | ug/kg | 2.0 | 0.34 |
| Vinyl chloride  | ND     |           | ug/kg | 2.0 | 0.32 |
| Chloroethane  | ND     |           | ug/kg | 2.0 | 0.32 |
| 1,1-Dichloroethene  | ND     |           | ug/kg | 1.0 | 0.37 |
| trans-1,2-Dichloroethene  | ND     |           | ug/kg | 1.5 | 0.24 |
| Trichloroethene   | ND     |           | ug/kg | 1.0 | 0.30 |
| 1,2-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.18 |
| 1,3-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.22 |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 07/20/17 08:58  
 Analyst: CBN

| Parameter   | Result | Qualifier | Units | RL  | MDL  |
|---|--------|-----------|-------|-----|------|
| Volatile Organics by 8260/5035 - Westborough Lab for sample(s): 01,03-04,07-08 Batch: WG1024239-5 |        |           |       |     |      |
| 1,4-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.18 |
| Methyl tert butyl ether   | ND     |           | ug/kg | 2.0 | 0.15 |
| p/m-Xylene  | ND     |           | ug/kg | 2.0 | 0.35 |
| o-Xylene  | ND     |           | ug/kg | 2.0 | 0.34 |
| cis-1,2-Dichloroethene  | ND     |           | ug/kg | 1.0 | 0.34 |
| Styrene   | ND     |           | ug/kg | 2.0 | 0.40 |
| Dichlorodifluoromethane   | ND     |           | ug/kg | 10  | 0.50 |
| Acetone   | 3.1    | J         | ug/kg | 10  | 2.3  |
| Carbon disulfide  | 8.3    | J         | ug/kg | 10  | 1.1  |
| 2-Butanone  | ND     |           | ug/kg | 10  | 0.69 |
| 4-Methyl-2-pentanone  | ND     |           | ug/kg | 10  | 0.24 |
| 2-Hexanone  | ND     |           | ug/kg | 10  | 0.67 |
| Bromochloromethane  | ND     |           | ug/kg | 5.0 | 0.36 |
| 1,2-Dibromoethane   | ND     |           | ug/kg | 4.0 | 0.20 |
| n-Butylbenzene  | ND     |           | ug/kg | 1.0 | 0.23 |
| sec-Butylbenzene  | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,2-Dibromo-3-chloropropane   | ND     |           | ug/kg | 5.0 | 0.40 |
| Isopropylbenzene  | ND     |           | ug/kg | 1.0 | 0.19 |
| p-Isopropyltoluene  | ND     |           | ug/kg | 1.0 | 0.20 |
| n-Propylbenzene   | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,2,3-Trichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.25 |
| 1,2,4-Trichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.22 |
| 1,3,5-Trimethylbenzene  | ND     |           | ug/kg | 5.0 | 0.16 |
| 1,2,4-Trimethylbenzene  | ND     |           | ug/kg | 5.0 | 0.19 |
| Methyl Acetate  | ND     |           | ug/kg | 20  | 0.46 |
| Cyclohexane   | ND     |           | ug/kg | 20  | 0.43 |
| 1,4-Dioxane   | ND     |           | ug/kg | 40  | 14.  |
| Freon-113   | ND     |           | ug/kg | 20  | 0.51 |
| Methyl cyclohexane  | ND     |           | ug/kg | 4.0 | 0.24 |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**Method Blank Analysis**  
**Batch Quality Control**

Analytical Method: 1,8260C

Analytical Date: 07/20/17 08:58

Analyst: CBN

| Parameter   | Result | Qualifier | Units | RL | MDL |
|---|--------|-----------|-------|----|-----|
| Volatile Organics by 8260/5035 - Westborough Lab for sample(s): 01,03-04,07-08 Batch: WG1024239-5 |        |           |       |    |     |

| Surrogate             | %Recovery | Qualifier | Acceptance<br>Criteria |
|-----------------------|-----------|-----------|------------------------|
| 1,2-Dichloroethane-d4 | 116       |           | 70-130                 |
| Toluene-d8            | 103       |           | 70-130                 |
| 4-Bromofluorobenzene  | 101       |           | 70-130                 |
| Dibromofluoromethane  | 104       |           | 70-130                 |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 07/23/17 10:15  
 Analyst: CBN

| Parameter   | Result | Qualifier | Units | RL  | MDL  |
|---|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 11 Batch: WG1025127-5 |        |           |       |     |      |
| Methylene chloride  | ND     |           | ug/kg | 10  | 1.6  |
| 1,1-Dichloroethane  | ND     |           | ug/kg | 1.5 | 0.27 |
| Chloroform  | ND     |           | ug/kg | 1.5 | 0.37 |
| Carbon tetrachloride  | ND     |           | ug/kg | 1.0 | 0.34 |
| 1,2-Dichloropropane   | ND     |           | ug/kg | 3.5 | 0.23 |
| Dibromochloromethane  | ND     |           | ug/kg | 1.0 | 0.18 |
| 1,1,2-Trichloroethane   | ND     |           | ug/kg | 1.5 | 0.31 |
| Tetrachloroethene   | ND     |           | ug/kg | 1.0 | 0.30 |
| Chlorobenzene   | ND     |           | ug/kg | 1.0 | 0.35 |
| Trichlorofluoromethane  | ND     |           | ug/kg | 5.0 | 0.42 |
| 1,2-Dichloroethane  | ND     |           | ug/kg | 1.0 | 0.25 |
| 1,1,1-Trichloroethane   | ND     |           | ug/kg | 1.0 | 0.35 |
| Bromodichloromethane  | ND     |           | ug/kg | 1.0 | 0.31 |
| trans-1,3-Dichloropropene   | ND     |           | ug/kg | 1.0 | 0.21 |
| cis-1,3-Dichloropropene   | ND     |           | ug/kg | 1.0 | 0.23 |
| Bromoform   | ND     |           | ug/kg | 4.0 | 0.24 |
| 1,1,2,2-Tetrachloroethane   | ND     |           | ug/kg | 1.0 | 0.30 |
| Benzene   | ND     |           | ug/kg | 1.0 | 0.19 |
| Toluene   | ND     |           | ug/kg | 1.5 | 0.20 |
| Ethylbenzene  | ND     |           | ug/kg | 1.0 | 0.17 |
| Chloromethane   | ND     |           | ug/kg | 5.0 | 0.44 |
| Bromomethane  | ND     |           | ug/kg | 2.0 | 0.34 |
| Vinyl chloride  | ND     |           | ug/kg | 2.0 | 0.32 |
| Chloroethane  | ND     |           | ug/kg | 2.0 | 0.32 |
| 1,1-Dichloroethene  | ND     |           | ug/kg | 1.0 | 0.37 |
| trans-1,2-Dichloroethene  | ND     |           | ug/kg | 1.5 | 0.24 |
| Trichloroethene   | ND     |           | ug/kg | 1.0 | 0.30 |
| 1,2-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.18 |
| 1,3-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.22 |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 07/23/17 10:15  
 Analyst: CBN

| Parameter   | Result | Qualifier | Units | RL  | MDL  |
|---|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 11 Batch: WG1025127-5 |        |           |       |     |      |
| 1,4-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.18 |
| Methyl tert butyl ether   | ND     |           | ug/kg | 2.0 | 0.15 |
| p/m-Xylene  | ND     |           | ug/kg | 2.0 | 0.35 |
| o-Xylene  | ND     |           | ug/kg | 2.0 | 0.34 |
| cis-1,2-Dichloroethene  | ND     |           | ug/kg | 1.0 | 0.34 |
| Styrene   | ND     |           | ug/kg | 2.0 | 0.40 |
| Dichlorodifluoromethane   | ND     |           | ug/kg | 10  | 0.50 |
| Acetone   | ND     |           | ug/kg | 10  | 2.3  |
| Carbon disulfide  | ND     |           | ug/kg | 10  | 1.1  |
| 2-Butanone  | ND     |           | ug/kg | 10  | 0.69 |
| 4-Methyl-2-pentanone  | ND     |           | ug/kg | 10  | 0.24 |
| 2-Hexanone  | ND     |           | ug/kg | 10  | 0.67 |
| Bromochloromethane  | ND     |           | ug/kg | 5.0 | 0.36 |
| 1,2-Dibromoethane   | ND     |           | ug/kg | 4.0 | 0.20 |
| n-Butylbenzene  | ND     |           | ug/kg | 1.0 | 0.23 |
| sec-Butylbenzene  | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,2-Dibromo-3-chloropropane   | ND     |           | ug/kg | 5.0 | 0.40 |
| Isopropylbenzene  | ND     |           | ug/kg | 1.0 | 0.19 |
| p-Isopropyltoluene  | ND     |           | ug/kg | 1.0 | 0.20 |
| n-Propylbenzene   | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,2,3-Trichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.25 |
| 1,2,4-Trichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.22 |
| 1,3,5-Trimethylbenzene  | ND     |           | ug/kg | 5.0 | 0.16 |
| 1,2,4-Trimethylbenzene  | ND     |           | ug/kg | 5.0 | 0.19 |
| Methyl Acetate  | ND     |           | ug/kg | 20  | 0.46 |
| Cyclohexane   | ND     |           | ug/kg | 20  | 0.43 |
| 1,4-Dioxane   | ND     |           | ug/kg | 40  | 14.  |
| Freon-113   | ND     |           | ug/kg | 20  | 0.51 |
| Methyl cyclohexane  | ND     |           | ug/kg | 4.0 | 0.24 |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**Method Blank Analysis**  
**Batch Quality Control**

Analytical Method: 1,8260C

Analytical Date: 07/23/17 10:15

Analyst: CBN

| Parameter   | Result | Qualifier | Units | RL | MDL |
|---|--------|-----------|-------|----|-----|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 11 Batch: WG1025127-5 |        |           |       |    |     |

| Surrogate             | %Recovery | Qualifier | Acceptance<br>Criteria |
|-----------------------|-----------|-----------|------------------------|
| 1,2-Dichloroethane-d4 | 111       |           | 70-130                 |
| Toluene-d8            | 100       |           | 70-130                 |
| 4-Bromofluorobenzene  | 94        |           | 70-130                 |
| Dibromofluoromethane  | 99        |           | 70-130                 |

## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01,03-04,07-08 Batch: WG1024239-3 WG1024239-4 |                  |      |                   |      |                     |     |      |               |
| Methylene chloride   | 93               |      | 96                |      | 70-130              | 3   |      | 30            |
| 1,1-Dichloroethane   | 97               |      | 96                |      | 70-130              | 1   |      | 30            |
| Chloroform   | 92               |      | 97                |      | 70-130              | 5   |      | 30            |
| Carbon tetrachloride   | 103              |      | 104               |      | 70-130              | 1   |      | 30            |
| 1,2-Dichloropropane  | 96               |      | 97                |      | 70-130              | 1   |      | 30            |
| Dibromochloromethane   | 95               |      | 97                |      | 70-130              | 2   |      | 30            |
| 1,1,2-Trichloroethane  | 97               |      | 98                |      | 70-130              | 1   |      | 30            |
| Tetrachloroethene  | 101              |      | 101               |      | 70-130              | 0   |      | 30            |
| Chlorobenzene  | 98               |      | 100               |      | 70-130              | 2   |      | 30            |
| Trichlorofluoromethane   | 92               |      | 92                |      | 70-139              | 0   |      | 30            |
| 1,2-Dichloroethane   | 94               |      | 96                |      | 70-130              | 2   |      | 30            |
| 1,1,1-Trichloroethane  | 102              |      | 101               |      | 70-130              | 1   |      | 30            |
| Bromodichloromethane   | 96               |      | 99                |      | 70-130              | 3   |      | 30            |
| trans-1,3-Dichloropropene  | 98               |      | 102               |      | 70-130              | 4   |      | 30            |
| cis-1,3-Dichloropropene  | 92               |      | 90                |      | 70-130              | 2   |      | 30            |
| Bromoform  | 92               |      | 93                |      | 70-130              | 1   |      | 30            |
| 1,1,2,2-Tetrachloroethane  | 96               |      | 92                |      | 70-130              | 4   |      | 30            |
| Benzene  | 94               |      | 96                |      | 70-130              | 2   |      | 30            |
| Toluene  | 102              |      | 101               |      | 70-130              | 1   |      | 30            |
| Ethylbenzene   | 102              |      | 104               |      | 70-130              | 2   |      | 30            |
| Chloromethane  | 85               |      | 85                |      | 52-130              | 0   |      | 30            |
| Bromomethane   | 84               |      | 87                |      | 57-147              | 4   |      | 30            |
| Vinyl chloride   | 97               |      | 97                |      | 67-130              | 0   |      | 30            |

# Lab Control Sample Analysis

## Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01,03-04,07-08 Batch: WG1024239-3 WG1024239-4 |                  |      |                   |      |                     |     |      |               |
| Chloroethane   | 88               |      | 88                |      | 50-151              | 0   |      | 30            |
| 1,1-Dichloroethene   | 90               |      | 90                |      | 65-135              | 0   |      | 30            |
| trans-1,2-Dichloroethene   | 92               |      | 92                |      | 70-130              | 0   |      | 30            |
| Trichloroethene  | 99               |      | 99                |      | 70-130              | 0   |      | 30            |
| 1,2-Dichlorobenzene  | 99               |      | 97                |      | 70-130              | 2   |      | 30            |
| 1,3-Dichlorobenzene  | 99               |      | 99                |      | 70-130              | 0   |      | 30            |
| 1,4-Dichlorobenzene  | 97               |      | 99                |      | 70-130              | 2   |      | 30            |
| Methyl tert butyl ether  | 88               |      | 88                |      | 66-130              | 0   |      | 30            |
| p/m-Xylene   | 100              |      | 102               |      | 70-130              | 2   |      | 30            |
| o-Xylene   | 99               |      | 100               |      | 70-130              | 1   |      | 30            |
| cis-1,2-Dichloroethene   | 92               |      | 93                |      | 70-130              | 1   |      | 30            |
| Styrene  | 98               |      | 99                |      | 70-130              | 1   |      | 30            |
| Dichlorodifluoromethane  | 84               |      | 83                |      | 30-146              | 1   |      | 30            |
| Acetone  | 104              |      | 101               |      | 54-140              | 3   |      | 30            |
| Carbon disulfide   | 62               |      | 61                |      | 59-130              | 2   |      | 30            |
| 2-Butanone   | 75               |      | 82                |      | 70-130              | 9   |      | 30            |
| 4-Methyl-2-pentanone   | 96               |      | 94                |      | 70-130              | 2   |      | 30            |
| 2-Hexanone   | 92               |      | 89                |      | 70-130              | 3   |      | 30            |
| Bromochloromethane   | 85               |      | 90                |      | 70-130              | 6   |      | 30            |
| 1,2-Dibromoethane  | 95               |      | 96                |      | 70-130              | 1   |      | 30            |
| n-Butylbenzene   | 105              |      | 105               |      | 70-130              | 0   |      | 30            |
| sec-Butylbenzene   | 106              |      | 103               |      | 70-130              | 3   |      | 30            |
| 1,2-Dibromo-3-chloropropane  | 84               |      | 84                |      | 68-130              | 0   |      | 30            |

## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01,03-04,07-08 Batch: WG1024239-3 WG1024239-4 |                  |      |                   |      |                     |     |      |               |
| Isopropylbenzene   | 106              |      | 105               |      | 70-130              | 1   |      | 30            |
| p-Isopropyltoluene   | 103              |      | 104               |      | 70-130              | 1   |      | 30            |
| n-Propylbenzene  | 106              |      | 107               |      | 70-130              | 1   |      | 30            |
| 1,2,3-Trichlorobenzene   | 95               |      | 95                |      | 70-130              | 0   |      | 30            |
| 1,2,4-Trichlorobenzene   | 100              |      | 98                |      | 70-130              | 2   |      | 30            |
| 1,3,5-Trimethylbenzene   | 106              |      | 106               |      | 70-130              | 0   |      | 30            |
| 1,2,4-Trimethylbenzene   | 103              |      | 106               |      | 70-130              | 3   |      | 30            |
| Methyl Acetate   | 89               |      | 88                |      | 51-146              | 1   |      | 30            |
| Cyclohexane  | 101              |      | 104               |      | 59-142              | 3   |      | 30            |
| 1,4-Dioxane  | 103              |      | 94                |      | 65-136              | 9   |      | 30            |
| Freon-113  | 96               |      | 95                |      | 50-139              | 1   |      | 30            |
| Methyl cyclohexane   | 103              |      | 101               |      | 70-130              | 2   |      | 30            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 107              |      | 106               |      | 70-130                 |
| Toluene-d8            | 110              |      | 108               |      | 70-130                 |
| 4-Bromofluorobenzene  | 108              |      | 107               |      | 70-130                 |
| Dibromofluoromethane  | 103              |      | 100               |      | 70-130                 |



# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 11 Batch: WG1025127-3 WG1025127-4 |                  |      |                   |      |                     |     |      |               |
| Methylene chloride   | 102              |      | 99                |      | 70-130              | 3   |      | 30            |
| 1,1-Dichloroethane   | 109              |      | 102               |      | 70-130              | 7   |      | 30            |
| Chloroform   | 105              |      | 101               |      | 70-130              | 4   |      | 30            |
| Carbon tetrachloride   | 103              |      | 96                |      | 70-130              | 7   |      | 30            |
| 1,2-Dichloropropane  | 109              |      | 103               |      | 70-130              | 6   |      | 30            |
| Dibromochloromethane   | 100              |      | 98                |      | 70-130              | 2   |      | 30            |
| 1,1,2-Trichloroethane  | 112              |      | 109               |      | 70-130              | 3   |      | 30            |
| Tetrachloroethene  | 107              |      | 101               |      | 70-130              | 6   |      | 30            |
| Chlorobenzene  | 104              |      | 98                |      | 70-130              | 6   |      | 30            |
| Trichlorofluoromethane   | 165              | Q    | 153               | Q    | 70-139              | 8   |      | 30            |
| 1,2-Dichloroethane   | 111              |      | 106               |      | 70-130              | 5   |      | 30            |
| 1,1,1-Trichloroethane  | 107              |      | 100               |      | 70-130              | 7   |      | 30            |
| Bromodichloromethane   | 104              |      | 100               |      | 70-130              | 4   |      | 30            |
| trans-1,3-Dichloropropene  | 99               |      | 96                |      | 70-130              | 3   |      | 30            |
| cis-1,3-Dichloropropene  | 101              |      | 98                |      | 70-130              | 3   |      | 30            |
| Bromoform  | 84               |      | 86                |      | 70-130              | 2   |      | 30            |
| 1,1,2,2-Tetrachloroethane  | 112              |      | 110               |      | 70-130              | 2   |      | 30            |
| Benzene  | 107              |      | 102               |      | 70-130              | 5   |      | 30            |
| Toluene  | 107              |      | 102               |      | 70-130              | 5   |      | 30            |
| Ethylbenzene   | 110              |      | 105               |      | 70-130              | 5   |      | 30            |
| Chloromethane  | 86               |      | 84                |      | 52-130              | 2   |      | 30            |
| Bromomethane   | 130              |      | 117               |      | 57-147              | 11  |      | 30            |
| Vinyl chloride   | 126              |      | 119               |      | 67-130              | 6   |      | 30            |

# **Lab Control Sample Analysis** Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 11 Batch: WG1025127-3 WG1025127-4 |                  |      |                   |      |                     |     |      |               |
| Chloroethane   | 179              | Q    | 167               | Q    | 50-151              | 7   |      | 30            |
| 1,1-Dichloroethene   | 129              |      | 121               |      | 65-135              | 6   |      | 30            |
| trans-1,2-Dichloroethene   | 99               |      | 91                |      | 70-130              | 8   |      | 30            |
| Trichloroethene  | 110              |      | 99                |      | 70-130              | 11  |      | 30            |
| 1,2-Dichlorobenzene  | 101              |      | 98                |      | 70-130              | 3   |      | 30            |
| 1,3-Dichlorobenzene  | 101              |      | 98                |      | 70-130              | 3   |      | 30            |
| 1,4-Dichlorobenzene  | 98               |      | 96                |      | 70-130              | 2   |      | 30            |
| Methyl tert butyl ether  | 96               |      | 94                |      | 66-130              | 2   |      | 30            |
| p/m-Xylene   | 110              |      | 105               |      | 70-130              | 5   |      | 30            |
| o-Xylene   | 105              |      | 100               |      | 70-130              | 5   |      | 30            |
| cis-1,2-Dichloroethene   | 97               |      | 93                |      | 70-130              | 4   |      | 30            |
| Styrene  | 105              |      | 100               |      | 70-130              | 5   |      | 30            |
| Dichlorodifluoromethane  | 91               |      | 83                |      | 30-146              | 9   |      | 30            |
| Acetone  | 103              |      | 94                |      | 54-140              | 9   |      | 30            |
| Carbon disulfide   | 96               |      | 91                |      | 59-130              | 5   |      | 30            |
| 2-Butanone   | 99               |      | 91                |      | 70-130              | 8   |      | 30            |
| 4-Methyl-2-pentanone   | 96               |      | 94                |      | 70-130              | 2   |      | 30            |
| 2-Hexanone   | 95               |      | 91                |      | 70-130              | 4   |      | 30            |
| Bromochloromethane   | 98               |      | 94                |      | 70-130              | 4   |      | 30            |
| 1,2-Dibromoethane  | 103              |      | 99                |      | 70-130              | 4   |      | 30            |
| n-Butylbenzene   | 119              |      | 113               |      | 70-130              | 5   |      | 30            |
| sec-Butylbenzene   | 114              |      | 107               |      | 70-130              | 6   |      | 30            |
| 1,2-Dibromo-3-chloropropane  | 80               |      | 81                |      | 68-130              | 1   |      | 30            |

## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 11 Batch: WG1025127-3 WG1025127-4 |                  |      |                   |      |                     |     |      |               |
| Isopropylbenzene   | 103              |      | 99                |      | 70-130              | 4   |      | 30            |
| p-Isopropyltoluene   | 109              |      | 104               |      | 70-130              | 5   |      | 30            |
| n-Propylbenzene  | 108              |      | 102               |      | 70-130              | 6   |      | 30            |
| 1,2,3-Trichlorobenzene   | 94               |      | 92                |      | 70-130              | 2   |      | 30            |
| 1,2,4-Trichlorobenzene   | 94               |      | 89                |      | 70-130              | 5   |      | 30            |
| 1,3,5-Trimethylbenzene   | 106              |      | 102               |      | 70-130              | 4   |      | 30            |
| 1,2,4-Trimethylbenzene   | 104              |      | 100               |      | 70-130              | 4   |      | 30            |
| Methyl Acetate   | 109              |      | 103               |      | 51-146              | 6   |      | 30            |
| Cyclohexane  | 120              |      | 114               |      | 59-142              | 5   |      | 30            |
| 1,4-Dioxane  | 103              |      | 100               |      | 65-136              | 3   |      | 30            |
| Freon-113  | 141              | Q    | 131               |      | 50-139              | 7   |      | 30            |
| Methyl cyclohexane   | 115              |      | 108               |      | 70-130              | 6   |      | 30            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 108              |      | 110               |      | 70-130                 |
| Toluene-d8            | 103              |      | 102               |      | 70-130                 |
| 4-Bromofluorobenzene  | 92               |      | 92                |      | 70-130                 |
| Dibromofluoromethane  | 97               |      | 95                |      | 70-130                 |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01,03-04,07-08 QC Batch ID: WG1024239-6 WG1024239-7 QC Sample: L1724590-01 Client ID: TP-14 |               |          |          |              |      |           |               |      |                 |     |      |            |
| Methylene chloride   | ND            | 17.1     | 14       | 80           |      | 16        | 85            |      | 70-130          | 17  |      | 30         |
| 1,1-Dichloroethane   | ND            | 17.1     | 15       | 89           |      | 18        | 95            |      | 70-130          | 17  |      | 30         |
| Chloroform   | ND            | 17.1     | 15       | 87           |      | 18        | 92            |      | 70-130          | 17  |      | 30         |
| Carbon tetrachloride   | ND            | 17.1     | 18       | 106          |      | 21        | 112           |      | 70-130          | 16  |      | 30         |
| 1,2-Dichloropropane  | ND            | 17.1     | 14       | 80           |      | 16        | 86            |      | 70-130          | 17  |      | 30         |
| Dibromochloromethane   | ND            | 17.1     | 11       | 65           | Q    | 14        | 74            |      | 70-130          | 25  |      | 30         |
| 1,1,2-Trichloroethane  | ND            | 17.1     | 13       | 73           |      | 16        | 83            |      | 70-130          | 24  |      | 30         |
| Tetrachloroethene  | ND            | 17.1     | 15       | 88           |      | 17        | 90            |      | 70-130          | 14  |      | 30         |
| Chlorobenzene  | ND            | 17.1     | 12       | 68           | Q    | 14        | 74            |      | 70-130          | 19  |      | 30         |
| Trichlorofluoromethane   | ND            | 17.1     | 18       | 105          |      | 21        | 110           |      | 70-139          | 15  |      | 30         |
| 1,2-Dichloroethane   | ND            | 17.1     | 13       | 77           |      | 16        | 85            |      | 70-130          | 20  |      | 30         |
| 1,1,1-Trichloroethane  | ND            | 17.1     | 18       | 102          |      | 20        | 107           |      | 70-130          | 15  |      | 30         |
| Bromodichloromethane   | ND            | 17.1     | 12       | 70           |      | 17        | 86            |      | 70-130          | 32  | Q    | 30         |
| trans-1,3-Dichloropropene  | ND            | 17.1     | 10       | 60           | Q    | 13        | 69            | Q    | 70-130          | 26  |      | 30         |
| cis-1,3-Dichloropropene  | ND            | 17.1     | 11       | 63           | Q    | 14        | 71            |      | 70-130          | 22  |      | 30         |
| Bromoform  | ND            | 17.1     | 9.8      | 58           | Q    | 13        | 67            | Q    | 70-130          | 26  |      | 30         |
| 1,1,2,2-Tetrachloroethane  | ND            | 17.1     | 12       | 69           | Q    | 14        | 74            |      | 70-130          | 18  |      | 30         |
| Benzene  | ND            | 17.1     | 15       | 85           |      | 17        | 90            |      | 70-130          | 16  |      | 30         |
| Toluene  | ND            | 17.1     | 14       | 82           |      | 17        | 88            |      | 70-130          | 18  |      | 30         |
| Ethylbenzene   | ND            | 17.1     | 14       | 80           |      | 16        | 84            |      | 70-130          | 16  |      | 30         |
| Chloromethane  | ND            | 17.1     | 16       | 92           |      | 18        | 94            |      | 52-130          | 13  |      | 30         |
| Bromomethane   | ND            | 17.1     | 14       | 83           |      | 17        | 88            |      | 57-147          | 17  |      | 30         |
| Vinyl chloride   | ND            | 17.1     | 19       | 110          |      | 21        | 112           |      | 67-130          | 13  |      | 30         |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01,03-04,07-08 QC Batch ID: WG1024239-6 WG1024239-7 QC Sample: L1724590-01 Client ID: TP-14 |               |          |          |              |      |           |               |      |                 |     |      |            |
| Chloroethane   | ND            | 17.1     | 15       | 88           |      | 18        | 93            |      | 50-151          | 16  |      | 30         |
| 1,1-Dichloroethene   | ND            | 17.1     | 16       | 94           |      | 19        | 98            |      | 65-135          | 16  |      | 30         |
| trans-1,2-Dichloroethene   | ND            | 17.1     | 15       | 86           |      | 17        | 91            |      | 70-130          | 18  |      | 30         |
| Trichloroethene  | ND            | 17.1     | 14       | 84           |      | 16        | 86            |      | 70-130          | 13  |      | 30         |
| 1,2-Dichlorobenzene  | ND            | 17.1     | 9.1      | 53           | Q    | 12        | 60            | Q    | 70-130          | 24  |      | 30         |
| 1,3-Dichlorobenzene  | ND            | 17.1     | 9.0      | 53           | Q    | 12        | 61            | Q    | 70-130          | 25  |      | 30         |
| 1,4-Dichlorobenzene  | ND            | 17.1     | 8.7      | 51           | Q    | 11        | 58            | Q    | 70-130          | 25  |      | 30         |
| Methyl tert butyl ether  | ND            | 17.1     | 13       | 75           |      | 15        | 77            |      | 66-130          | 13  |      | 30         |
| p/m-Xylene   | ND            | 34.2     | 26       | 77           |      | 31        | 80            |      | 70-130          | 15  |      | 30         |
| o-Xylene   | ND            | 34.2     | 25       | 74           |      | 30        | 80            |      | 70-130          | 18  |      | 30         |
| cis-1,2-Dichloroethene   | ND            | 17.1     | 14       | 82           |      | 16        | 86            |      | 70-130          | 15  |      | 30         |
| Styrene  | ND            | 34.2     | 21       | 62           | Q    | 27        | 71            |      | 70-130          | 25  |      | 30         |
| Dichlorodifluoromethane  | ND            | 17.1     | 18       | 102          |      | 20        | 103           |      | 30-146          | 12  |      | 30         |
| Acetone  | 5.5J          | 17.1     | 18       | 105          |      | 21        | 111           |      | 54-140          | 17  |      | 30         |
| Carbon disulfide   | ND            | 17.1     | 11       | 62           |      | 13        | 66            |      | 59-130          | 16  |      | 30         |
| 2-Butanone   | ND            | 17.1     | 16       | 92           |      | 18        | 93            |      | 70-130          | 12  |      | 30         |
| 4-Methyl-2-pentanone   | ND            | 17.1     | 13       | 74           |      | 15        | 78            |      | 70-130          | 16  |      | 30         |
| 2-Hexanone   | ND            | 17.1     | 11       | 67           | Q    | 13        | 66            | Q    | 70-130          | 10  |      | 30         |
| Bromochloromethane   | ND            | 17.1     | 13       | 76           |      | 15        | 80            |      | 70-130          | 16  |      | 30         |
| 1,2-Dibromoethane  | ND            | 17.1     | 10       | 59           | Q    | 13        | 69            | Q    | 70-130          | 27  |      | 30         |
| n-Butylbenzene   | ND            | 17.1     | 13       | 78           |      | 14        | 76            |      | 70-130          | 7   |      | 30         |
| sec-Butylbenzene   | ND            | 17.1     | 15       | 88           |      | 17        | 88            |      | 70-130          | 10  |      | 30         |
| 1,2-Dibromo-3-chloropropane  | ND            | 17.1     | 8.7      | 51           | Q    | 12        | 62            | Q    | 68-130          | 31  | Q    | 30         |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01,03-04,07-08 QC Batch ID: WG1024239-6 WG1024239-7 QC Sample: L1724590-01 Client ID: TP-14 |               |          |          |              |      |           |               |      |                 |     |      |            |
| Isopropylbenzene   | ND            | 17.1     | 15       | 90           |      | 17        | 90            |      | 70-130          | 11  |      | 30         |
| p-Isopropyltoluene   | ND            | 17.1     | 15       | 86           |      | 16        | 83            |      | 70-130          | 8   |      | 30         |
| n-Propylbenzene  | ND            | 17.1     | 14       | 84           |      | 16        | 84            |      | 70-130          | 11  |      | 30         |
| 1,2,3-Trichlorobenzene   | ND            | 17.1     | 6.0      | 35           | Q    | 9.2       | 48            | Q    | 70-130          | 43  | Q    | 30         |
| 1,2,4-Trichlorobenzene   | ND            | 17.1     | 5.9      | 34           | Q    | 8.4       | 44            | Q    | 70-130          | 35  | Q    | 30         |
| 1,3,5-Trimethylbenzene   | ND            | 17.1     | 14       | 84           |      | 16        | 86            |      | 70-130          | 13  |      | 30         |
| 1,2,4-Trimethylbenzene   | ND            | 17.1     | 14       | 80           |      | 16        | 82            |      | 70-130          | 13  |      | 30         |
| Methyl Acetate   | ND            | 17.1     | 13J      | 77           |      | 15.J      | 81            |      | 51-146          | 15  |      | 30         |
| Cyclohexane  | ND            | 17.1     | 20       | 117          |      | 23        | 121           |      | 59-142          | 14  |      | 30         |
| 1,4-Dioxane  | ND            | 854      | 620      | 72           |      | 810       | 85            |      | 65-136          | 27  |      | 30         |
| Freon-113  | ND            | 17.1     | 19       | 110          |      | 21        | 111           |      | 50-139          | 12  |      | 30         |
| Methyl cyclohexane   | ND            | 17.1     | 18       | 106          |      | 21        | 112           |      | 70-130          | 16  |      | 30         |

| Surrogate             | MS % Recovery | MS Qualifier | MSD % Recovery | MSD Qualifier | Acceptance Criteria |
|-----------------------|---------------|--------------|----------------|---------------|---------------------|
| 1,2-Dichloroethane-d4 | 115           |              | 115            |               | 70-130              |
| 4-Bromofluorobenzene  | 113           |              | 113            |               | 70-130              |
| Dibromofluoromethane  | 109           |              | 107            |               | 70-130              |
| Toluene-d8            | 108           |              | 108            |               | 70-130              |

# SEMIVOLATILES

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-01

Client ID: TP-14

Sample Location: Not Specified

Date Collected: 07/18/17 09:40

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Extraction Date: 07/19/17 07:34

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/24/17 11:54

Analyst: PS

Percent Solids: 87%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 19. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 110 | 21. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 170 | 25. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 180 | 18. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 180 | 49. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 180 | 37. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 180 | 32. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 110 | 21. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 180 | 20. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 180 | 28. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 220 | 32. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 200 | 18. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 180 | 27. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 530 | 170 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 150 | 30. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 170 | 24. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 180 | 22. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 170 | 27. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 150 | 21. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 180 | 29. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 180 | 64. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 180 | 47. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 180 | 35. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 180 | 63. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 180 | 17. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 180 | 39. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 45. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 31. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 30. | 1               |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-01

Date Collected: 07/18/17 09:40

Client ID: TP-14

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | ND     |           | ug/kg | 110 | 19. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 29. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 36. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | ND     |           | ug/kg | 180 | 18. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 110 | 22. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 21. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 26. | 1               |
| Pyrene   | ND     |           | ug/kg | 110 | 18. | 1               |
| Biphenyl   | ND     |           | ug/kg | 420 | 43. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 180 | 34. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 180 | 36. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 180 | 35. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 180 | 77. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 180 | 18. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 220 | 22. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 180 | 19. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 180 | 23. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 110 | 35. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 180 | 28. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 180 | 22. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 170 | 30. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 180 | 61. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 400 | 70. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 260 | 76. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 890 | 86. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 480 | 89. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 150 | 41. | 1               |
| Phenol   | ND     |           | ug/kg | 180 | 28. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 180 | 29. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 270 | 29. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 180 | 35. | 1               |
| Carbazole  | ND     |           | ug/kg | 180 | 18. | 1               |
| Atrazine   | ND     |           | ug/kg | 150 | 65. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 240 | 50. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 180 | 56. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 180 | 37. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-01

Date Collected: 07/18/17 09:40

Client ID: TP-14

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

## Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 76         |           | 25-120              |
| Phenol-d6            | 87         |           | 10-120              |
| Nitrobenzene-d5      | 80         |           | 23-120              |
| 2-Fluorobiphenyl     | 78         |           | 30-120              |
| 2,4,6-Tribromophenol | 75         |           | 10-136              |
| 4-Terphenyl-d14      | 74         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-02

Client ID: NS-1

Sample Location: Not Specified

Date Collected: 07/18/17 10:00

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method:EPA 3546

Extraction Date: 07/19/17 07:34

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/24/17 14:44

Analyst: PS

Percent Solids: 87%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | 45     | J         | ug/kg | 150 | 20. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 110 | 21. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 170 | 26. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 190 | 19. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 190 | 50. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 38. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 32. | 1               |
| Fluoranthene                                     | 880    |           | ug/kg | 110 | 22. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 190 | 20. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 190 | 29. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 230 | 32. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 200 | 19. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 190 | 28. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 540 | 170 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 150 | 31. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 170 | 25. | 1               |
| Naphthalene                                      | 23     | J         | ug/kg | 190 | 23. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 170 | 28. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 150 | 22. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 190 | 29. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 190 | 66. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 190 | 48. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 190 | 36. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 190 | 64. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 190 | 18. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 190 | 40. | 1               |
| Benzo(a)anthracene                               | 430    |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | 410    |           | ug/kg | 150 | 46. | 1               |
| Benzo(b)fluoranthene                             | 560    |           | ug/kg | 110 | 32. | 1               |
| Benzo(k)fluoranthene                             | 160    |           | ug/kg | 110 | 30. | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-02

Date Collected: 07/18/17 10:00

Client ID: NS-1

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | 390    |           | ug/kg | 110 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 29. | 1               |
| Anthracene                                       | 120    |           | ug/kg | 110 | 37. | 1               |
| Benzo(ghi)perylene                               | 280    |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | 42     | J         | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | 510    |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | 65     | J         | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | 300    |           | ug/kg | 150 | 26. | 1               |
| Pyrene   | 750    |           | ug/kg | 110 | 19. | 1               |
| Biphenyl   | ND     |           | ug/kg | 430 | 44. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 190 | 34. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 190 | 37. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 190 | 36. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 190 | 79. | 1               |
| Dibenzofuran                                     | 24     | J         | ug/kg | 190 | 18. | 1               |
| 2-Methylnaphthalene                              | 37     | J         | ug/kg | 230 | 23. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 190 | 20. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 190 | 24. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 110 | 36. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 190 | 28. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 190 | 22. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 170 | 30. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 190 | 63. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 410 | 71. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 260 | 77. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 910 | 88. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 490 | 91. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 150 | 42. | 1               |
| Phenol   | ND     |           | ug/kg | 190 | 29. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 190 | 29. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 270 | 30. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 190 | 36. | 1               |
| Carbazole  | 78     | J         | ug/kg | 190 | 18. | 1               |
| Atrazine   | ND     |           | ug/kg | 150 | 66. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 250 | 51. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 190 | 58. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 190 | 38. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-02

Date Collected: 07/18/17 10:00

Client ID: NS-1

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 82         |           | 25-120              |
| Phenol-d6            | 93         |           | 10-120              |
| Nitrobenzene-d5      | 85         |           | 23-120              |
| 2-Fluorobiphenyl     | 78         |           | 30-120              |
| 2,4,6-Tribromophenol | 96         |           | 10-136              |
| 4-Terphenyl-d14      | 70         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-03

Client ID: TP-15

Sample Location: Not Specified

Date Collected: 07/18/17 10:40

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method:EPA 3546

Extraction Date: 07/19/17 07:34

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/24/17 15:12

Analyst: PS

Percent Solids: 83%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 160 | 20. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 120 | 22. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 180 | 26. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 190 | 19. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 190 | 52. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 39. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 33. | 1               |
| Fluoranthene                                     | 150    |           | ug/kg | 120 | 22. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 190 | 21. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 190 | 30. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 230 | 33. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 210 | 20. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 190 | 28. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 560 | 180 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 160 | 32. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 180 | 25. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 24. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 180 | 29. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 160 | 22. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 190 | 30. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 190 | 67. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 190 | 49. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 190 | 37. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 190 | 66. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 190 | 18. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 190 | 41. | 1               |
| Benzo(a)anthracene                               | 84     | J         | ug/kg | 120 | 22. | 1               |
| Benzo(a)pyrene                                   | 82     | J         | ug/kg | 160 | 48. | 1               |
| Benzo(b)fluoranthene                             | 110    | J         | ug/kg | 120 | 33. | 1               |
| Benzo(k)fluoranthene                             | 31     | J         | ug/kg | 120 | 31. | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-03

Date Collected: 07/18/17 10:40

Client ID: TP-15

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | 79     | J         | ug/kg | 120 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 160 | 30. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 120 | 38. | 1               |
| Benzo(ghi)perylene                               | 55     | J         | ug/kg | 160 | 23. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 19. | 1               |
| Phenanthrene                                     | 64     | J         | ug/kg | 120 | 24. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 120 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | 64     | J         | ug/kg | 160 | 27. | 1               |
| Pyrene   | 120    |           | ug/kg | 120 | 19. | 1               |
| Biphenyl   | ND     |           | ug/kg | 440 | 45. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 190 | 35. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 190 | 38. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 190 | 37. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 190 | 81. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 190 | 18. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 230 | 24. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 190 | 20. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 190 | 24. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 120 | 37. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 190 | 29. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 190 | 23. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 180 | 31. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 190 | 64. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 420 | 73. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 270 | 79. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 930 | 91. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 510 | 93. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 160 | 43. | 1               |
| Phenol   | ND     |           | ug/kg | 190 | 29. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 190 | 30. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 280 | 30. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 190 | 37. | 1               |
| Carbazole  | ND     |           | ug/kg | 190 | 19. | 1               |
| Atrazine   | ND     |           | ug/kg | 160 | 68. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 260 | 52. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 190 | 59. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 190 | 39. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-03

Date Collected: 07/18/17 10:40

Client ID: TP-15

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 15         | Q         | 25-120              |
| Phenol-d6            | 27         |           | 10-120              |
| Nitrobenzene-d5      | 19         | Q         | 23-120              |
| 2-Fluorobiphenyl     | 30         |           | 30-120              |
| 2,4,6-Tribromophenol | 50         |           | 10-136              |
| 4-Terphenyl-d14      | 32         |           | 18-120              |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-04

Client ID: TP-18

Sample Location: Not Specified

Date Collected: 07/18/17 11:30

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method:EPA 3546

Extraction Date: 07/19/17 07:34

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/24/17 12:50

Analyst: PS

Percent Solids: 85%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 20. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 120 | 22. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 170 | 26. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 190 | 19. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 190 | 51. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 38. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 33. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 120 | 22. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 190 | 20. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 190 | 29. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 230 | 33. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 210 | 19. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 190 | 28. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 550 | 170 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 150 | 31. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 170 | 25. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 170 | 28. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 150 | 22. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 190 | 30. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 190 | 66. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 190 | 48. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 190 | 36. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 190 | 65. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 190 | 18. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 190 | 40. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 120 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 47. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 120 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 120 | 31. | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-04

Date Collected: 07/18/17 11:30

Client ID: TP-18

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | ND     |           | ug/kg | 120 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 30. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 120 | 38. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 23. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 19. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 120 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 120 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 27. | 1               |
| Pyrene   | ND     |           | ug/kg | 120 | 19. | 1               |
| Biphenyl   | ND     |           | ug/kg | 440 | 45. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 190 | 35. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 190 | 37. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 190 | 36. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 190 | 80. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 190 | 18. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 230 | 23. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 190 | 20. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 190 | 24. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 120 | 36. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 190 | 29. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 190 | 23. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 170 | 31. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 190 | 63. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 420 | 72. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 270 | 78. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 920 | 90. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 500 | 92. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 150 | 42. | 1               |
| Phenol   | ND     |           | ug/kg | 190 | 29. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 190 | 30. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 280 | 30. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 190 | 37. | 1               |
| Carbazole  | ND     |           | ug/kg | 190 | 19. | 1               |
| Atrazine   | ND     |           | ug/kg | 150 | 67. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 250 | 52. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 190 | 58. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 190 | 39. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-04

Date Collected: 07/18/17 11:30

Client ID: TP-18

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 65         |           | 25-120              |
| Phenol-d6            | 76         |           | 10-120              |
| Nitrobenzene-d5      | 69         |           | 23-120              |
| 2-Fluorobiphenyl     | 69         |           | 30-120              |
| 2,4,6-Tribromophenol | 71         |           | 10-136              |
| 4-Terphenyl-d14      | 76         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-05

Client ID: TP-16

Sample Location: Not Specified

Date Collected: 07/18/17 11:50

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Extraction Date: 07/19/17 07:34

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/25/17 14:24

Analyst: PS

Percent Solids: 89%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 19. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 110 | 21. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 170 | 25. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 180 | 18. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 180 | 49. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 180 | 37. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 180 | 32. | 1               |
| Fluoranthene                                     | 350    |           | ug/kg | 110 | 21. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 180 | 20. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 180 | 28. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 220 | 32. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 200 | 18. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 180 | 27. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 530 | 170 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 150 | 30. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 170 | 24. | 1               |
| Naphthalene                                      | 51     | J         | ug/kg | 180 | 22. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 170 | 27. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 150 | 21. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 180 | 28. | 1               |
| Bis(2-ethylhexyl)phthalate                       | 82     | J         | ug/kg | 180 | 64. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 180 | 46. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 180 | 35. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 180 | 63. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 180 | 17. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 180 | 39. | 1               |
| Benzo(a)anthracene                               | 180    |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | 190    |           | ug/kg | 150 | 45. | 1               |
| Benzo(b)fluoranthene                             | 250    |           | ug/kg | 110 | 31. | 1               |
| Benzo(k)fluoranthene                             | 77     | J         | ug/kg | 110 | 30. | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-05

Date Collected: 07/18/17 11:50

Client ID: TP-16

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | 190    |           | ug/kg | 110 | 19. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 28. | 1               |
| Anthracene                                       | 44     | J         | ug/kg | 110 | 36. | 1               |
| Benzo(ghi)perylene                               | 160    |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | 19     | J         | ug/kg | 180 | 18. | 1               |
| Phenanthrene                                     | 230    |           | ug/kg | 110 | 22. | 1               |
| Dibenzo(a,h)anthracene                           | 42     | J         | ug/kg | 110 | 21. | 1               |
| Indeno(1,2,3-cd)pyrene                           | 140    | J         | ug/kg | 150 | 26. | 1               |
| Pyrene   | 290    |           | ug/kg | 110 | 18. | 1               |
| Biphenyl   | ND     |           | ug/kg | 420 | 43. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 180 | 34. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 180 | 36. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 180 | 35. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 180 | 76. | 1               |
| Dibenzofuran                                     | 29     | J         | ug/kg | 180 | 17. | 1               |
| 2-Methylnaphthalene                              | 91     | J         | ug/kg | 220 | 22. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 180 | 19. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 180 | 23. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 110 | 35. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 180 | 28. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 180 | 22. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 170 | 30. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 180 | 61. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 400 | 70. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 260 | 75. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 890 | 86. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 480 | 89. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 150 | 41. | 1               |
| Phenol   | ND     |           | ug/kg | 180 | 28. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 180 | 29. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 270 | 29. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 180 | 35. | 1               |
| Carbazole  | 25     | J         | ug/kg | 180 | 18. | 1               |
| Atrazine   | ND     |           | ug/kg | 150 | 65. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 240 | 50. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 180 | 56. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 180 | 37. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-05

Date Collected: 07/18/17 11:50

Client ID: TP-16

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 72         |           | 25-120              |
| Phenol-d6            | 77         |           | 10-120              |
| Nitrobenzene-d5      | 87         |           | 23-120              |
| 2-Fluorobiphenyl     | 76         |           | 30-120              |
| 2,4,6-Tribromophenol | 69         |           | 10-136              |
| 4-Terphenyl-d14      | 63         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-06

Client ID: NS-2

Sample Location: Not Specified

Date Collected: 07/18/17 12:30

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Extraction Date: 07/19/17 07:34

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/24/17 15:48

Analyst: PS

Percent Solids: 73%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | 27     | J         | ug/kg | 180 | 23. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 130 | 25. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 200 | 30. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 220 | 22. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 220 | 59. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 220 | 45. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 220 | 38. | 1               |
| Fluoranthene                                     | 870    |           | ug/kg | 130 | 26. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 220 | 24. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 220 | 34. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 270 | 38. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 240 | 22. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 220 | 33. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 640 | 200 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 180 | 36. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 200 | 29. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 220 | 27. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 200 | 33. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 180 | 25. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 220 | 34. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 220 | 77. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 220 | 56. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 220 | 42. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 220 | 76. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 220 | 21. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 220 | 47. | 1               |
| Benzo(a)anthracene                               | 490    |           | ug/kg | 130 | 25. | 1               |
| Benzo(a)pyrene                                   | 390    |           | ug/kg | 180 | 54. | 1               |
| Benzo(b)fluoranthene                             | 590    |           | ug/kg | 130 | 38. | 1               |
| Benzo(k)fluoranthene                             | 180    |           | ug/kg | 130 | 36. | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-06

Date Collected: 07/18/17 12:30

Client ID: NS-2

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL   | MDL | Dilution Factor |
|--|--------|-----------|-------|------|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |      |     |                 |
| Chrysene   | 440    |           | ug/kg | 130  | 23. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 180  | 34. | 1               |
| Anthracene                                       | 100    | J         | ug/kg | 130  | 44. | 1               |
| Benzo(ghi)perylene                               | 220    |           | ug/kg | 180  | 26. | 1               |
| Fluorene   | 27     | J         | ug/kg | 220  | 22. | 1               |
| Phenanthrene                                     | 370    |           | ug/kg | 130  | 27. | 1               |
| Dibenzo(a,h)anthracene                           | 74     | J         | ug/kg | 130  | 26. | 1               |
| Indeno(1,2,3-cd)pyrene                           | 260    |           | ug/kg | 180  | 31. | 1               |
| Pyrene   | 700    |           | ug/kg | 130  | 22. | 1               |
| Biphenyl   | ND     |           | ug/kg | 510  | 52. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 220  | 41. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 220  | 43. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 220  | 42. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 220  | 92. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 220  | 21. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 270  | 27. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 220  | 23. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 220  | 28. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 130  | 42. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 220  | 33. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 220  | 26. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 200  | 36. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 220  | 74. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 480  | 84. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 310  | 91. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 1100 | 100 | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 580  | 110 | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 180  | 49. | 1               |
| Phenol   | ND     |           | ug/kg | 220  | 34. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 220  | 35. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 320  | 35. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 220  | 43. | 1               |
| Carbazole  | 54     | J         | ug/kg | 220  | 22. | 1               |
| Atrazine   | ND     |           | ug/kg | 180  | 78. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 300  | 60. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 220  | 68. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 220  | 45. | 1               |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-06

Date Collected: 07/18/17 12:30

Client ID: NS-2

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 88         |           | 25-120              |
| Phenol-d6            | 97         |           | 10-120              |
| Nitrobenzene-d5      | 89         |           | 23-120              |
| 2-Fluorobiphenyl     | 74         |           | 30-120              |
| 2,4,6-Tribromophenol | 88         |           | 10-136              |
| 4-Terphenyl-d14      | 52         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-07

Client ID: TP-13

Sample Location: Not Specified

Date Collected: 07/18/17 13:15

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Extraction Date: 07/19/17 07:34

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/24/17 16:16

Analyst: PS

Percent Solids: 86%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 160 | 20. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 120 | 22. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 170 | 26. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 190 | 19. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 190 | 52. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 39. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 33. | 1               |
| Fluoranthene                                     | 410    |           | ug/kg | 120 | 22. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 190 | 21. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 190 | 30. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 230 | 33. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 210 | 19. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 190 | 28. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 560 | 180 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 160 | 31. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 170 | 25. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 24. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 170 | 29. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 160 | 22. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 190 | 30. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 190 | 67. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 190 | 49. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 190 | 37. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 190 | 66. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 190 | 18. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 190 | 41. | 1               |
| Benzo(a)anthracene                               | 240    |           | ug/kg | 120 | 22. | 1               |
| Benzo(a)pyrene                                   | 220    |           | ug/kg | 160 | 47. | 1               |
| Benzo(b)fluoranthene                             | 320    |           | ug/kg | 120 | 33. | 1               |
| Benzo(k)fluoranthene                             | 100    | J         | ug/kg | 120 | 31. | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-07

Date Collected: 07/18/17 13:15

Client ID: TP-13

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | 240    |           | ug/kg | 120 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 160 | 30. | 1               |
| Anthracene                                       | 46     | J         | ug/kg | 120 | 38. | 1               |
| Benzo(ghi)perylene                               | 140    | J         | ug/kg | 160 | 23. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 19. | 1               |
| Phenanthrene                                     | 190    |           | ug/kg | 120 | 24. | 1               |
| Dibenzo(a,h)anthracene                           | 39     | J         | ug/kg | 120 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | 160    |           | ug/kg | 160 | 27. | 1               |
| Pyrene   | 340    |           | ug/kg | 120 | 19. | 1               |
| Biphenyl   | ND     |           | ug/kg | 440 | 45. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 190 | 35. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 190 | 37. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 190 | 37. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 190 | 80. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 190 | 18. | 1               |
| 2-Methylnaphthalene                              | 23     | J         | ug/kg | 230 | 23. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 190 | 20. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 190 | 24. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 120 | 37. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 190 | 29. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 190 | 23. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 170 | 31. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 190 | 64. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 420 | 73. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 270 | 79. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 930 | 90. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 500 | 93. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 160 | 43. | 1               |
| Phenol   | ND     |           | ug/kg | 190 | 29. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 190 | 30. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 280 | 30. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 190 | 37. | 1               |
| Carbazole  | 43     | J         | ug/kg | 190 | 19. | 1               |
| Atrazine   | ND     |           | ug/kg | 160 | 68. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 260 | 52. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 190 | 59. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 190 | 39. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-07

Date Collected: 07/18/17 13:15

Client ID: TP-13

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 99         |           | 25-120              |
| Phenol-d6            | 106        |           | 10-120              |
| Nitrobenzene-d5      | 100        |           | 23-120              |
| 2-Fluorobiphenyl     | 89         |           | 30-120              |
| 2,4,6-Tribromophenol | 98         |           | 10-136              |
| 4-Terphenyl-d14      | 80         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-08

Client ID: BLINDDUP

Sample Location: Not Specified

Date Collected: 07/18/17 12:00

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Extraction Date: 07/19/17 07:34

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/24/17 13:19

Analyst: PS

Percent Solids: 87%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 20. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 110 | 21. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 170 | 26. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 190 | 19. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 190 | 50. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 38. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 32. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 110 | 22. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 190 | 20. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 190 | 29. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 230 | 32. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 200 | 19. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 190 | 28. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 540 | 170 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 150 | 30. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 170 | 24. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 170 | 28. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 150 | 21. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 190 | 29. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 190 | 65. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 190 | 48. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 190 | 36. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 190 | 64. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 190 | 17. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 190 | 40. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 46. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 30. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS****Lab ID:** L1724590-08**Date Collected:** 07/18/17 12:00**Client ID:** BLINDDUP**Date Received:** 07/18/17**Sample Location:** Not Specified**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | ND     |           | ug/kg | 110 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 29. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 37. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 26. | 1               |
| Pyrene   | ND     |           | ug/kg | 110 | 19. | 1               |
| Biphenyl   | ND     |           | ug/kg | 430 | 44. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 190 | 34. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 190 | 36. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 190 | 36. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 190 | 78. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 190 | 18. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 230 | 23. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 190 | 20. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 190 | 23. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 110 | 36. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 190 | 28. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 190 | 22. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 170 | 30. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 190 | 62. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 410 | 71. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 260 | 77. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 900 | 88. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 490 | 90. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 150 | 41. | 1               |
| Phenol   | ND     |           | ug/kg | 190 | 28. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 190 | 29. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 270 | 30. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 190 | 36. | 1               |
| Carbazole  | ND     |           | ug/kg | 190 | 18. | 1               |
| Atrazine   | ND     |           | ug/kg | 150 | 66. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 250 | 51. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 190 | 57. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 190 | 38. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-08

Date Collected: 07/18/17 12:00

Client ID: BLINDDUP

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 84         |           | 25-120              |
| Phenol-d6            | 93         |           | 10-120              |
| Nitrobenzene-d5      | 84         |           | 23-120              |
| 2-Fluorobiphenyl     | 80         |           | 30-120              |
| 2,4,6-Tribromophenol | 81         |           | 10-136              |
| 4-Terphenyl-d14      | 77         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-09

Client ID: TP-12

Sample Location: Not Specified

Date Collected: 07/18/17 13:50

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Extraction Date: 07/19/17 07:34

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/24/17 16:44

Analyst: PS

Percent Solids: 74%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | 30     | J         | ug/kg | 180 | 23. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 130 | 25. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 200 | 30. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 220 | 22. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 220 | 60. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 220 | 45. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 220 | 38. | 1               |
| Fluoranthene                                     | 620    |           | ug/kg | 130 | 26. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 220 | 24. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 220 | 34. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 270 | 38. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 240 | 22. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 220 | 33. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 640 | 200 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 180 | 36. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 200 | 29. | 1               |
| Naphthalene                                      | 39     | J         | ug/kg | 220 | 27. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 200 | 33. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 180 | 26. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 220 | 35. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 220 | 78. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 220 | 56. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 220 | 42. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 220 | 76. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 220 | 21. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 220 | 47. | 1               |
| Benzo(a)anthracene                               | 280    |           | ug/kg | 130 | 25. | 1               |
| Benzo(a)pyrene                                   | 300    |           | ug/kg | 180 | 55. | 1               |
| Benzo(b)fluoranthene                             | 440    |           | ug/kg | 130 | 38. | 1               |
| Benzo(k)fluoranthene                             | 140    |           | ug/kg | 130 | 36. | 1               |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-09

Date Collected: 07/18/17 13:50

Client ID: TP-12

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL   | MDL | Dilution Factor |
|--|--------|-----------|-------|------|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |      |     |                 |
| Chrysene   | 300    |           | ug/kg | 130  | 23. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 180  | 35. | 1               |
| Anthracene                                       | 91     | J         | ug/kg | 130  | 44. | 1               |
| Benzo(ghi)perylene                               | 230    |           | ug/kg | 180  | 26. | 1               |
| Fluorene   | 41     | J         | ug/kg | 220  | 22. | 1               |
| Phenanthrene                                     | 380    |           | ug/kg | 130  | 27. | 1               |
| Dibenzo(a,h)anthracene                           | 56     | J         | ug/kg | 130  | 26. | 1               |
| Indeno(1,2,3-cd)pyrene                           | 240    |           | ug/kg | 180  | 31. | 1               |
| Pyrene   | 480    |           | ug/kg | 130  | 22. | 1               |
| Biphenyl   | ND     |           | ug/kg | 510  | 52. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 220  | 41. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 220  | 43. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 220  | 42. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 220  | 93. | 1               |
| Dibenzofuran                                     | 25     | J         | ug/kg | 220  | 21. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 270  | 27. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 220  | 23. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 220  | 28. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 130  | 42. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 220  | 33. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 220  | 26. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 200  | 36. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 220  | 74. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 480  | 84. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 310  | 91. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 1100 | 100 | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 580  | 110 | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 180  | 49. | 1               |
| Phenol   | ND     |           | ug/kg | 220  | 34. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 220  | 35. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 320  | 35. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 220  | 43. | 1               |
| Carbazole  | 57     | J         | ug/kg | 220  | 22. | 1               |
| Atrazine   | ND     |           | ug/kg | 180  | 78. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 300  | 60. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 220  | 68. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 220  | 45. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-09

Date Collected: 07/18/17 13:50

Client ID: TP-12

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 91         |           | 25-120              |
| Phenol-d6            | 98         |           | 10-120              |
| Nitrobenzene-d5      | 90         |           | 23-120              |
| 2-Fluorobiphenyl     | 79         |           | 30-120              |
| 2,4,6-Tribromophenol | 90         |           | 10-136              |
| 4-Terphenyl-d14      | 68         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-10

Client ID: TP-11

Sample Location: Not Specified

Date Collected: 07/18/17 14:45

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Extraction Date: 07/19/17 07:34

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/24/17 13:47

Analyst: PS

Percent Solids: 84%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 160 | 20. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 120 | 22. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 180 | 27. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 200 | 20. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 200 | 52. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 200 | 40. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 200 | 34. | 1               |
| Fluoranthene                                     | 50     | J         | ug/kg | 120 | 23. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 200 | 21. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 200 | 30. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 240 | 34. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 210 | 20. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 200 | 29. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 560 | 180 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 160 | 32. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 180 | 26. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 200 | 24. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 180 | 29. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 160 | 22. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 200 | 30. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 200 | 68. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 200 | 50. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 200 | 37. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 200 | 67. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 200 | 18. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 200 | 42. | 1               |
| Benzo(a)anthracene                               | 33     | J         | ug/kg | 120 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 160 | 48. | 1               |
| Benzo(b)fluoranthene                             | 34     | J         | ug/kg | 120 | 33. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 120 | 32. | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-10

Date Collected: 07/18/17 14:45

Client ID: TP-11

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | 27     | J         | ug/kg | 120 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 160 | 30. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 120 | 38. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 160 | 23. | 1               |
| Fluorene   | ND     |           | ug/kg | 200 | 19. | 1               |
| Phenanthrene                                     | 26     | J         | ug/kg | 120 | 24. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 120 | 23. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 160 | 28. | 1               |
| Pyrene   | 37     | J         | ug/kg | 120 | 20. | 1               |
| Biphenyl   | ND     |           | ug/kg | 450 | 46. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 200 | 36. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 200 | 38. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 200 | 37. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 200 | 82. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 200 | 19. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 240 | 24. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 200 | 21. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 200 | 24. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 120 | 37. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 200 | 29. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 200 | 23. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 180 | 32. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 200 | 65. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 430 | 74. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 280 | 81. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 950 | 92. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 510 | 95. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 160 | 43. | 1               |
| Phenol   | ND     |           | ug/kg | 200 | 30. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 200 | 31. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 280 | 31. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 200 | 38. | 1               |
| Carbazole  | ND     |           | ug/kg | 200 | 19. | 1               |
| Atrazine   | ND     |           | ug/kg | 160 | 69. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 260 | 53. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 200 | 60. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 200 | 40. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-10

Date Collected: 07/18/17 14:45

Client ID: TP-11

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 72         |           | 25-120              |
| Phenol-d6            | 87         |           | 10-120              |
| Nitrobenzene-d5      | 81         |           | 23-120              |
| 2-Fluorobiphenyl     | 74         |           | 30-120              |
| 2,4,6-Tribromophenol | 81         |           | 10-136              |
| 4-Terphenyl-d14      | 70         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-11

Client ID: NS-3

Sample Location: Not Specified

Date Collected: 07/18/17 14:30

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Extraction Date: 07/19/17 07:58

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/24/17 14:16

Analyst: PS

Percent Solids: 88%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | 110    | J         | ug/kg | 150 | 20. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 110 | 21. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 170 | 26. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 190 | 19. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 190 | 50. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 38. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 32. | 1               |
| Fluoranthene                                     | 1300   |           | ug/kg | 110 | 22. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 190 | 20. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 190 | 29. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 230 | 32. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 200 | 19. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 190 | 28. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 540 | 170 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 150 | 30. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 170 | 24. | 1               |
| Naphthalene                                      | 42     | J         | ug/kg | 190 | 23. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 170 | 28. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 150 | 21. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 190 | 29. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 190 | 65. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 190 | 48. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 190 | 36. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 190 | 64. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 190 | 17. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 190 | 40. | 1               |
| Benzo(a)anthracene                               | 610    |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | 570    |           | ug/kg | 150 | 46. | 1               |
| Benzo(b)fluoranthene                             | 730    |           | ug/kg | 110 | 32. | 1               |
| Benzo(k)fluoranthene                             | 240    |           | ug/kg | 110 | 30. | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-11

Date Collected: 07/18/17 14:30

Client ID: NS-3

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | 540    |           | ug/kg | 110 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 29. | 1               |
| Anthracene                                       | 240    |           | ug/kg | 110 | 37. | 1               |
| Benzo(ghi)perylene                               | 360    |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | 100    | J         | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | 980    |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | 92     | J         | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | 410    |           | ug/kg | 150 | 26. | 1               |
| Pyrene   | 1000   |           | ug/kg | 110 | 19. | 1               |
| Biphenyl   | ND     |           | ug/kg | 430 | 44. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 190 | 34. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 190 | 36. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 190 | 36. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 190 | 78. | 1               |
| Dibenzofuran                                     | 53     | J         | ug/kg | 190 | 18. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 230 | 23. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 190 | 20. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 190 | 23. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 110 | 36. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 190 | 28. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 190 | 22. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 170 | 30. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 190 | 62. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 410 | 71. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 260 | 77. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 900 | 88. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 490 | 90. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 150 | 42. | 1               |
| Phenol   | ND     |           | ug/kg | 190 | 28. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 190 | 29. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 270 | 30. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 190 | 36. | 1               |
| Carbazole  | 140    | J         | ug/kg | 190 | 18. | 1               |
| Atrazine   | ND     |           | ug/kg | 150 | 66. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 250 | 51. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 190 | 57. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 190 | 38. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-11

Date Collected: 07/18/17 14:30

Client ID: NS-3

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 83         |           | 25-120              |
| Phenol-d6            | 94         |           | 10-120              |
| Nitrobenzene-d5      | 83         |           | 23-120              |
| 2-Fluorobiphenyl     | 71         |           | 30-120              |
| 2,4,6-Tribromophenol | 83         |           | 10-136              |
| 4-Terphenyl-d14      | 60         |           | 18-120              |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-12 D

Client ID: NS-4

Sample Location: Not Specified

Date Collected: 07/18/17 15:00

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Extraction Date: 07/19/17 07:58

Matrix: Soil

Analytical Method: 1,8270D

Analytical Date: 07/25/17 13:57

Analyst: PS

Percent Solids: 88%

| Parameter  | Result | Qualifier | Units | RL   | MDL | Dilution Factor |
|--|--------|-----------|-------|------|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |      |     |                 |
| Acenaphthene                                     | 940    |           | ug/kg | 600  | 78. | 4               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 450  | 84. | 4               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 680  | 100 | 4               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 750  | 75. | 4               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 750  | 200 | 4               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 750  | 150 | 4               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 750  | 130 | 4               |
| Fluoranthene                                     | 15000  |           | ug/kg | 450  | 86. | 4               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 750  | 80. | 4               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 750  | 110 | 4               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 900  | 130 | 4               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 810  | 75. | 4               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 750  | 110 | 4               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 2200 | 680 | 4               |
| Hexachloroethane                                 | ND     |           | ug/kg | 600  | 120 | 4               |
| Isophorone                                       | ND     |           | ug/kg | 680  | 98. | 4               |
| Naphthalene                                      | 860    |           | ug/kg | 750  | 92. | 4               |
| Nitrobenzene                                     | ND     |           | ug/kg | 680  | 110 | 4               |
| NDPA/DPA   | ND     |           | ug/kg | 600  | 86. | 4               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 750  | 120 | 4               |
| Bis(2-ethylhexyl)phthalate                       | 600    | J         | ug/kg | 750  | 260 | 4               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 750  | 190 | 4               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 750  | 140 | 4               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 750  | 260 | 4               |
| Diethyl phthalate                                | ND     |           | ug/kg | 750  | 70. | 4               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 750  | 160 | 4               |
| Benzo(a)anthracene                               | 6600   |           | ug/kg | 450  | 85. | 4               |
| Benzo(a)pyrene                                   | 4900   |           | ug/kg | 600  | 180 | 4               |
| Benzo(b)fluoranthene                             | 6800   |           | ug/kg | 450  | 130 | 4               |
| Benzo(k)fluoranthene                             | 2400   |           | ug/kg | 450  | 120 | 4               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-12 D

Date Collected: 07/18/17 15:00

Client ID: NS-4

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL   | MDL | Dilution Factor |
|--|--------|-----------|-------|------|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |      |     |                 |
| Chrysene   | 6300   |           | ug/kg | 450  | 78. | 4               |
| Acenaphthylene                                   | 470    | J         | ug/kg | 600  | 120 | 4               |
| Anthracene                                       | 2400   |           | ug/kg | 450  | 150 | 4               |
| Benzo(ghi)perylene                               | 2700   |           | ug/kg | 600  | 88. | 4               |
| Fluorene   | 1000   |           | ug/kg | 750  | 73. | 4               |
| Phenanthrene                                     | 9900   |           | ug/kg | 450  | 92. | 4               |
| Dibenzo(a,h)anthracene                           | 710    |           | ug/kg | 450  | 87. | 4               |
| Indeno(1,2,3-cd)pyrene                           | 2900   |           | ug/kg | 600  | 100 | 4               |
| Pyrene   | 12000  |           | ug/kg | 450  | 75. | 4               |
| Biphenyl   | ND     |           | ug/kg | 1700 | 170 | 4               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 750  | 140 | 4               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 750  | 140 | 4               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 750  | 140 | 4               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 750  | 310 | 4               |
| Dibenzofuran                                     | 750    |           | ug/kg | 750  | 71. | 4               |
| 2-Methylnaphthalene                              | 350    | J         | ug/kg | 900  | 91. | 4               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 750  | 79. | 4               |
| Acetophenone                                     | ND     |           | ug/kg | 750  | 93. | 4               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 450  | 140 | 4               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 750  | 110 | 4               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 750  | 89. | 4               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 680  | 120 | 4               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 750  | 250 | 4               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 1600 | 280 | 4               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 1000 | 310 | 4               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 3600 | 350 | 4               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 2000 | 360 | 4               |
| Pentachlorophenol                                | ND     |           | ug/kg | 600  | 160 | 4               |
| Phenol   | ND     |           | ug/kg | 750  | 110 | 4               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 750  | 120 | 4               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 1100 | 120 | 4               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 750  | 140 | 4               |
| Carbazole  | 1300   |           | ug/kg | 750  | 73. | 4               |
| Atrazine   | ND     |           | ug/kg | 600  | 260 | 4               |
| Benzaldehyde                                     | ND     |           | ug/kg | 990  | 200 | 4               |
| Caprolactam                                      | ND     |           | ug/kg | 750  | 230 | 4               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 750  | 150 | 4               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-12 D

Date Collected: 07/18/17 15:00

Client ID: NS-4

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 43         |           | 25-120              |
| Phenol-d6            | 68         |           | 10-120              |
| Nitrobenzene-d5      | 71         |           | 23-120              |
| 2-Fluorobiphenyl     | 75         |           | 30-120              |
| 2,4,6-Tribromophenol | 11         |           | 10-136              |
| 4-Terphenyl-d14      | 64         |           | 18-120              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 07/24/17 07:10  
 Analyst: RC

Extraction Method: EPA 3546  
 Extraction Date: 07/19/17 07:34

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-12 Batch: WG1023759-1 |        |           |       |     |     |
| Acenaphthene   | ND     |           | ug/kg | 130 | 17. |
| Hexachlorobenzene  | ND     |           | ug/kg | 98  | 18. |
| Bis(2-chloroethyl)ether  | ND     |           | ug/kg | 150 | 22. |
| 2-Chloronaphthalene  | ND     |           | ug/kg | 160 | 16. |
| 3,3'-Dichlorobenzidine   | ND     |           | ug/kg | 160 | 44. |
| 2,4-Dinitrotoluene   | ND     |           | ug/kg | 160 | 33. |
| 2,6-Dinitrotoluene   | ND     |           | ug/kg | 160 | 28. |
| Fluoranthene   | ND     |           | ug/kg | 98  | 19. |
| 4-Chlorophenyl phenyl ether  | ND     |           | ug/kg | 160 | 18. |
| 4-Bromophenyl phenyl ether   | ND     |           | ug/kg | 160 | 25. |
| Bis(2-chloroisopropyl)ether  | ND     |           | ug/kg | 200 | 28. |
| Bis(2-chloroethoxy)methane   | ND     |           | ug/kg | 180 | 16. |
| Hexachlorobutadiene  | ND     |           | ug/kg | 160 | 24. |
| Hexachlorocyclopentadiene  | ND     |           | ug/kg | 470 | 150 |
| Hexachloroethane   | ND     |           | ug/kg | 130 | 26. |
| Isophorone   | ND     |           | ug/kg | 150 | 21. |
| Naphthalene  | ND     |           | ug/kg | 160 | 20. |
| Nitrobenzene   | ND     |           | ug/kg | 150 | 24. |
| NDPA/DPA   | ND     |           | ug/kg | 130 | 19. |
| n-Nitrosodi-n-propylamine  | ND     |           | ug/kg | 160 | 25. |
| Bis(2-ethylhexyl)phthalate   | ND     |           | ug/kg | 160 | 57. |
| Butyl benzyl phthalate   | ND     |           | ug/kg | 160 | 41. |
| Di-n-butylphthalate  | ND     |           | ug/kg | 160 | 31. |
| Di-n-octylphthalate  | ND     |           | ug/kg | 160 | 56. |
| Diethyl phthalate  | ND     |           | ug/kg | 160 | 15. |
| Dimethyl phthalate   | ND     |           | ug/kg | 160 | 34. |
| Benzo(a)anthracene   | ND     |           | ug/kg | 98  | 18. |
| Benzo(a)pyrene   | ND     |           | ug/kg | 130 | 40. |
| Benzo(b)fluoranthene   | ND     |           | ug/kg | 98  | 28. |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 07/24/17 07:10  
 Analyst: RC

Extraction Method: EPA 3546  
 Extraction Date: 07/19/17 07:34

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-12 Batch: WG1023759-1 |        |           |       |     |     |
| Benzo(k)fluoranthene   | ND     |           | ug/kg | 98  | 26. |
| Chrysene   | ND     |           | ug/kg | 98  | 17. |
| Acenaphthylene   | ND     |           | ug/kg | 130 | 25. |
| Anthracene   | ND     |           | ug/kg | 98  | 32. |
| Benzo(ghi)perylene   | ND     |           | ug/kg | 130 | 19. |
| Fluorene   | ND     |           | ug/kg | 160 | 16. |
| Phenanthrene   | ND     |           | ug/kg | 98  | 20. |
| Dibenzo(a,h)anthracene   | ND     |           | ug/kg | 98  | 19. |
| Indeno(1,2,3-cd)pyrene   | ND     |           | ug/kg | 130 | 23. |
| Pyrene   | ND     |           | ug/kg | 98  | 16. |
| Biphenyl   | ND     |           | ug/kg | 370 | 38. |
| 4-Chloroaniline  | ND     |           | ug/kg | 160 | 30. |
| 2-Nitroaniline   | ND     |           | ug/kg | 160 | 32. |
| 3-Nitroaniline   | ND     |           | ug/kg | 160 | 31. |
| 4-Nitroaniline   | ND     |           | ug/kg | 160 | 68. |
| Dibenzofuran   | ND     |           | ug/kg | 160 | 16. |
| 2-Methylnaphthalene  | ND     |           | ug/kg | 200 | 20. |
| 1,2,4,5-Tetrachlorobenzene   | ND     |           | ug/kg | 160 | 17. |
| Acetophenone   | ND     |           | ug/kg | 160 | 20. |
| 2,4,6-Trichlorophenol  | ND     |           | ug/kg | 98  | 31. |
| p-Chloro-m-cresol  | ND     |           | ug/kg | 160 | 24. |
| 2-Chlorophenol   | ND     |           | ug/kg | 160 | 19. |
| 2,4-Dichlorophenol   | ND     |           | ug/kg | 150 | 26. |
| 2,4-Dimethylphenol   | ND     |           | ug/kg | 160 | 54. |
| 2-Nitrophenol  | ND     |           | ug/kg | 350 | 62. |
| 4-Nitrophenol  | ND     |           | ug/kg | 230 | 67. |
| 2,4-Dinitrophenol  | ND     |           | ug/kg | 790 | 76. |
| 4,6-Dinitro-o-cresol   | ND     |           | ug/kg | 430 | 79. |
| Pentachlorophenol  | ND     |           | ug/kg | 130 | 36. |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 07/24/17 07:10  
 Analyst: RC

Extraction Method: EPA 3546  
 Extraction Date: 07/19/17 07:34

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-12 Batch: WG1023759-1 |        |           |       |     |     |
| Phenol   | ND     |           | ug/kg | 160 | 25. |
| 2-Methylphenol   | ND     |           | ug/kg | 160 | 25. |
| 3-Methylphenol/4-Methylphenol  | ND     |           | ug/kg | 240 | 26. |
| 2,4,5-Trichlorophenol  | ND     |           | ug/kg | 160 | 31. |
| Carbazole  | ND     |           | ug/kg | 160 | 16. |
| Atrazine   | ND     |           | ug/kg | 130 | 57. |
| Benzaldehyde   | ND     |           | ug/kg | 220 | 44. |
| Caprolactam  | ND     |           | ug/kg | 160 | 50. |
| 2,3,4,6-Tetrachlorophenol  | ND     |           | ug/kg | 160 | 33. |

#### Tentatively Identified Compounds

No Tentatively Identified Compounds ND ug/kg

| Surrogate            | %Recovery | Qualifier | Acceptance<br>Criteria |
|----------------------|-----------|-----------|------------------------|
| 2-Fluorophenol       | 79        |           | 25-120                 |
| Phenol-d6            | 89        |           | 10-120                 |
| Nitrobenzene-d5      | 80        |           | 23-120                 |
| 2-Fluorobiphenyl     | 80        |           | 30-120                 |
| 2,4,6-Tribromophenol | 82        |           | 10-136                 |
| 4-Terphenyl-d14      | 102       |           | 18-120                 |

## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-12 Batch: WG1023759-2 WG1023759-3 |                  |      |                   |      |                     |     |      |               |
| Acenaphthene  | 90               |      | 89                |      | 31-137              | 1   |      | 50            |
| Hexachlorobenzene   | 93               |      | 89                |      | 40-140              | 4   |      | 50            |
| Bis(2-chloroethyl)ether   | 92               |      | 89                |      | 40-140              | 3   |      | 50            |
| 2-Chloronaphthalene   | 83               |      | 82                |      | 40-140              | 1   |      | 50            |
| 3,3'-Dichlorobenzidine  | 91               |      | 82                |      | 40-140              | 10  |      | 50            |
| 2,4-Dinitrotoluene  | 113              |      | 103               |      | 40-132              | 9   |      | 50            |
| 2,6-Dinitrotoluene  | 98               |      | 94                |      | 40-140              | 4   |      | 50            |
| Fluoranthene  | 100              |      | 95                |      | 40-140              | 5   |      | 50            |
| 4-Chlorophenyl phenyl ether   | 93               |      | 90                |      | 40-140              | 3   |      | 50            |
| 4-Bromophenyl phenyl ether  | 94               |      | 91                |      | 40-140              | 3   |      | 50            |
| Bis(2-chloroisopropyl)ether   | 90               |      | 88                |      | 40-140              | 2   |      | 50            |
| Bis(2-chloroethoxy)methane  | 97               |      | 94                |      | 40-117              | 3   |      | 50            |
| Hexachlorobutadiene   | 77               |      | 77                |      | 40-140              | 0   |      | 50            |
| Hexachlorocyclopentadiene   | 66               |      | 68                |      | 40-140              | 3   |      | 50            |
| Hexachloroethane  | 79               |      | 80                |      | 40-140              | 1   |      | 50            |
| Isophorone  | 97               |      | 93                |      | 40-140              | 4   |      | 50            |
| Naphthalene   | 80               |      | 81                |      | 40-140              | 1   |      | 50            |
| Nitrobenzene  | 92               |      | 90                |      | 40-140              | 2   |      | 50            |
| NDPA/DPA  | 99               |      | 94                |      | 36-157              | 5   |      | 50            |
| n-Nitrosodi-n-propylamine   | 97               |      | 94                |      | 32-121              | 3   |      | 50            |
| Bis(2-ethylhexyl)phthalate  | 115              |      | 108               |      | 40-140              | 6   |      | 50            |
| Butyl benzyl phthalate  | 116              |      | 108               |      | 40-140              | 7   |      | 50            |
| Di-n-butylphthalate   | 104              |      | 98                |      | 40-140              | 6   |      | 50            |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-12 Batch: WG1023759-2 WG1023759-3 |                  |      |                   |      |                     |     |      |               |
| Di-n-octylphthalate   | 111              |      | 105               |      | 40-140              | 6   |      | 50            |
| Diethyl phthalate   | 100              |      | 95                |      | 40-140              | 5   |      | 50            |
| Dimethyl phthalate  | 96               |      | 90                |      | 40-140              | 6   |      | 50            |
| Benzo(a)anthracene  | 100              |      | 94                |      | 40-140              | 6   |      | 50            |
| Benzo(a)pyrene  | 108              |      | 101               |      | 40-140              | 7   |      | 50            |
| Benzo(b)fluoranthene  | 107              |      | 99                |      | 40-140              | 8   |      | 50            |
| Benzo(k)fluoranthene  | 102              |      | 96                |      | 40-140              | 6   |      | 50            |
| Chrysene  | 97               |      | 90                |      | 40-140              | 7   |      | 50            |
| Acenaphthylene  | 88               |      | 85                |      | 40-140              | 3   |      | 50            |
| Anthracene  | 96               |      | 91                |      | 40-140              | 5   |      | 50            |
| Benzo(ghi)perylene  | 107              |      | 99                |      | 40-140              | 8   |      | 50            |
| Fluorene  | 92               |      | 90                |      | 40-140              | 2   |      | 50            |
| Phenanthrene  | 94               |      | 89                |      | 40-140              | 5   |      | 50            |
| Dibenzo(a,h)anthracene  | 107              |      | 99                |      | 40-140              | 8   |      | 50            |
| Indeno(1,2,3-cd)pyrene  | 112              |      | 103               |      | 40-140              | 8   |      | 50            |
| Pyrene  | 100              |      | 93                |      | 35-142              | 7   |      | 50            |
| Biphenyl  | 88               |      | 85                |      | 54-104              | 3   |      | 50            |
| 4-Chloroaniline   | 67               |      | 62                |      | 40-140              | 8   |      | 50            |
| 2-Nitroaniline  | 104              |      | 99                |      | 47-134              | 5   |      | 50            |
| 3-Nitroaniline  | 92               |      | 87                |      | 26-129              | 6   |      | 50            |
| 4-Nitroaniline  | 102              |      | 96                |      | 41-125              | 6   |      | 50            |
| Dibenzofuran  | 90               |      | 87                |      | 40-140              | 3   |      | 50            |
| 2-Methylnaphthalene   | 82               |      | 82                |      | 40-140              | 0   |      | 50            |



## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-12 Batch: WG1023759-2 WG1023759-3 |                  |      |                   |      |                     |     |      |               |
| 1,2,4,5-Tetrachlorobenzene  | 81               |      | 81                |      | 40-117              | 0   |      | 50            |
| Acetophenone  | 96               |      | 94                |      | 14-144              | 2   |      | 50            |
| 2,4,6-Trichlorophenol   | 98               |      | 94                |      | 30-130              | 4   |      | 50            |
| p-Chloro-m-cresol   | 100              |      | 96                |      | 26-103              | 4   |      | 50            |
| 2-Chlorophenol  | 98               |      | 95                |      | 25-102              | 3   |      | 50            |
| 2,4-Dichlorophenol  | 106              |      | 100               |      | 30-130              | 6   |      | 50            |
| 2,4-Dimethylphenol  | 103              |      | 98                |      | 30-130              | 5   |      | 50            |
| 2-Nitrophenol   | 101              |      | 98                |      | 30-130              | 3   |      | 50            |
| 4-Nitrophenol   | 104              |      | 100               |      | 11-114              | 4   |      | 50            |
| 2,4-Dinitrophenol   | 72               |      | 73                |      | 4-130               | 1   |      | 50            |
| 4,6-Dinitro-o-cresol  | 105              |      | 102               |      | 10-130              | 3   |      | 50            |
| Pentachlorophenol   | 87               |      | 83                |      | 17-109              | 5   |      | 50            |
| Phenol  | 100              | Q    | 98                | Q    | 26-90               | 2   |      | 50            |
| 2-Methylphenol  | 102              |      | 98                |      | 30-130              | 4   |      | 50            |
| 3-Methylphenol/4-Methylphenol   | 107              |      | 101               |      | 30-130              | 6   |      | 50            |
| 2,4,5-Trichlorophenol   | 95               |      | 91                |      | 30-130              | 4   |      | 50            |
| Carbazole   | 102              |      | 96                |      | 54-128              | 6   |      | 50            |
| Atrazine  | 104              |      | 100               |      | 40-140              | 4   |      | 50            |
| Benzaldehyde  | 76               |      | 77                |      | 40-140              | 1   |      | 50            |
| Caprolactam   | 114              |      | 106               |      | 15-130              | 7   |      | 50            |
| 2,3,4,6-Tetrachlorophenol   | 97               |      | 91                |      | 40-140              | 6   |      | 50            |

**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17

| <b>Parameter</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|

Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-12 Batch: WG1023759-2 WG1023759-3

| <b>Surrogate</b>     | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> |
|----------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|
| 2-Fluorophenol       | 84                       |             | 82                        |             | 25-120                         |
| Phenol-d6            | 91                       |             | 87                        |             | 10-120                         |
| Nitrobenzene-d5      | 81                       |             | 79                        |             | 23-120                         |
| 2-Fluorobiphenyl     | 74                       |             | 73                        |             | 30-120                         |
| 2,4,6-Tribromophenol | 90                       |             | 85                        |             | 10-136                         |
| 4-Terphenyl-d14      | 87                       |             | 80                        |             | 18-120                         |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter   | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|---|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-12 QC Batch ID: WG1023759-4 WG1023759-5 QC Sample: L1724590-01 Client ID: TP-14 |               |          |          |              |      |           |               |      |                 |     |      |            |
| Acenaphthene  | ND            | 1510     | 1300     | 86           |      | 1100      | 73            |      | 31-137          | 17  |      | 50         |
| Hexachlorobenzene   | ND            | 1510     | 1400     | 93           |      | 1100      | 73            |      | 40-140          | 24  |      | 50         |
| Bis(2-chloroethyl)ether   | ND            | 1510     | 1400     | 93           |      | 1200      | 79            |      | 40-140          | 15  |      | 50         |
| 2-Chloronaphthalene   | ND            | 1510     | 1200     | 80           |      | 1100      | 73            |      | 40-140          | 9   |      | 50         |
| 3,3'-Dichlorobenzidine  | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 40-140          | 22  |      | 50         |
| 2,4-Dinitrotoluene  | ND            | 1510     | 1600     | 110          |      | 1300      | 86            |      | 40-132          | 21  |      | 50         |
| 2,6-Dinitrotoluene  | ND            | 1510     | 1400     | 93           |      | 1200      | 79            |      | 40-140          | 15  |      | 50         |
| Fluoranthene  | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 40-140          | 22  |      | 50         |
| 4-Chlorophenyl phenyl ether   | ND            | 1510     | 1400     | 93           |      | 1200      | 79            |      | 40-140          | 15  |      | 50         |
| 4-Bromophenyl phenyl ether  | ND            | 1510     | 1400     | 93           |      | 1100      | 73            |      | 40-140          | 24  |      | 50         |
| Bis(2-chloroisopropyl)ether   | ND            | 1510     | 1300     | 86           |      | 1200      | 79            |      | 40-140          | 8   |      | 50         |
| Bis(2-chloroethoxy)methane  | ND            | 1510     | 1400     | 93           |      | 1200      | 79            |      | 40-117          | 15  |      | 50         |
| Hexachlorobutadiene   | ND            | 1510     | 1100     | 73           |      | 1000      | 66            |      | 40-140          | 10  |      | 50         |
| Hexachlorocyclopentadiene   | ND            | 1510     | 520J     | 34           | Q    | 510J      | 34            | Q    | 40-140          | 2   |      | 50         |
| Hexachloroethane  | ND            | 1510     | 1000     | 66           |      | 1000      | 66            |      | 40-140          | 0   |      | 50         |
| Isophorone  | ND            | 1510     | 1400     | 93           |      | 1300      | 86            |      | 40-140          | 7   |      | 50         |
| Naphthalene   | ND            | 1510     | 1200     | 80           |      | 1100      | 73            |      | 40-140          | 9   |      | 50         |
| Nitrobenzene  | ND            | 1510     | 1300     | 86           |      | 1200      | 79            |      | 40-140          | 8   |      | 50         |
| NDPA/DPA  | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 36-157          | 22  |      | 50         |
| n-Nitrosodi-n-propylamine   | ND            | 1510     | 1400     | 93           |      | 1300      | 86            |      | 32-121          | 7   |      | 50         |
| Bis(2-ethylhexyl)phthalate  | ND            | 1510     | 1700     | 110          |      | 1400      | 93            |      | 40-140          | 19  |      | 50         |
| Butyl benzyl phthalate  | ND            | 1510     | 1700     | 110          |      | 1300      | 86            |      | 40-140          | 27  |      | 50         |
| Di-n-butylphthalate   | ND            | 1510     | 1600     | 110          |      | 1200      | 79            |      | 40-140          | 29  |      | 50         |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter   | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|---|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-12 QC Batch ID: WG1023759-4 WG1023759-5 QC Sample: L1724590-01 Client ID: TP-14 |               |          |          |              |      |           |               |      |                 |     |      |            |
| Di-n-octylphthalate   | ND            | 1510     | 1700     | 110          |      | 1400      | 93            |      | 40-140          | 19  |      | 50         |
| Diethyl phthalate   | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 40-140          | 22  |      | 50         |
| Dimethyl phthalate  | ND            | 1510     | 1400     | 93           |      | 1200      | 79            |      | 40-140          | 15  |      | 50         |
| Benzo(a)anthracene  | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 40-140          | 22  |      | 50         |
| Benzo(a)pyrene  | ND            | 1510     | 1600     | 110          |      | 1200      | 79            |      | 40-140          | 29  |      | 50         |
| Benzo(b)fluoranthene  | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 40-140          | 22  |      | 50         |
| Benzo(k)fluoranthene  | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 40-140          | 22  |      | 50         |
| Chrysene  | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 40-140          | 22  |      | 50         |
| Acenaphthylene  | ND            | 1510     | 1300     | 86           |      | 1100      | 73            |      | 40-140          | 17  |      | 50         |
| Anthracene  | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 40-140          | 22  |      | 50         |
| Benzo(ghi)perylene  | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 40-140          | 22  |      | 50         |
| Fluorene  | ND            | 1510     | 1400     | 93           |      | 1100      | 73            |      | 40-140          | 24  |      | 50         |
| Phenanthrene  | ND            | 1510     | 1400     | 93           |      | 1100      | 73            |      | 40-140          | 24  |      | 50         |
| Dibenzo(a,h)anthracene  | ND            | 1510     | 1600     | 110          |      | 1200      | 79            |      | 40-140          | 29  |      | 50         |
| Indeno(1,2,3-cd)pyrene  | ND            | 1510     | 1600     | 110          |      | 1300      | 86            |      | 40-140          | 21  |      | 50         |
| Pyrene  | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 35-142          | 22  |      | 50         |
| Biphenyl  | ND            | 1510     | 1300     | 86           |      | 1100      | 73            |      | 54-104          | 17  |      | 50         |
| 4-Chloroaniline   | ND            | 1510     | 1100     | 73           |      | 910       | 60            |      | 40-140          | 19  |      | 50         |
| 2-Nitroaniline  | ND            | 1510     | 1600     | 110          |      | 1300      | 86            |      | 47-134          | 21  |      | 50         |
| 3-Nitroaniline  | ND            | 1510     | 1400     | 93           |      | 1100      | 73            |      | 26-129          | 24  |      | 50         |
| 4-Nitroaniline  | ND            | 1510     | 1500     | 99           |      | 1200      | 79            |      | 41-125          | 22  |      | 50         |
| Dibenzofuran  | ND            | 1510     | 1300     | 86           |      | 1100      | 73            |      | 40-140          | 17  |      | 50         |
| 2-Methylnaphthalene   | ND            | 1510     | 1200     | 80           |      | 1100      | 73            |      | 40-140          | 9   |      | 50         |

# **Matrix Spike Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| <i>Parameter</i>  | <i>Native Sample</i> | <i>MS Added</i> | <i>MS Found</i> | <i>MS %Recovery</i> | <i>Qual</i> | <i>MSD Found</i> | <i>MSD %Recovery</i> | <i>Qual</i> | <i>Recovery Limits</i> | <i>RPD</i> | <i>Qual</i> | <i>RPD Limits</i> |
|---|----------------------|-----------------|-----------------|---------------------|-------------|------------------|----------------------|-------------|------------------------|------------|-------------|-------------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-12 QC Batch ID: WG1023759-4 WG1023759-5 QC Sample: L1724590-01 Client ID: TP-14 |                      |                 |                 |                     |             |                  |                      |             |                        |            |             |                   |
| 1,2,4,5-Tetrachlorobenzene  | ND                   | 1510            | 1200            | 80                  |             | 1100             | 73                   |             | 40-117                 | 9          |             | 50                |
| Acetophenone  | ND                   | 1510            | 1400            | 93                  |             | 1300             | 86                   |             | 14-144                 | 7          |             | 50                |
| 2,4,6-Trichlorophenol   | ND                   | 1510            | 1500            | 99                  |             | 1200             | 79                   |             | 30-130                 | 22         |             | 50                |
| p-Chloro-m-cresol   | ND                   | 1510            | 1500            | 99                  |             | 1300             | 86                   |             | 26-103                 | 14         |             | 50                |
| 2-Chlorophenol  | ND                   | 1510            | 1400            | 93                  |             | 1300             | 86                   |             | 25-102                 | 7          |             | 50                |
| 2,4-Dichlorophenol  | ND                   | 1510            | 1600            | 110                 |             | 1400             | 93                   |             | 30-130                 | 13         |             | 50                |
| 2,4-Dimethylphenol  | ND                   | 1510            | 1500            | 99                  |             | 1400             | 93                   |             | 30-130                 | 7          |             | 50                |
| 2-Nitrophenol   | ND                   | 1510            | 1500            | 99                  |             | 1400             | 93                   |             | 30-130                 | 7          |             | 50                |
| 4-Nitrophenol   | ND                   | 1510            | 1600            | 110                 |             | 1200             | 79                   |             | 11-114                 | 29         |             | 50                |
| 2,4-Dinitrophenol   | ND                   | 1510            | ND              | 0                   | Q           | ND               | 0                    | Q           | 4-130                  | NC         |             | 50                |
| 4,6-Dinitro-o-cresol  | ND                   | 1510            | 760             | 50                  |             | 650              | 43                   |             | 10-130                 | 16         |             | 50                |
| Pentachlorophenol   | ND                   | 1510            | 920             | 61                  |             | 720              | 48                   |             | 17-109                 | 24         |             | 50                |
| Phenol  | ND                   | 1510            | 1400            | 93                  | Q           | 1300             | 86                   |             | 26-90                  | 7          |             | 50                |
| 2-Methylphenol  | ND                   | 1510            | 1500            | 99                  |             | 1300             | 86                   |             | 30-130.                | 14         |             | 50                |
| 3-Methylphenol/4-Methylphenol   | ND                   | 1510            | 1500            | 99                  |             | 1400             | 93                   |             | 30-130                 | 7          |             | 50                |
| 2,4,5-Trichlorophenol   | ND                   | 1510            | 1400            | 93                  |             | 1200             | 79                   |             | 30-130                 | 15         |             | 50                |
| Carbazole   | ND                   | 1510            | 1600            | 110                 |             | 1200             | 79                   |             | 54-128                 | 29         |             | 50                |
| Atrazine  | ND                   | 1510            | 1600            | 110                 |             | 1300             | 86                   |             | 40-140                 | 21         |             | 50                |
| Benzaldehyde  | ND                   | 1510            | 1100            | 73                  |             | 1100             | 73                   |             | 40-140                 | 0          |             | 50                |
| Caprolactam   | ND                   | 1510            | 1500            | 99                  |             | 1300             | 86                   |             | 15-130                 | 14         |             | 50                |
| 2,3,4,6-Tetrachlorophenol   | ND                   | 1510            | 1500            | 99                  |             | 1200             | 79                   |             | 40-140                 | 22         |             | 50                |

**Matrix Spike Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17

| <b>Parameter</b>  | <b>Native Sample</b> | <b>MS Added</b> | <b>MS Found</b> | <b>MS %Recovery</b> | <b>Qual</b> | <b>MSD Found</b> | <b>MSD %Recovery</b> | <b>Qual</b> | <b>Recovery Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD Limits</b> |
|---|----------------------|-----------------|-----------------|---------------------|-------------|------------------|----------------------|-------------|------------------------|------------|-------------|-------------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-12 QC Batch ID: WG1023759-4 WG1023759-5 QC Sample: L1724590-01 Client ID: TP-14 |                      |                 |                 |                     |             |                  |                      |             |                        |            |             |                   |

| <b>Surrogate</b>     | <b>MS</b>         |                  | <b>MSD</b>        |                  | <b>Acceptance Criteria</b> |
|----------------------|-------------------|------------------|-------------------|------------------|----------------------------|
|                      | <b>% Recovery</b> | <b>Qualifier</b> | <b>% Recovery</b> | <b>Qualifier</b> |                            |
| 2,4,6-Tribromophenol | 88                |                  | 85                |                  | 10-136                     |
| 2-Fluorobiphenyl     | 69                |                  | 71                |                  | 30-120                     |
| 2-Fluorophenol       | 80                |                  | 85                |                  | 25-120                     |
| 4-Terphenyl-d14      | 80                |                  | 73                |                  | 18-120                     |
| Nitrobenzene-d5      | 75                |                  | 82                |                  | 23-120                     |
| Phenol-d6            | 85                |                  | 90                |                  | 10-120                     |

# PCBS

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

**SAMPLE RESULTS**

**Lab ID:** L1724590-01  
**Client ID:** TP-14  
**Sample Location:** Not Specified

**Matrix:** Soil  
**Analytical Method:** 1,8082A  
**Analytical Date:** 07/22/17 05:31  
**Analyst:** HT  
**Percent Solids:** 87%

**Date Collected:** 07/18/17 09:40  
**Date Received:** 07/18/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 07/19/17 08:04  
**Cleanup Method:** EPA 3665A  
**Cleanup Date:** 07/19/17  
**Cleanup Method:** EPA 3660B  
**Cleanup Date:** 07/19/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|---|--------|-----------|-------|------|------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |      |      |                 |        |
| Aroclor 1016                                      | ND     |           | ug/kg | 37.8 | 4.29 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/kg | 37.8 | 5.76 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/kg | 37.8 | 3.72 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/kg | 37.8 | 4.63 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/kg | 37.8 | 4.24 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/kg | 37.8 | 3.09 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/kg | 37.8 | 3.95 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/kg | 37.8 | 3.11 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/kg | 37.8 | 2.68 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/kg | 37.8 | 2.68 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 37         |           | 30-150              | A      |
| Decachlorobiphenyl           | 59         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 38         |           | 30-150              | B      |
| Decachlorobiphenyl           | 62         |           | 30-150              | B      |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-04

Client ID: TP-18

Sample Location: Not Specified

Date Collected: 07/18/17 11:30

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Matrix: Soil

Extraction Date: 07/19/17 08:04

Analytical Method: 1,8082A

Cleanup Method: EPA 3665A

Analytical Date: 07/22/17 06:25

Cleanup Date: 07/19/17

Analyst: HT

Cleanup Method: EPA 3660B

Percent Solids: 85%

Cleanup Date: 07/19/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|---|--------|-----------|-------|------|------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |      |      |                 |        |
| Aroclor 1016                                      | ND     |           | ug/kg | 37.8 | 4.29 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/kg | 37.8 | 5.76 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/kg | 37.8 | 3.72 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/kg | 37.8 | 4.63 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/kg | 37.8 | 4.24 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/kg | 37.8 | 3.08 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/kg | 37.8 | 3.95 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/kg | 37.8 | 3.11 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/kg | 37.8 | 2.68 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/kg | 37.8 | 2.68 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 85         |           | 30-150              | A      |
| Decachlorobiphenyl           | 59         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 88         |           | 30-150              | B      |
| Decachlorobiphenyl           | 63         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM**Project Number:** 0239-016-001**Lab Number:** L1724590**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-05

Client ID: TP-16

Sample Location: Not Specified

Matrix: Soil

Analytical Method: 1,8082A

Analytical Date: 07/23/17 14:32

Analyst: HT

Percent Solids: 89%

Date Collected: 07/18/17 11:50

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Extraction Date: 07/19/17 08:04

Cleanup Method: EPA 3665A

Cleanup Date: 07/19/17

Cleanup Method: EPA 3660B

Cleanup Date: 07/19/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|---|--------|-----------|-------|------|------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |      |      |                 |        |
| Aroclor 1016                                      | ND     |           | ug/kg | 36.4 | 4.13 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/kg | 36.4 | 5.55 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/kg | 36.4 | 3.59 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/kg | 36.4 | 4.46 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/kg | 36.4 | 4.09 | 1               | A      |
| Aroclor 1254                                      | 8.09   | J         | ug/kg | 36.4 | 2.97 | 1               | B      |
| Aroclor 1260                                      | 10.6   | J         | ug/kg | 36.4 | 3.81 | 1               | B      |
| Aroclor 1262                                      | ND     |           | ug/kg | 36.4 | 3.00 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/kg | 36.4 | 2.58 | 1               | A      |
| PCBs, Total                                       | 18.7   | J         | ug/kg | 36.4 | 2.97 | 1               | B      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 75         |           | 30-150              | A      |
| Decachlorobiphenyl           | 63         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 67         |           | 30-150              | B      |
| Decachlorobiphenyl           | 78         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

**SAMPLE RESULTS**

**Lab ID:** L1724590-08  
**Client ID:** BLINDDUP  
**Sample Location:** Not Specified  
  
**Matrix:** Soil  
**Analytical Method:** 1,8082A  
**Analytical Date:** 07/22/17 06:38  
**Analyst:** HT  
**Percent Solids:** 87%

**Date Collected:** 07/18/17 12:00  
**Date Received:** 07/18/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 07/19/17 08:04  
**Cleanup Method:** EPA 3665A  
**Cleanup Date:** 07/19/17  
**Cleanup Method:** EPA 3660B  
**Cleanup Date:** 07/19/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|---|--------|-----------|-------|------|------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |      |      |                 |        |
| Aroclor 1016                                      | ND     |           | ug/kg | 38.0 | 4.31 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/kg | 38.0 | 5.79 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/kg | 38.0 | 3.74 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/kg | 38.0 | 4.66 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/kg | 38.0 | 4.27 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/kg | 38.0 | 3.10 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/kg | 38.0 | 3.97 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/kg | 38.0 | 3.13 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/kg | 38.0 | 2.69 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/kg | 38.0 | 2.69 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 77         |           | 30-150              | A      |
| Decachlorobiphenyl           | 61         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 80         |           | 30-150              | B      |
| Decachlorobiphenyl           | 64         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-09

Client ID: TP-12

Sample Location: Not Specified

Date Collected: 07/18/17 13:50

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Matrix: Soil

Extraction Date: 07/19/17 08:04

Analytical Method: 1,8082A

Cleanup Method: EPA 3665A

Analytical Date: 07/23/17 14:44

Cleanup Date: 07/19/17

Analyst: HT

Cleanup Method: EPA 3660B

Percent Solids: 74%

Cleanup Date: 07/19/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|---|--------|-----------|-------|------|------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |      |      |                 |        |
| Aroclor 1016                                      | ND     |           | ug/kg | 42.8 | 4.86 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/kg | 42.8 | 6.52 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/kg | 42.8 | 4.22 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/kg | 42.8 | 5.24 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/kg | 42.8 | 4.81 | 1               | A      |
| Aroclor 1254                                      | 14.3   | J         | ug/kg | 42.8 | 3.50 | 1               | A      |
| Aroclor 1260                                      | 12.4   | J         | ug/kg | 42.8 | 4.47 | 1               | B      |
| Aroclor 1262                                      | ND     |           | ug/kg | 42.8 | 3.52 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/kg | 42.8 | 3.03 | 1               | A      |
| PCBs, Total                                       | 26.7   | J         | ug/kg | 42.8 | 4.47 | 1               | B      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 75         |           | 30-150              | A      |
| Decachlorobiphenyl           | 66         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 72         |           | 30-150              | B      |
| Decachlorobiphenyl           | 81         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

**SAMPLE RESULTS**

**Lab ID:** L1724590-11  
**Client ID:** NS-3  
**Sample Location:** Not Specified

**Matrix:** Soil  
**Analytical Method:** 1,8082A  
**Analytical Date:** 07/22/17 05:44  
**Analyst:** HT  
**Percent Solids:** 88%

**Date Collected:** 07/18/17 14:30  
**Date Received:** 07/18/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 07/19/17 08:04  
**Cleanup Method:** EPA 3665A  
**Cleanup Date:** 07/19/17  
**Cleanup Method:** EPA 3660B  
**Cleanup Date:** 07/19/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|---|--------|-----------|-------|------|------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |      |      |                 |        |
| Aroclor 1016                                      | ND     |           | ug/kg | 37.1 | 4.20 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/kg | 37.1 | 5.64 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/kg | 37.1 | 3.65 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/kg | 37.1 | 4.54 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/kg | 37.1 | 4.16 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/kg | 37.1 | 3.03 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/kg | 37.1 | 3.87 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/kg | 37.1 | 3.05 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/kg | 37.1 | 2.62 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/kg | 37.1 | 2.62 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 80         |           | 30-150              | A      |
| Decachlorobiphenyl           | 67         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 78         |           | 30-150              | B      |
| Decachlorobiphenyl           | 69         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

**SAMPLE RESULTS**

**Lab ID:** L1724590-12  
**Client ID:** NS-4  
**Sample Location:** Not Specified

**Matrix:** Soil  
**Analytical Method:** 1,8082A  
**Analytical Date:** 07/23/17 14:57  
**Analyst:** HT  
**Percent Solids:** 88%

**Date Collected:** 07/18/17 15:00  
**Date Received:** 07/18/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 07/19/17 08:04  
**Cleanup Method:** EPA 3665A  
**Cleanup Date:** 07/19/17  
**Cleanup Method:** EPA 3660B  
**Cleanup Date:** 07/19/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|---|--------|-----------|-------|------|------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |      |      |                 |        |
| Aroclor 1016                                      | ND     |           | ug/kg | 37.0 | 4.20 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/kg | 37.0 | 5.63 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/kg | 37.0 | 3.64 | 1               | A      |
| Aroclor 1242                                      | 142    |           | ug/kg | 37.0 | 4.53 | 1               | B      |
| Aroclor 1248                                      | ND     |           | ug/kg | 37.0 | 4.15 | 1               | A      |
| Aroclor 1254                                      | 215    |           | ug/kg | 37.0 | 3.02 | 1               | B      |
| Aroclor 1260                                      | 75.5   |           | ug/kg | 37.0 | 3.86 | 1               | B      |
| Aroclor 1262                                      | ND     |           | ug/kg | 37.0 | 3.04 | 1               | A      |
| Aroclor 1268                                      | 24.0   | J         | ug/kg | 37.0 | 2.62 | 1               | B      |
| PCBs, Total                                       | 457    | J         | ug/kg | 37.0 | 2.62 | 1               | B      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 67         |           | 30-150              | A      |
| Decachlorobiphenyl           | 65         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 58         |           | 30-150              | B      |
| Decachlorobiphenyl           | 85         |           | 30-150              | B      |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8082A  
 Analytical Date: 07/20/17 14:00  
 Analyst: JA

Extraction Method: EPA 3546  
 Extraction Date: 07/19/17 08:04  
 Cleanup Method: EPA 3665A  
 Cleanup Date: 07/19/17  
 Cleanup Method: EPA 3660B  
 Cleanup Date: 07/19/17

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Column |
|--|--------|-----------|-------|------|------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab for sample(s): 01,04-05,08-09,11-12 Batch: WG1023773-1 |        |           |       |      |      |        |
| Aroclor 1016   | ND     |           | ug/kg | 31.9 | 3.62 | A      |
| Aroclor 1221   | ND     |           | ug/kg | 31.9 | 4.86 | A      |
| Aroclor 1232   | ND     |           | ug/kg | 31.9 | 3.14 | A      |
| Aroclor 1242   | ND     |           | ug/kg | 31.9 | 3.90 | A      |
| Aroclor 1248   | ND     |           | ug/kg | 31.9 | 3.58 | A      |
| Aroclor 1254   | ND     |           | ug/kg | 31.9 | 2.60 | A      |
| Aroclor 1260   | ND     |           | ug/kg | 31.9 | 3.33 | A      |
| Aroclor 1262   | ND     |           | ug/kg | 31.9 | 2.62 | A      |
| Aroclor 1268   | ND     |           | ug/kg | 31.9 | 2.26 | A      |
| PCBs, Total  | ND     |           | ug/kg | 31.9 | 2.26 | A      |

| Surrogate                    | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|------------------------------|-----------|-----------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 89        |           | 30-150                 | A      |
| Decachlorobiphenyl           | 78        |           | 30-150                 | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 92        |           | 30-150                 | B      |
| Decachlorobiphenyl           | 82        |           | 30-150                 | B      |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits | Column |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 01,04-05,08-09,11-12 Batch: WG1023773-2 WG1023773-3 |                  |      |                   |      |                     |     |      |               |        |
| Aroclor 1016  | 74               |      | 85                |      | 40-140              | 14  |      | 50            | A      |
| Aroclor 1260  | 67               |      | 75                |      | 40-140              | 11  |      | 50            | A      |

| Surrogate                    | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria | Column |
|------------------------------|------------------|------|-------------------|------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 90               |      | 96                |      | 30-150                 | A      |
| Decachlorobiphenyl           | 77               |      | 85                |      | 30-150                 | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 92               |      | 99                |      | 30-150                 | B      |
| Decachlorobiphenyl           | 81               |      | 89                |      | 30-150                 | B      |



**Matrix Spike Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17

| <b>Parameter</b>  | <b>Native Sample</b> | <b>MS Added</b> | <b>MS Found</b> | <b>MS %Recovery</b> | <b>Qual</b> | <b>MSD Found</b> | <b>MSD %Recovery</b> | <b>Qual</b> | <b>Recovery Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD Limits</b> | <b>Column</b> |
|---|----------------------|-----------------|-----------------|---------------------|-------------|------------------|----------------------|-------------|------------------------|------------|-------------|-------------------|---------------|
| Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 01,04-05,08-09,11-12 QC Batch ID: WG1023773-4 WG1023773-5 QC Sample: L1724590-01 Client ID: TP-14 |                      |                 |                 |                     |             |                  |                      |             |                        |            |             |                   |               |
| Aroclor 1016  | ND                   | 231             | 175             | 76                  |             | 137              | 60                   |             | 40-140                 | 24         |             | 50                | A             |
| Aroclor 1260  | ND                   | 231             | 142             | 62                  |             | 135              | 59                   |             | 40-140                 | 5          |             | 50                | A             |

| <b>Surrogate</b>             | <b>MS % Recovery</b> | <b>Qualifier</b> | <b>MSD % Recovery</b> | <b>Qualifier</b> | <b>Acceptance Criteria</b> | <b>Column</b> |
|------------------------------|----------------------|------------------|-----------------------|------------------|----------------------------|---------------|
| 2,4,5,6-Tetrachloro-m-xylene | 88                   |                  | 58                    |                  | 30-150                     | A             |
| Decachlorobiphenyl           | 62                   |                  | 58                    |                  | 30-150                     | A             |
| 2,4,5,6-Tetrachloro-m-xylene | 89                   |                  | 60                    |                  | 30-150                     | B             |
| Decachlorobiphenyl           | 65                   |                  | 62                    |                  | 30-150                     | B             |

# PESTICIDES

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-01

Client ID: TP-14

Sample Location: Not Specified

Date Collected: 07/18/17 09:40

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Matrix: Soil

Extraction Date: 07/19/17 10:01

Analytical Method: 1,8081B

Cleanup Method: EPA 3620B

Analytical Date: 07/22/17 14:21

Cleanup Date: 07/20/17

Analyst: JW

Percent Solids: 87%

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Delta-BHC   | ND     |           | ug/kg | 1.78  | 0.349 | 1               | A      |
| Lindane   | ND     |           | ug/kg | 0.742 | 0.332 | 1               | A      |
| Alpha-BHC   | ND     |           | ug/kg | 0.742 | 0.211 | 1               | A      |
| Beta-BHC  | ND     |           | ug/kg | 1.78  | 0.676 | 1               | A      |
| Heptachlor  | ND     |           | ug/kg | 0.891 | 0.399 | 1               | A      |
| Aldrin  | ND     |           | ug/kg | 1.78  | 0.627 | 1               | A      |
| Heptachlor epoxide                                | ND     |           | ug/kg | 3.34  | 1.00  | 1               | A      |
| Endrin  | ND     |           | ug/kg | 0.742 | 0.304 | 1               | A      |
| Endrin aldehyde                                   | ND     |           | ug/kg | 2.23  | 0.780 | 1               | A      |
| Endrin ketone                                     | ND     |           | ug/kg | 1.78  | 0.459 | 1               | A      |
| Dieldrin  | ND     |           | ug/kg | 1.11  | 0.557 | 1               | A      |
| 4,4'-DDE  | ND     |           | ug/kg | 1.78  | 0.412 | 1               | A      |
| 4,4'-DDD  | ND     |           | ug/kg | 1.78  | 0.636 | 1               | A      |
| 4,4'-DDT  | ND     |           | ug/kg | 3.34  | 1.43  | 1               | A      |
| Endosulfan I                                      | ND     |           | ug/kg | 1.78  | 0.421 | 1               | A      |
| Endosulfan II                                     | ND     |           | ug/kg | 1.78  | 0.595 | 1               | A      |
| Endosulfan sulfate                                | ND     |           | ug/kg | 0.742 | 0.353 | 1               | A      |
| Methoxychlor                                      | ND     |           | ug/kg | 3.34  | 1.04  | 1               | A      |
| Toxaphene   | ND     |           | ug/kg | 33.4  | 9.36  | 1               | A      |
| cis-Chlordane                                     | ND     |           | ug/kg | 2.23  | 0.621 | 1               | A      |
| trans-Chlordane                                   | ND     |           | ug/kg | 2.23  | 0.588 | 1               | A      |
| Chlordane   | ND     |           | ug/kg | 14.5  | 5.90  | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 55         |           | 30-150              | B      |
| Decachlorobiphenyl           | 51         |           | 30-150              | B      |
| 2,4,5,6-Tetrachloro-m-xylene | 60         |           | 30-150              | A      |
| Decachlorobiphenyl           | 48         |           | 30-150              | A      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

**SAMPLE RESULTS**

**Lab ID:** L1724590-01  
**Client ID:** TP-14  
**Sample Location:** Not Specified  
  
**Matrix:** Soil  
**Analytical Method:** 1,8151A  
**Analytical Date:** 07/20/17 20:34  
**Analyst:** TQ  
**Percent Solids:** 87%  
**Methylation Date:** 07/20/17 08:55

**Date Collected:** 07/18/17 09:40  
**Date Received:** 07/18/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 8151A  
**Extraction Date:** 07/19/17 16:00

| Parameter                                      | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|--|--------|-----------|-------|------|------|-----------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab |        |           |       |      |      |                 |        |
| MCPPP  | ND     |           | ug/kg | 3780 | 1190 | 1               | A      |
| MCPA   | ND     |           | ug/kg | 3780 | 1070 | 1               | A      |
| Dalapon  | ND     |           | ug/kg | 37.8 | 12.4 | 1               | A      |
| Dicamba  | ND     |           | ug/kg | 37.8 | 6.35 | 1               | A      |
| Dichloroprop                                   | ND     |           | ug/kg | 37.8 | 10.8 | 1               | A      |
| 2,4-D  | ND     |           | ug/kg | 189  | 11.9 | 1               | A      |
| 2,4-DB   | ND     |           | ug/kg | 189  | 9.71 | 1               | A      |
| 2,4,5-T  | ND     |           | ug/kg | 189  | 5.86 | 1               | A      |
| 2,4,5-TP (Silvex)                              | ND     |           | ug/kg | 189  | 5.02 | 1               | A      |
| Dinoseb  | ND     |           | ug/kg | 37.8 | 4.65 | 1               | A      |

| Surrogate | % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|------------|-----------|---------------------|--------|
| DCAA      | 97         |           | 30-150              | A      |
| DCAA      | 94         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-04

Client ID: TP-18

Sample Location: Not Specified

Date Collected: 07/18/17 11:30

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Matrix: Soil

Extraction Date: 07/19/17 10:01

Analytical Method: 1,8081B

Cleanup Method: EPA 3620B

Analytical Date: 07/22/17 14:52

Cleanup Date: 07/20/17

Analyst: JW

Percent Solids: 85%

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Delta-BHC   | ND     |           | ug/kg | 1.86  | 0.363 | 1               | A      |
| Lindane   | ND     |           | ug/kg | 0.773 | 0.346 | 1               | A      |
| Alpha-BHC   | ND     |           | ug/kg | 0.773 | 0.220 | 1               | A      |
| Beta-BHC  | ND     |           | ug/kg | 1.86  | 0.704 | 1               | A      |
| Heptachlor  | ND     |           | ug/kg | 0.928 | 0.416 | 1               | A      |
| Aldrin  | ND     |           | ug/kg | 1.86  | 0.653 | 1               | A      |
| Heptachlor epoxide                                | ND     |           | ug/kg | 3.48  | 1.04  | 1               | A      |
| Endrin  | ND     |           | ug/kg | 0.773 | 0.317 | 1               | A      |
| Endrin aldehyde                                   | ND     |           | ug/kg | 2.32  | 0.812 | 1               | A      |
| Endrin ketone                                     | ND     |           | ug/kg | 1.86  | 0.478 | 1               | A      |
| Dieldrin  | ND     |           | ug/kg | 1.16  | 0.580 | 1               | A      |
| 4,4'-DDE  | ND     |           | ug/kg | 1.86  | 0.429 | 1               | A      |
| 4,4'-DDD  | ND     |           | ug/kg | 1.86  | 0.662 | 1               | A      |
| 4,4'-DDT  | ND     |           | ug/kg | 3.48  | 1.49  | 1               | A      |
| Endosulfan I                                      | ND     |           | ug/kg | 1.86  | 0.438 | 1               | A      |
| Endosulfan II                                     | ND     |           | ug/kg | 1.86  | 0.620 | 1               | A      |
| Endosulfan sulfate                                | ND     |           | ug/kg | 0.773 | 0.368 | 1               | A      |
| Methoxychlor                                      | ND     |           | ug/kg | 3.48  | 1.08  | 1               | A      |
| Toxaphene   | ND     |           | ug/kg | 34.8  | 9.74  | 1               | A      |
| cis-Chlordane                                     | ND     |           | ug/kg | 2.32  | 0.646 | 1               | A      |
| trans-Chlordane                                   | ND     |           | ug/kg | 2.32  | 0.612 | 1               | A      |
| Chlordane   | ND     |           | ug/kg | 15.1  | 6.15  | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 57         |           | 30-150              | B      |
| Decachlorobiphenyl           | 54         |           | 30-150              | B      |
| 2,4,5,6-Tetrachloro-m-xylene | 62         |           | 30-150              | A      |
| Decachlorobiphenyl           | 53         |           | 30-150              | A      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

**SAMPLE RESULTS**

**Lab ID:** L1724590-04  
**Client ID:** TP-18  
**Sample Location:** Not Specified  
  
**Matrix:** Soil  
**Analytical Method:** 1,8151A  
**Analytical Date:** 07/20/17 20:54  
**Analyst:** TQ  
**Percent Solids:** 85%  
**Methylation Date:** 07/20/17 08:55

**Date Collected:** 07/18/17 11:30  
**Date Received:** 07/18/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 8151A  
**Extraction Date:** 07/19/17 16:00

| Parameter                                      | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|--|--------|-----------|-------|------|------|-----------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab |        |           |       |      |      |                 |        |
| MCPPP  | ND     |           | ug/kg | 3910 | 1230 | 1               | A      |
| MCPA   | ND     |           | ug/kg | 3910 | 1100 | 1               | A      |
| Dalapon  | ND     |           | ug/kg | 39.1 | 12.8 | 1               | A      |
| Dicamba  | ND     |           | ug/kg | 39.1 | 6.56 | 1               | A      |
| Dichloroprop                                   | ND     |           | ug/kg | 39.1 | 11.2 | 1               | A      |
| 2,4-D  | ND     |           | ug/kg | 195  | 12.3 | 1               | A      |
| 2,4-DB   | ND     |           | ug/kg | 195  | 10.0 | 1               | A      |
| 2,4,5-T  | ND     |           | ug/kg | 195  | 6.06 | 1               | A      |
| 2,4,5-TP (Silvex)                              | ND     |           | ug/kg | 195  | 5.20 | 1               | A      |
| Dinoseb  | ND     |           | ug/kg | 39.1 | 4.80 | 1               | A      |

| Surrogate | % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|------------|-----------|---------------------|--------|
| DCAA      | 93         |           | 30-150              | A      |
| DCAA      | 119        |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-08

Client ID: BLINDDUP

Sample Location: Not Specified

Date Collected: 07/18/17 12:00

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Matrix: Soil

Extraction Date: 07/19/17 10:01

Analytical Method: 1,8081B

Cleanup Method: EPA 3620B

Analytical Date: 07/22/17 15:07

Cleanup Date: 07/20/17

Analyst: JW

Percent Solids: 87%

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Delta-BHC   | ND     |           | ug/kg | 1.77  | 0.347 | 1               | A      |
| Lindane   | ND     |           | ug/kg | 0.739 | 0.330 | 1               | A      |
| Alpha-BHC   | ND     |           | ug/kg | 0.739 | 0.210 | 1               | A      |
| Beta-BHC  | ND     |           | ug/kg | 1.77  | 0.672 | 1               | A      |
| Heptachlor  | ND     |           | ug/kg | 0.887 | 0.398 | 1               | A      |
| Aldrin  | ND     |           | ug/kg | 1.77  | 0.624 | 1               | A      |
| Heptachlor epoxide                                | ND     |           | ug/kg | 3.32  | 0.998 | 1               | A      |
| Endrin  | ND     |           | ug/kg | 0.739 | 0.303 | 1               | A      |
| Endrin aldehyde                                   | ND     |           | ug/kg | 2.22  | 0.776 | 1               | A      |
| Endrin ketone                                     | ND     |           | ug/kg | 1.77  | 0.457 | 1               | A      |
| Dieldrin  | ND     |           | ug/kg | 1.11  | 0.554 | 1               | A      |
| 4,4'-DDE  | ND     |           | ug/kg | 1.77  | 0.410 | 1               | A      |
| 4,4'-DDD  | ND     |           | ug/kg | 1.77  | 0.632 | 1               | A      |
| 4,4'-DDT  | ND     |           | ug/kg | 3.32  | 1.43  | 1               | A      |
| Endosulfan I                                      | ND     |           | ug/kg | 1.77  | 0.419 | 1               | A      |
| Endosulfan II                                     | ND     |           | ug/kg | 1.77  | 0.593 | 1               | A      |
| Endosulfan sulfate                                | ND     |           | ug/kg | 0.739 | 0.352 | 1               | A      |
| Methoxychlor                                      | ND     |           | ug/kg | 3.32  | 1.03  | 1               | A      |
| Toxaphene   | ND     |           | ug/kg | 33.2  | 9.31  | 1               | A      |
| cis-Chlordane                                     | ND     |           | ug/kg | 2.22  | 0.618 | 1               | A      |
| trans-Chlordane                                   | ND     |           | ug/kg | 2.22  | 0.585 | 1               | A      |
| Chlordane   | ND     |           | ug/kg | 14.4  | 5.87  | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 59         |           | 30-150              | B      |
| Decachlorobiphenyl           | 55         |           | 30-150              | B      |
| 2,4,5,6-Tetrachloro-m-xylene | 60         |           | 30-150              | A      |
| Decachlorobiphenyl           | 46         |           | 30-150              | A      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

**SAMPLE RESULTS**

**Lab ID:** L1724590-08  
**Client ID:** BLINDDUP  
**Sample Location:** Not Specified  
  
**Matrix:** Soil  
**Analytical Method:** 1,8151A  
**Analytical Date:** 07/20/17 21:14  
**Analyst:** TQ  
**Percent Solids:** 87%  
**Methylation Date:** 07/20/17 08:55

**Date Collected:** 07/18/17 12:00  
**Date Received:** 07/18/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 8151A  
**Extraction Date:** 07/19/17 16:00

| Parameter                                      | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|--|--------|-----------|-------|------|------|-----------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab |        |           |       |      |      |                 |        |
| MCPPP  | ND     |           | ug/kg | 3730 | 1180 | 1               | A      |
| MCPA   | ND     |           | ug/kg | 3730 | 1060 | 1               | A      |
| Dalapon  | ND     |           | ug/kg | 37.3 | 12.2 | 1               | A      |
| Dicamba  | ND     |           | ug/kg | 37.3 | 6.27 | 1               | A      |
| Dichloroprop                                   | ND     |           | ug/kg | 37.3 | 10.7 | 1               | A      |
| 2,4-D  | ND     |           | ug/kg | 186  | 11.8 | 1               | A      |
| 2,4-DB   | ND     |           | ug/kg | 186  | 9.59 | 1               | A      |
| 2,4,5-T  | ND     |           | ug/kg | 186  | 5.78 | 1               | A      |
| 2,4,5-TP (Silvex)                              | ND     |           | ug/kg | 186  | 4.96 | 1               | A      |
| Dinoseb  | ND     |           | ug/kg | 37.3 | 4.59 | 1               | A      |

| Surrogate | % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|------------|-----------|---------------------|--------|
| DCAA      | 100        |           | 30-150              | A      |
| DCAA      | 122        |           | 30-150              | B      |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**SAMPLE RESULTS**

Lab ID: L1724590-11

Client ID: NS-3

Sample Location: Not Specified

Date Collected: 07/18/17 14:30

Date Received: 07/18/17

Field Prep: Not Specified

Extraction Method: EPA 3546

Matrix: Soil

Extraction Date: 07/19/17 10:01

Analytical Method: 1,8081B

Cleanup Method: EPA 3620B

Analytical Date: 07/22/17 16:56

Cleanup Date: 07/20/17

Analyst: JW

Percent Solids: 88%

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Delta-BHC   | ND     |           | ug/kg | 1.79  | 0.351 | 1               | A      |
| Lindane   | ND     |           | ug/kg | 0.746 | 0.334 | 1               | A      |
| Alpha-BHC   | ND     |           | ug/kg | 0.746 | 0.212 | 1               | A      |
| Beta-BHC  | ND     |           | ug/kg | 1.79  | 0.679 | 1               | A      |
| Heptachlor  | ND     |           | ug/kg | 0.895 | 0.401 | 1               | A      |
| Aldrin  | ND     |           | ug/kg | 1.79  | 0.630 | 1               | A      |
| Heptachlor epoxide                                | ND     |           | ug/kg | 3.36  | 1.01  | 1               | A      |
| Endrin  | ND     |           | ug/kg | 0.746 | 0.306 | 1               | A      |
| Endrin aldehyde                                   | ND     |           | ug/kg | 2.24  | 0.783 | 1               | A      |
| Endrin ketone                                     | ND     |           | ug/kg | 1.79  | 0.461 | 1               | A      |
| Dieldrin  | ND     |           | ug/kg | 1.12  | 0.560 | 1               | A      |
| 4,4'-DDE  | ND     |           | ug/kg | 1.79  | 0.414 | 1               | A      |
| 4,4'-DDD  | ND     |           | ug/kg | 1.79  | 0.639 | 1               | A      |
| 4,4'-DDT  | ND     |           | ug/kg | 3.36  | 1.44  | 1               | A      |
| Endosulfan I                                      | ND     |           | ug/kg | 1.79  | 0.423 | 1               | A      |
| Endosulfan II                                     | ND     |           | ug/kg | 1.79  | 0.598 | 1               | A      |
| Endosulfan sulfate                                | ND     |           | ug/kg | 0.746 | 0.355 | 1               | A      |
| Methoxychlor                                      | ND     |           | ug/kg | 3.36  | 1.04  | 1               | A      |
| Toxaphene   | ND     |           | ug/kg | 33.6  | 9.40  | 1               | A      |
| cis-Chlordane                                     | ND     |           | ug/kg | 2.24  | 0.624 | 1               | A      |
| trans-Chlordane                                   | ND     |           | ug/kg | 2.24  | 0.591 | 1               | A      |
| Chlordane   | ND     |           | ug/kg | 14.5  | 5.93  | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 59         |           | 30-150              | B      |
| Decachlorobiphenyl           | 88         |           | 30-150              | B      |
| 2,4,5,6-Tetrachloro-m-xylene | 75         |           | 30-150              | A      |
| Decachlorobiphenyl           | 83         |           | 30-150              | A      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

**SAMPLE RESULTS**

**Lab ID:** L1724590-11  
**Client ID:** NS-3  
**Sample Location:** Not Specified  
  
**Matrix:** Soil  
**Analytical Method:** 1,8151A  
**Analytical Date:** 07/20/17 21:33  
**Analyst:** TQ  
**Percent Solids:** 88%  
**Methylation Date:** 07/20/17 08:55

**Date Collected:** 07/18/17 14:30  
**Date Received:** 07/18/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 8151A  
**Extraction Date:** 07/19/17 16:00

| Parameter                                      | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|--|--------|-----------|-------|------|------|-----------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab |        |           |       |      |      |                 |        |
| MCPPP  | ND     |           | ug/kg | 3750 | 1180 | 1               | A      |
| MCPA   | ND     |           | ug/kg | 3750 | 1060 | 1               | A      |
| Dalapon  | ND     |           | ug/kg | 37.5 | 12.3 | 1               | A      |
| Dicamba  | ND     |           | ug/kg | 37.5 | 6.30 | 1               | A      |
| Dichloroprop                                   | ND     |           | ug/kg | 37.5 | 10.8 | 1               | A      |
| 2,4-D  | ND     |           | ug/kg | 188  | 11.8 | 1               | B      |
| 2,4-DB   | ND     |           | ug/kg | 188  | 9.64 | 1               | A      |
| 2,4,5-T  | ND     |           | ug/kg | 188  | 5.81 | 1               | A      |
| 2,4,5-TP (Silvex)                              | ND     |           | ug/kg | 188  | 4.99 | 1               | A      |
| Dinoseb  | ND     |           | ug/kg | 37.5 | 4.61 | 1               | A      |

| Surrogate | % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|------------|-----------|---------------------|--------|
| DCAA      | 100        |           | 30-150              | A      |
| DCAA      | 124        |           | 30-150              | B      |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8081B  
 Analytical Date: 07/22/17 13:05  
 Analyst: JW

Extraction Method: EPA 3546  
 Extraction Date: 07/19/17 10:01  
 Cleanup Method: EPA 3620B  
 Cleanup Date: 07/20/17

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Column |
|---|--------|-----------|-------|-------|-------|--------|
| Organochlorine Pesticides by GC - Westborough Lab for sample(s): 01,04,08,11 Batch: WG1023817-1 |        |           |       |       |       |        |
| Delta-BHC   | ND     |           | ug/kg | 1.53  | 0.300 | A      |
| Lindane   | ND     |           | ug/kg | 0.638 | 0.285 | A      |
| Alpha-BHC   | ND     |           | ug/kg | 0.638 | 0.181 | A      |
| Beta-BHC  | ND     |           | ug/kg | 1.53  | 0.581 | A      |
| Heptachlor  | ND     |           | ug/kg | 0.766 | 0.343 | A      |
| Aldrin  | ND     |           | ug/kg | 1.53  | 0.539 | A      |
| Heptachlor epoxide  | ND     |           | ug/kg | 2.87  | 0.862 | A      |
| Endrin  | ND     |           | ug/kg | 0.638 | 0.262 | A      |
| Endrin aldehyde   | ND     |           | ug/kg | 1.91  | 0.670 | A      |
| Endrin ketone   | ND     |           | ug/kg | 1.53  | 0.394 | A      |
| Dieldrin  | ND     |           | ug/kg | 0.957 | 0.479 | A      |
| 4,4'-DDE  | ND     |           | ug/kg | 1.53  | 0.354 | A      |
| 4,4'-DDD  | ND     |           | ug/kg | 1.53  | 0.546 | A      |
| 4,4'-DDT  | ND     |           | ug/kg | 2.87  | 1.23  | A      |
| Endosulfan I  | ND     |           | ug/kg | 1.53  | 0.362 | A      |
| Endosulfan II   | ND     |           | ug/kg | 1.53  | 0.512 | A      |
| Endosulfan sulfate  | ND     |           | ug/kg | 0.638 | 0.304 | A      |
| Methoxychlor  | ND     |           | ug/kg | 2.87  | 0.893 | A      |
| Toxaphene   | ND     |           | ug/kg | 28.7  | 8.04  | A      |
| cis-Chlordane   | ND     |           | ug/kg | 1.91  | 0.534 | A      |
| trans-Chlordane   | ND     |           | ug/kg | 1.91  | 0.505 | A      |
| Chlordane   | ND     |           | ug/kg | 12.4  | 5.07  | A      |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8081B  
 Analytical Date: 07/22/17 13:05  
 Analyst: JW

Extraction Method: EPA 3546  
 Extraction Date: 07/19/17 10:01  
 Cleanup Method: EPA 3620B  
 Cleanup Date: 07/20/17

| Parameter   | Result | Qualifier | Units | RL | MDL | Column |
|---|--------|-----------|-------|----|-----|--------|
| Organochlorine Pesticides by GC - Westborough Lab for sample(s): 01,04,08,11 Batch: WG1023817-1 |        |           |       |    |     |        |

| Surrogate                    | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|------------------------------|-----------|-----------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 59        |           | 30-150                 | B      |
| Decachlorobiphenyl           | 60        |           | 30-150                 | B      |
| 2,4,5,6-Tetrachloro-m-xylene | 68        |           | 30-150                 | A      |
| Decachlorobiphenyl           | 50        |           | 30-150                 | A      |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8151A  
 Analytical Date: 07/20/17 12:04  
 Analyst: CD

Extraction Method: EPA 8151A  
 Extraction Date: 07/19/17 16:00

Methylation Date: 07/20/17 08:55

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Column |
|--|--------|-----------|-------|------|------|--------|
| Chlorinated Herbicides by GC - Westborough Lab for sample(s): 01,04,08,11 Batch: WG1023826-1 |        |           |       |      |      |        |
| MCPP   | ND     |           | ug/kg | 3240 | 1020 | A      |
| MCPA   | ND     |           | ug/kg | 3240 | 918. | A      |
| Dalapon  | ND     |           | ug/kg | 32.4 | 10.6 | A      |
| Dicamba  | ND     |           | ug/kg | 32.4 | 5.45 | A      |
| Dichloroprop   | ND     |           | ug/kg | 32.4 | 9.31 | A      |
| 2,4-D  | ND     |           | ug/kg | 162  | 10.2 | A      |
| 2,4-DB   | ND     |           | ug/kg | 162  | 8.34 | A      |
| 2,4,5-T  | ND     |           | ug/kg | 162  | 5.03 | A      |
| 2,4,5-TP (Silvex)  | ND     |           | ug/kg | 162  | 4.31 | A      |
| Dinoseb  | ND     |           | ug/kg | 32.4 | 3.99 | A      |

| Surrogate | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|-----------|-----------|-----------|------------------------|--------|
| DCAA      | 88        |           | 30-150                 | A      |
| DCAA      | 107       |           | 30-150                 | B      |

## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits | Column |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01,04,08,11 Batch: WG1023817-2 WG1023817-3 |                  |      |                   |      |                     |     |      |               |        |
| Delta-BHC  | 74               |      | 75                |      | 30-150              | 1   |      | 30            | A      |
| Lindane  | 69               |      | 70                |      | 30-150              | 1   |      | 30            | A      |
| Alpha-BHC  | 74               |      | 73                |      | 30-150              | 1   |      | 30            | A      |
| Beta-BHC   | 64               |      | 64                |      | 30-150              | 0   |      | 30            | A      |
| Heptachlor   | 68               |      | 66                |      | 30-150              | 3   |      | 30            | A      |
| Aldrin   | 69               |      | 70                |      | 30-150              | 1   |      | 30            | A      |
| Heptachlor epoxide   | 69               |      | 70                |      | 30-150              | 1   |      | 30            | A      |
| Endrin   | 80               |      | 81                |      | 30-150              | 1   |      | 30            | A      |
| Endrin aldehyde  | 43               |      | 45                |      | 30-150              | 5   |      | 30            | A      |
| Endrin ketone  | 57               |      | 60                |      | 30-150              | 5   |      | 30            | A      |
| Dieldrin   | 71               |      | 72                |      | 30-150              | 1   |      | 30            | A      |
| 4,4'-DDE   | 70               |      | 71                |      | 30-150              | 1   |      | 30            | A      |
| 4,4'-DDD   | 69               |      | 70                |      | 30-150              | 1   |      | 30            | A      |
| 4,4'-DDT   | 68               |      | 69                |      | 30-150              | 1   |      | 30            | A      |
| Endosulfan I   | 66               |      | 66                |      | 30-150              | 0   |      | 30            | A      |
| Endosulfan II  | 65               |      | 66                |      | 30-150              | 2   |      | 30            | A      |
| Endosulfan sulfate   | 53               |      | 54                |      | 30-150              | 2   |      | 30            | A      |
| Methoxychlor   | 84               |      | 85                |      | 30-150              | 1   |      | 30            | A      |
| cis-Chlordane  | 66               |      | 68                |      | 30-150              | 3   |      | 30            | A      |
| trans-Chlordane  | 68               |      | 69                |      | 30-150              | 1   |      | 30            | A      |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1724590

**Project Number:** 0239-016-001

**Report Date:** 07/25/17

| <b>Parameter</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|

Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01,04,08,11 Batch: WG1023817-2 WG1023817-3

| <b>Surrogate</b>             | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> | <b>Column</b> |
|------------------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|---------------|
| 2,4,5,6-Tetrachloro-m-xylene | 61                       |             | 59                        |             | 30-150                         | B             |
| Decachlorobiphenyl           | 59                       |             | 58                        |             | 30-150                         | B             |
| 2,4,5,6-Tetrachloro-m-xylene | 64                       |             | 64                        |             | 30-150                         | A             |
| Decachlorobiphenyl           | 47                       |             | 52                        |             | 30-150                         | A             |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits | Column |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab Associated sample(s): 01,04,08,11 Batch: WG1023826-2 WG1023826-3 |                  |      |                   |      |                     |     |      |               |        |
| MCPP  | 145              |      | 138               |      | 30-150              | 5   |      | 30            | A      |
| MCPA  | 112              |      | 110               |      | 30-150              | 2   |      | 30            | A      |
| Dalapon   | 69               |      | 72                |      | 30-150              | 4   |      | 30            | A      |
| Dicamba   | 92               |      | 95                |      | 30-150              | 3   |      | 30            | A      |
| Dichloroprop  | 98               |      | 95                |      | 30-150              | 3   |      | 30            | A      |
| 2,4-D   | 101              |      | 112               |      | 30-150              | 10  |      | 30            | A      |
| 2,4-DB  | 89               |      | 96                |      | 30-150              | 8   |      | 30            | A      |
| 2,4,5-T   | 93               |      | 96                |      | 30-150              | 3   |      | 30            | A      |
| 2,4,5-TP (Silvex)   | 90               |      | 95                |      | 30-150              | 5   |      | 30            | A      |
| Dinoseb   | 7                | Q    | 11                | Q    | 30-150              | 46  | Q    | 30            | A      |

| Surrogate | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria | Column |
|-----------|------------------|------|-------------------|------|------------------------|--------|
| DCAA      | 88               |      | 90                |      | 30-150                 | A      |
| DCAA      | 120              |      | 123               |      | 30-150                 | B      |



# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits | Column |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01,04,08,11 QC Batch ID: WG1023817-4 WG1023817-5 QC Sample: L1724590-01 Client ID: TP-14 |               |          |          |              |      |           |               |      |                 |     |      |            |        |
| Delta-BHC  | ND            | 36.4     | 26.1     | 72           |      | 25.8      | 70            |      | 30-150          | 1   |      | 50         | A      |
| Lindane  | ND            | 36.4     | 24.1     | 66           |      | 24.4      | 66            |      | 30-150          | 1   |      | 50         | A      |
| Alpha-BHC  | ND            | 36.4     | 24.9     | 68           |      | 25.1      | 68            |      | 30-150          | 1   |      | 50         | A      |
| Beta-BHC   | ND            | 36.4     | 22.7     | 62           |      | 22.6      | 61            |      | 30-150          | 0   |      | 50         | A      |
| Heptachlor   | ND            | 36.4     | 23.1     | 64           |      | 23.6      | 64            |      | 30-150          | 2   |      | 50         | A      |
| Aldrin   | ND            | 36.4     | 23.8     | 65           |      | 23.8      | 64            |      | 30-150          | 0   |      | 50         | A      |
| Heptachlor epoxide   | ND            | 36.4     | 24.0     | 66           |      | 23.9      | 65            |      | 30-150          | 0   |      | 50         | A      |
| Endrin   | ND            | 36.4     | 27.6     | 76           |      | 27.6      | 75            |      | 30-150          | 0   |      | 50         | A      |
| Endrin aldehyde  | ND            | 36.4     | 15.2     | 42           |      | 15.1      | 41            |      | 30-150          | 1   |      | 50         | A      |
| Endrin ketone  | ND            | 36.4     | 21.0     | 58           |      | 20.7      | 56            |      | 30-150          | 1   |      | 50         | A      |
| Dieldrin   | ND            | 36.4     | 24.6     | 68           |      | 24.6      | 66            |      | 30-150          | 0   |      | 50         | A      |
| 4,4'-DDE   | ND            | 36.4     | 24.1     | 66           |      | 23.9      | 65            |      | 30-150          | 1   |      | 50         | A      |
| 4,4'-DDD   | ND            | 36.4     | 24.4     | 67           |      | 24.1      | 65            |      | 30-150          | 1   |      | 50         | A      |
| 4,4'-DDT   | ND            | 36.4     | 23.9     | 66           |      | 23.6      | 64            |      | 30-150          | 1   |      | 50         | A      |
| Endosulfan I   | ND            | 36.4     | 22.8     | 63           |      | 22.7      | 61            |      | 30-150          | 0   |      | 50         | A      |
| Endosulfan II  | ND            | 36.4     | 22.8     | 63           |      | 22.7      | 61            |      | 30-150          | 0   |      | 50         | A      |
| Endosulfan sulfate   | ND            | 36.4     | 18.9     | 52           |      | 19.0      | 51            |      | 30-150          | 1   |      | 50         | A      |
| Methoxychlor   | ND            | 36.4     | 29.4     | 81           |      | 29.2      | 79            |      | 30-150          | 1   |      | 50         | A      |
| cis-Chlordane  | ND            | 36.4     | 23.6     | 65           |      | 23.4      | 63            |      | 30-150          | 1   |      | 50         | A      |
| trans-Chlordane  | ND            | 36.4     | 23.7     | 65           |      | 23.5      | 63            |      | 30-150          | 1   |      | 50         | A      |

**Matrix Spike Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17

| <b>Parameter</b>  | <b>Native Sample</b> | <b>MS Added</b> | <b>MS Found</b> | <b>MS %Recovery</b> | <b>Qual</b> | <b>MSD Found</b> | <b>MSD %Recovery</b> | <b>Qual</b> | <b>Recovery Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD Limits</b> |
|---|----------------------|-----------------|-----------------|---------------------|-------------|------------------|----------------------|-------------|------------------------|------------|-------------|-------------------|
| Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01,04,08,11 QC Batch ID: WG1023817-4 WG1023817-5 QC Sample: L1724590-01<br>Client ID: TP-14 |                      |                 |                 |                     |             |                  |                      |             |                        |            |             |                   |

| <b>Surrogate</b>             | <b>MS</b>         |                  | <b>MSD</b>        |                  | <b>Acceptance Criteria</b> | <b>Column</b> |
|------------------------------|-------------------|------------------|-------------------|------------------|----------------------------|---------------|
|                              | <b>% Recovery</b> | <b>Qualifier</b> | <b>% Recovery</b> | <b>Qualifier</b> |                            |               |
| 2,4,5,6-Tetrachloro-m-xylene | 56                |                  | 56                |                  | 30-150                     | B             |
| Decachlorobiphenyl           | 54                |                  | 53                |                  | 30-150                     | B             |
| 2,4,5,6-Tetrachloro-m-xylene | 64                |                  | 62                |                  | 30-150                     | A             |
| Decachlorobiphenyl           | 49                |                  | 46                |                  | 30-150                     | A             |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter   | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits | Column |
|---|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab Associated sample(s): 01,04,08,11 QC Batch ID: WG1023826-4 WG1023826-5 QC Sample: L1724590-01 Client ID: TP-14 |               |          |          |              |      |           |               |      |                 |     |      |            |        |
| MCPP  | ND            | 38100    | 56200    | 147          |      | 50400     | 134           |      | 30-150          | 11  |      | 30         | A      |
| MCPA  | ND            | 38100    | 46200    | 121          |      | 40700     | 108           |      | 30-150          | 13  |      | 30         | A      |
| Dalapon   | ND            | 381      | 316      | 83           |      | 286       | 76            |      | 30-150          | 10  |      | 30         | A      |
| Dicamba   | ND            | 381      | 400      | 105          |      | 331       | 88            |      | 30-150          | 19  |      | 30         | A      |
| Dichloroprop  | ND            | 381      | 423      | 111          |      | 344       | 91            |      | 30-150          | 21  |      | 30         | A      |
| 2,4-D   | ND            | 381      | 408      | 107          |      | 341       | 91            |      | 30-150          | 18  |      | 30         | A      |
| 2,4-DB  | ND            | 381      | 413      | 108          |      | 368       | 98            |      | 30-150          | 12  |      | 30         | A      |
| 2,4,5-T   | ND            | 381      | 393      | 103          |      | 316       | 84            |      | 30-150          | 22  |      | 30         | A      |
| 2,4,5-TP (Silvex)   | ND            | 381      | 386      | 101          |      | 312       | 83            |      | 30-150          | 21  |      | 30         | A      |
| Dinoseb   | ND            | 381      | 23.6J    | 6            | Q    | 6.78J     | 2             | Q    | 30-150          | 111 | Q    | 30         | A      |

| Surrogate | MS % Recovery | Qualifier | MSD % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|---------------|-----------|----------------|-----------|---------------------|--------|
| DCAA      | 96            |           | 83             |           | 30-150              | A      |
| DCAA      | 126           |           | 106            |           | 30-150              | B      |

## METALS

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-01

Date Collected: 07/18/17 09:40

Client ID: TP-14

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 87%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 4860   |           | mg/kg | 9.09  | 2.45  | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | ND     |           | mg/kg | 4.54  | 0.345 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 1.02   |           | mg/kg | 0.909 | 0.189 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 54.7   |           | mg/kg | 0.909 | 0.158 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 0.145  | J         | mg/kg | 0.454 | 0.030 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 0.545  | J         | mg/kg | 0.909 | 0.089 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 54000  |           | mg/kg | 9.09  | 3.18  | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 8.71   |           | mg/kg | 0.909 | 0.087 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 4.27   |           | mg/kg | 1.82  | 0.151 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 10.0   |           | mg/kg | 0.909 | 0.234 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 10200  |           | mg/kg | 4.54  | 0.821 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 9.85   |           | mg/kg | 4.54  | 0.244 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 20900  |           | mg/kg | 9.09  | 1.40  | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 315    |           | mg/kg | 0.909 | 0.144 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | ND     |           | mg/kg | 0.07  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:19 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 8.85   |           | mg/kg | 2.27  | 0.220 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 1010   |           | mg/kg | 227   | 13.1  | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | ND     |           | mg/kg | 1.82  | 0.234 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | ND     |           | mg/kg | 0.909 | 0.257 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 375    |           | mg/kg | 182   | 2.86  | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | ND     |           | mg/kg | 1.82  | 0.286 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 12.8   |           | mg/kg | 0.909 | 0.184 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 47.6   |           | mg/kg | 4.54  | 0.266 | 2               | 07/19/17 20:00 | 07/21/17 20:56 | EPA 3050B   | 1,6010C           | MC      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-02

Date Collected: 07/18/17 10:00

Client ID: NS-1

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 87%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 7850   |           | mg/kg | 9.20  | 2.48  | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | 0.368  | J         | mg/kg | 4.60  | 0.350 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 5.49   |           | mg/kg | 0.920 | 0.191 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 119    |           | mg/kg | 0.920 | 0.160 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 0.304  | J         | mg/kg | 0.460 | 0.030 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 1.08   |           | mg/kg | 0.920 | 0.090 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 71400  |           | mg/kg | 9.20  | 3.22  | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 18.1   |           | mg/kg | 0.920 | 0.088 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 5.76   |           | mg/kg | 1.84  | 0.153 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 17.4   |           | mg/kg | 0.920 | 0.237 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 14900  |           | mg/kg | 4.60  | 0.831 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 87.0   |           | mg/kg | 4.60  | 0.247 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 9810   |           | mg/kg | 9.20  | 1.42  | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 1180   |           | mg/kg | 0.920 | 0.146 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | 0.15   |           | mg/kg | 0.07  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:32 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 9.78   |           | mg/kg | 2.30  | 0.223 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 834    |           | mg/kg | 230   | 13.2  | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | 0.267  | J         | mg/kg | 1.84  | 0.237 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | ND     |           | mg/kg | 0.920 | 0.260 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 296    |           | mg/kg | 184   | 2.90  | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | 0.883  | J         | mg/kg | 1.84  | 0.290 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 22.3   |           | mg/kg | 0.920 | 0.187 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 97.3   |           | mg/kg | 4.60  | 0.270 | 2               | 07/19/17 20:00 | 07/21/17 21:16 | EPA 3050B   | 1,6010C           | MC      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-03

Date Collected: 07/18/17 10:40

Client ID: TP-15

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 83%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 14400  |           | mg/kg | 9.51  | 2.57  | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | ND     |           | mg/kg | 4.75  | 0.361 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 3.93   |           | mg/kg | 0.951 | 0.198 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 108    |           | mg/kg | 0.951 | 0.165 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 0.799  |           | mg/kg | 0.475 | 0.031 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 0.628  | J         | mg/kg | 0.951 | 0.093 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 52900  |           | mg/kg | 9.51  | 3.33  | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 12.3   |           | mg/kg | 0.951 | 0.091 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 4.49   |           | mg/kg | 1.90  | 0.158 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 26.7   |           | mg/kg | 0.951 | 0.245 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 11700  |           | mg/kg | 4.75  | 0.859 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 111    |           | mg/kg | 4.75  | 0.255 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 14600  |           | mg/kg | 9.51  | 1.46  | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 717    |           | mg/kg | 0.951 | 0.151 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | 0.08   |           | mg/kg | 0.08  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:34 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 10.1   |           | mg/kg | 2.38  | 0.230 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 2200   |           | mg/kg | 238   | 13.7  | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | ND     |           | mg/kg | 1.90  | 0.245 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | ND     |           | mg/kg | 0.951 | 0.269 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 1190   |           | mg/kg | 190   | 3.00  | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | 0.675  | J         | mg/kg | 1.90  | 0.300 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 21.9   |           | mg/kg | 0.951 | 0.193 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 76.8   |           | mg/kg | 4.75  | 0.279 | 2               | 07/19/17 20:00 | 07/21/17 21:32 | EPA 3050B   | 1,6010C           | MC      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-04

Date Collected: 07/18/17 11:30

Client ID: TP-18

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 85%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 10700  |           | mg/kg | 9.24  | 2.50  | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | 0.398  | J         | mg/kg | 4.62  | 0.351 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 4.94   |           | mg/kg | 0.924 | 0.192 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 95.1   |           | mg/kg | 0.924 | 0.161 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 0.416  | J         | mg/kg | 0.462 | 0.031 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 0.934  |           | mg/kg | 0.924 | 0.091 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 53000  |           | mg/kg | 9.24  | 3.24  | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 15.0   |           | mg/kg | 0.924 | 0.089 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 8.14   |           | mg/kg | 1.85  | 0.153 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 20.1   |           | mg/kg | 0.924 | 0.238 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 17800  |           | mg/kg | 4.62  | 0.835 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 16.5   |           | mg/kg | 4.62  | 0.248 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 19100  |           | mg/kg | 9.24  | 1.42  | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 388    |           | mg/kg | 0.924 | 0.147 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | 0.05   | J         | mg/kg | 0.07  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:36 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 19.2   |           | mg/kg | 2.31  | 0.224 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 1600   |           | mg/kg | 231   | 13.3  | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | ND     |           | mg/kg | 1.85  | 0.238 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | ND     |           | mg/kg | 0.924 | 0.262 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 165    | J         | mg/kg | 185   | 2.91  | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | ND     |           | mg/kg | 1.85  | 0.291 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 21.4   |           | mg/kg | 0.924 | 0.188 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 79.9   |           | mg/kg | 4.62  | 0.271 | 2               | 07/19/17 20:00 | 07/21/17 21:36 | EPA 3050B   | 1,6010C           | MC      |





Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-05

Date Collected: 07/18/17 11:50

Client ID: TP-16

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 89%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 14600  |           | mg/kg | 8.67  | 2.34  | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | ND     |           | mg/kg | 4.33  | 0.329 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 2.21   |           | mg/kg | 0.867 | 0.180 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 103    |           | mg/kg | 0.867 | 0.151 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 2.02   |           | mg/kg | 0.433 | 0.029 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 0.538  | J         | mg/kg | 0.867 | 0.085 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 62400  |           | mg/kg | 8.67  | 3.03  | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 6.97   |           | mg/kg | 0.867 | 0.083 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 2.20   |           | mg/kg | 1.73  | 0.144 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 11.7   |           | mg/kg | 0.867 | 0.224 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 10000  |           | mg/kg | 4.33  | 0.783 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 68.6   |           | mg/kg | 4.33  | 0.232 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 12600  |           | mg/kg | 8.67  | 1.34  | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 876    |           | mg/kg | 0.867 | 0.138 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | 0.12   |           | mg/kg | 0.07  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:38 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 5.80   |           | mg/kg | 2.17  | 0.210 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 1100   |           | mg/kg | 217   | 12.5  | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | 2.06   |           | mg/kg | 1.73  | 0.224 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | ND     |           | mg/kg | 0.867 | 0.245 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 615    |           | mg/kg | 173   | 2.73  | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | 0.815  | J         | mg/kg | 1.73  | 0.273 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 8.12   |           | mg/kg | 0.867 | 0.176 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 60.3   |           | mg/kg | 4.33  | 0.254 | 2               | 07/19/17 20:00 | 07/21/17 21:40 | EPA 3050B   | 1,6010C           | MC      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-06

Date Collected: 07/18/17 12:30

Client ID: NS-2

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 73%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 12300  |           | mg/kg | 10.6  | 2.86  | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | ND     |           | mg/kg | 5.30  | 0.403 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 5.47   |           | mg/kg | 1.06  | 0.220 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 96.8   |           | mg/kg | 1.06  | 0.184 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 1.19   |           | mg/kg | 0.530 | 0.035 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 0.848  | J         | mg/kg | 1.06  | 0.104 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 60000  |           | mg/kg | 10.6  | 3.71  | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 19.8   |           | mg/kg | 1.06  | 0.102 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 4.73   |           | mg/kg | 2.12  | 0.176 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 20.2   |           | mg/kg | 1.06  | 0.273 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 14900  |           | mg/kg | 5.30  | 0.957 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 64.6   |           | mg/kg | 5.30  | 0.284 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 13700  |           | mg/kg | 10.6  | 1.63  | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 1060   |           | mg/kg | 1.06  | 0.168 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | 0.25   |           | mg/kg | 0.09  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:40 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 11.5   |           | mg/kg | 2.65  | 0.256 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 921    |           | mg/kg | 265   | 15.3  | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | 0.604  | J         | mg/kg | 2.12  | 0.273 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | ND     |           | mg/kg | 1.06  | 0.300 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 798    |           | mg/kg | 212   | 3.34  | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | 1.01   | J         | mg/kg | 2.12  | 0.334 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 20.9   |           | mg/kg | 1.06  | 0.215 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 90.8   |           | mg/kg | 5.30  | 0.310 | 2               | 07/19/17 20:00 | 07/21/17 21:44 | EPA 3050B   | 1,6010C           | MC      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-07

Date Collected: 07/18/17 13:15

Client ID: TP-13

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 86%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 5900   |           | mg/kg | 8.97  | 2.42  | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | ND     |           | mg/kg | 4.48  | 0.341 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 3.25   |           | mg/kg | 0.897 | 0.186 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 39.8   |           | mg/kg | 0.897 | 0.156 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 0.260  | J         | mg/kg | 0.448 | 0.030 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 0.655  | J         | mg/kg | 0.897 | 0.088 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 29000  |           | mg/kg | 8.97  | 3.14  | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 8.74   |           | mg/kg | 0.897 | 0.086 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 4.54   |           | mg/kg | 1.79  | 0.149 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 15.0   |           | mg/kg | 0.897 | 0.231 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 12400  |           | mg/kg | 4.48  | 0.810 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 16.1   |           | mg/kg | 4.48  | 0.240 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 8950   |           | mg/kg | 8.97  | 1.38  | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 536    |           | mg/kg | 0.897 | 0.143 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | 0.08   |           | mg/kg | 0.07  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:41 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 12.0   |           | mg/kg | 2.24  | 0.217 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 758    |           | mg/kg | 224   | 12.9  | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | ND     |           | mg/kg | 1.79  | 0.231 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | ND     |           | mg/kg | 0.897 | 0.254 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 201    |           | mg/kg | 179   | 2.82  | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | 0.529  | J         | mg/kg | 1.79  | 0.282 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 12.7   |           | mg/kg | 0.897 | 0.182 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 52.5   |           | mg/kg | 4.48  | 0.263 | 2               | 07/19/17 20:00 | 07/21/17 21:48 | EPA 3050B   | 1,6010C           | MC      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-08

Date Collected: 07/18/17 12:00

Client ID: BLINDDUP

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 87%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 10800  |           | mg/kg | 9.08  | 2.45  | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | 0.381  | J         | mg/kg | 4.54  | 0.345 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 4.73   |           | mg/kg | 0.908 | 0.189 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 73.7   |           | mg/kg | 0.908 | 0.158 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 0.418  | J         | mg/kg | 0.454 | 0.030 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 1.30   |           | mg/kg | 0.908 | 0.089 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 55100  |           | mg/kg | 9.08  | 3.18  | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 15.7   |           | mg/kg | 0.908 | 0.087 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 9.95   |           | mg/kg | 1.82  | 0.151 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 28.0   |           | mg/kg | 0.908 | 0.234 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 18400  |           | mg/kg | 4.54  | 0.820 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 28.1   |           | mg/kg | 4.54  | 0.243 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 12200  |           | mg/kg | 9.08  | 1.40  | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 470    |           | mg/kg | 0.908 | 0.144 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | 0.10   |           | mg/kg | 0.07  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:43 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 21.5   |           | mg/kg | 2.27  | 0.220 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 1540   |           | mg/kg | 227   | 13.1  | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | ND     |           | mg/kg | 1.82  | 0.234 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | ND     |           | mg/kg | 0.908 | 0.257 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 141    | J         | mg/kg | 182   | 2.86  | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | 0.672  | J         | mg/kg | 1.82  | 0.286 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 20.0   |           | mg/kg | 0.908 | 0.184 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 150    |           | mg/kg | 4.54  | 0.266 | 2               | 07/19/17 20:00 | 07/21/17 21:52 | EPA 3050B   | 1,6010C           | MC      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-09

Date Collected: 07/18/17 13:50

Client ID: TP-12

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 74%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 7540   |           | mg/kg | 10.4  | 2.81  | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | 1.32   | J         | mg/kg | 5.21  | 0.396 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 8.15   |           | mg/kg | 1.04  | 0.217 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 64.7   |           | mg/kg | 1.04  | 0.181 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 0.563  |           | mg/kg | 0.521 | 0.034 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 1.78   |           | mg/kg | 1.04  | 0.102 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 90300  |           | mg/kg | 10.4  | 3.65  | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 31.5   |           | mg/kg | 1.04  | 0.100 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 4.57   |           | mg/kg | 2.08  | 0.173 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 44.7   |           | mg/kg | 1.04  | 0.269 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 25900  |           | mg/kg | 5.21  | 0.941 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 54.2   |           | mg/kg | 5.21  | 0.279 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 34000  |           | mg/kg | 10.4  | 1.60  | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 1020   |           | mg/kg | 1.04  | 0.166 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | 0.25   |           | mg/kg | 0.09  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:45 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 24.4   |           | mg/kg | 2.60  | 0.252 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 745    |           | mg/kg | 260   | 15.0  | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | ND     |           | mg/kg | 2.08  | 0.269 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | ND     |           | mg/kg | 1.04  | 0.295 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 520    |           | mg/kg | 208   | 3.28  | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | 1.02   | J         | mg/kg | 2.08  | 0.328 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 20.0   |           | mg/kg | 1.04  | 0.212 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 148    |           | mg/kg | 5.21  | 0.305 | 2               | 07/19/17 20:00 | 07/21/17 21:56 | EPA 3050B   | 1,6010C           | MC      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-10

Date Collected: 07/18/17 14:45

Client ID: TP-11

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 84%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 17800  |           | mg/kg | 9.50  | 2.56  | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | 0.446  | J         | mg/kg | 4.75  | 0.361 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 4.92   |           | mg/kg | 0.950 | 0.198 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 132    |           | mg/kg | 0.950 | 0.165 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 0.902  |           | mg/kg | 0.475 | 0.031 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 1.28   |           | mg/kg | 0.950 | 0.093 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 4500   |           | mg/kg | 9.50  | 3.32  | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 22.2   |           | mg/kg | 0.950 | 0.091 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 18.8   |           | mg/kg | 1.90  | 0.158 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 14.8   |           | mg/kg | 0.950 | 0.245 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 29200  |           | mg/kg | 4.75  | 0.858 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 12.8   |           | mg/kg | 4.75  | 0.255 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 5410   |           | mg/kg | 9.50  | 1.46  | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 946    |           | mg/kg | 0.950 | 0.151 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | 0.04   | J         | mg/kg | 0.08  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:47 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 23.9   |           | mg/kg | 2.38  | 0.230 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 1690   |           | mg/kg | 238   | 13.7  | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | ND     |           | mg/kg | 1.90  | 0.245 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | ND     |           | mg/kg | 0.950 | 0.269 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 378    |           | mg/kg | 190   | 2.99  | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | 1.04   | J         | mg/kg | 1.90  | 0.299 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 30.3   |           | mg/kg | 0.950 | 0.193 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 58.3   |           | mg/kg | 4.75  | 0.278 | 2               | 07/19/17 20:00 | 07/21/17 22:00 | EPA 3050B   | 1,6010C           | MC      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-11

Date Collected: 07/18/17 14:30

Client ID: NS-3

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 88%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 10100  |           | mg/kg | 8.95  | 2.42  | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | 0.340  | J         | mg/kg | 4.48  | 0.340 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 2.72   |           | mg/kg | 0.895 | 0.186 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 86.0   |           | mg/kg | 0.895 | 0.156 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 0.367  | J         | mg/kg | 0.448 | 0.030 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 0.779  | J         | mg/kg | 0.895 | 0.088 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 53200  |           | mg/kg | 8.95  | 3.13  | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 13.3   |           | mg/kg | 0.895 | 0.086 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 5.66   |           | mg/kg | 1.79  | 0.149 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 15.1   |           | mg/kg | 0.895 | 0.231 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 15400  |           | mg/kg | 4.48  | 0.808 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 20.7   |           | mg/kg | 4.48  | 0.240 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 12200  |           | mg/kg | 8.95  | 1.38  | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 303    |           | mg/kg | 0.895 | 0.142 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | 0.09   |           | mg/kg | 0.07  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:49 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 14.3   |           | mg/kg | 2.24  | 0.217 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 1160   |           | mg/kg | 224   | 12.9  | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | ND     |           | mg/kg | 1.79  | 0.231 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | ND     |           | mg/kg | 0.895 | 0.253 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 360    |           | mg/kg | 179   | 2.82  | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | ND     |           | mg/kg | 1.79  | 0.282 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 18.6   |           | mg/kg | 0.895 | 0.182 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 61.3   |           | mg/kg | 4.48  | 0.262 | 2               | 07/19/17 20:00 | 07/21/17 22:04 | EPA 3050B   | 1,6010C           | MC      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-12

Date Collected: 07/18/17 15:00

Client ID: NS-4

Date Received: 07/18/17

Sample Location: Not Specified

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 88%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 8010   |           | mg/kg | 8.95  | 2.42  | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Antimony, Total              | 0.832  | J         | mg/kg | 4.47  | 0.340 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Arsenic, Total               | 9.92   |           | mg/kg | 0.895 | 0.186 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Barium, Total                | 92.3   |           | mg/kg | 0.895 | 0.156 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Beryllium, Total             | 0.394  | J         | mg/kg | 0.447 | 0.030 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Cadmium, Total               | 1.12   |           | mg/kg | 0.895 | 0.088 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Calcium, Total               | 65400  |           | mg/kg | 8.95  | 3.13  | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Chromium, Total              | 39.3   |           | mg/kg | 0.895 | 0.086 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Cobalt, Total                | 5.34   |           | mg/kg | 1.79  | 0.148 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Copper, Total                | 33.9   |           | mg/kg | 0.895 | 0.231 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Iron, Total                  | 18700  |           | mg/kg | 4.47  | 0.808 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Lead, Total                  | 148    |           | mg/kg | 4.47  | 0.240 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Magnesium, Total             | 8770   |           | mg/kg | 8.95  | 1.38  | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Manganese, Total             | 1320   |           | mg/kg | 0.895 | 0.142 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Mercury, Total               | 0.48   |           | mg/kg | 0.07  | 0.02  | 1               | 07/20/17 06:50 | 07/20/17 14:54 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 14.9   |           | mg/kg | 2.24  | 0.216 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Potassium, Total             | 994    |           | mg/kg | 224   | 12.9  | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Selenium, Total              | 0.626  | J         | mg/kg | 1.79  | 0.231 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Silver, Total                | 0.447  | J         | mg/kg | 0.895 | 0.253 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Sodium, Total                | 372    |           | mg/kg | 179   | 2.82  | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Thallium, Total              | 1.40   | J         | mg/kg | 1.79  | 0.282 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Vanadium, Total              | 31.7   |           | mg/kg | 0.895 | 0.182 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |
| Zinc, Total                  | 151    |           | mg/kg | 4.47  | 0.262 | 2               | 07/19/17 20:00 | 07/21/17 22:51 | EPA 3050B   | 1,6010C           | MC      |





Project Name: MAIN &amp; E. BALCOM

Lab Number: L1724590

Project Number: 0239-016-001

Report Date: 07/25/17

## Method Blank Analysis Batch Quality Control

| Parameter  | Result | Qualifier | Units | RL    | MDL   | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|--|--------|-----------|-------|-------|-------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01-12 Batch: WG1023996-1 |        |           |       |       |       |                    |                  |                  |                      |         |
| Aluminum, Total  | ND     |           | mg/kg | 4.00  | 1.08  | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Antimony, Total  | ND     |           | mg/kg | 2.00  | 0.152 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Arsenic, Total   | ND     |           | mg/kg | 0.400 | 0.083 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Barium, Total  | ND     |           | mg/kg | 0.400 | 0.070 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Beryllium, Total   | 0.016  | J         | mg/kg | 0.200 | 0.013 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Cadmium, Total   | ND     |           | mg/kg | 0.400 | 0.039 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Calcium, Total   | ND     |           | mg/kg | 4.00  | 1.40  | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Chromium, Total  | ND     |           | mg/kg | 0.400 | 0.038 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Cobalt, Total  | ND     |           | mg/kg | 0.800 | 0.066 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Copper, Total  | ND     |           | mg/kg | 0.400 | 0.103 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Iron, Total  | 0.476  | J         | mg/kg | 2.00  | 0.361 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Lead, Total  | ND     |           | mg/kg | 2.00  | 0.107 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Magnesium, Total   | ND     |           | mg/kg | 4.00  | 0.616 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Manganese, Total   | ND     |           | mg/kg | 0.400 | 0.064 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Nickel, Total  | ND     |           | mg/kg | 1.00  | 0.097 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Potassium, Total   | 24.7   | J         | mg/kg | 100   | 5.76  | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Selenium, Total  | ND     |           | mg/kg | 0.800 | 0.103 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Silver, Total  | ND     |           | mg/kg | 0.400 | 0.113 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Sodium, Total  | 32.3   | J         | mg/kg | 80.0  | 1.26  | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Thallium, Total  | ND     |           | mg/kg | 0.800 | 0.126 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Vanadium, Total  | ND     |           | mg/kg | 0.400 | 0.081 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |
| Zinc, Total  | ND     |           | mg/kg | 2.00  | 0.117 | 1                  | 07/19/17 20:00   | 07/21/17 20:44   | 1,6010C              | MC      |

### Prep Information

Digestion Method: EPA 3050B

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|--|--------|-----------|-------|------|------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01-12 Batch: WG1024082-1 |        |           |       |      |      |                    |                  |                  |                      |         |
| Mercury, Total   | ND     |           | mg/kg | 0.08 | 0.02 | 1                  | 07/20/17 06:50   | 07/20/17 14:15   | 1,7471B              | MG      |



**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1724590

**Project Number:** 0239-016-001

**Report Date:** 07/25/17

## **Method Blank Analysis Batch Quality Control**

### **Prep Information**

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Digestion Method: EPA 7471B

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-12 Batch: WG1023996-2 SRM Lot Number: D093-540 |                  |      |                   |      |                     |     |      |            |
| Aluminum, Total  | 76               |      | -                 |      | 55-146              | -   |      |            |
| Antimony, Total  | 165              |      | -                 |      | 2-204               | -   |      |            |
| Arsenic, Total   | 83               |      | -                 |      | 70-130              | -   |      |            |
| Barium, Total  | 95               |      | -                 |      | 83-117              | -   |      |            |
| Beryllium, Total   | 92               |      | -                 |      | 83-117              | -   |      |            |
| Cadmium, Total   | 95               |      | -                 |      | 83-117              | -   |      |            |
| Calcium, Total   | 88               |      | -                 |      | 83-117              | -   |      |            |
| Chromium, Total  | 94               |      | -                 |      | 80-120              | -   |      |            |
| Cobalt, Total  | 94               |      | -                 |      | 84-116              | -   |      |            |
| Copper, Total  | 98               |      | -                 |      | 82-118              | -   |      |            |
| Iron, Total  | 98               |      | -                 |      | 47-153              | -   |      |            |
| Lead, Total  | 96               |      | -                 |      | 82-117              | -   |      |            |
| Magnesium, Total   | 89               |      | -                 |      | 77-124              | -   |      |            |
| Manganese, Total   | 90               |      | -                 |      | 81-119              | -   |      |            |
| Nickel, Total  | 94               |      | -                 |      | 83-117              | -   |      |            |
| Potassium, Total   | 98               |      | -                 |      | 71-129              | -   |      |            |
| Selenium, Total  | 87               |      | -                 |      | 78-122              | -   |      |            |
| Silver, Total  | 94               |      | -                 |      | 76-124              | -   |      |            |
| Sodium, Total  | 126              |      | -                 |      | 72-128              | -   |      |            |
| Thallium, Total  | 94               |      | -                 |      | 79-121              | -   |      |            |
| Vanadium, Total  | 98               |      | -                 |      | 78-122              | -   |      |            |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** 0239-016-001

**Lab Number:** L1724590

**Report Date:** 07/25/17

| Parameter  | LCS<br>%Recovery | LCSD<br>%Recovery | %Recovery<br>Limits | RPD | RPD Limits |
|--|------------------|-------------------|---------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-12 Batch: WG1023996-2 SRM Lot Number: D093-540 |                  |                   |                     |     |            |
| Zinc, Total  | 91               | -                 | 83-117              | -   |            |
| Total Metals - Mansfield Lab Associated sample(s): 01-12 Batch: WG1024082-2 SRM Lot Number: D093-540 |                  |                   |                     |     |            |
| Mercury, Total   | 96               | -                 | 72-128              | -   |            |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

| Parameter   | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|---|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-12 QC Batch ID: WG1023996-3 WG1023996-4 QC Sample: L1724590-01 Client ID: TP-14 |               |          |          |              |      |           |               |      |                 |     |      |            |
| Aluminum, Total   | 4860          | 177      | 5940     | 610          | Q    | 6210      | 744           | Q    | 75-125          | 4   |      | 20         |
| Antimony, Total   | ND            | 44.3     | 31.5     | 71           | Q    | 34.6      | 76            |      | 75-125          | 9   |      | 20         |
| Arsenic, Total  | 1.02          | 10.6     | 11.0     | 94           |      | 11.6      | 97            |      | 75-125          | 5   |      | 20         |
| Barium, Total   | 54.7          | 177      | 194      | 79           |      | 216       | 89            |      | 75-125          | 11  |      | 20         |
| Beryllium, Total  | 0.145J        | 4.43     | 3.55     | 80           |      | 3.92      | 86            |      | 75-125          | 10  |      | 20         |
| Cadmium, Total  | 0.545J        | 4.52     | 3.98     | 88           |      | 4.33      | 94            |      | 75-125          | 8   |      | 20         |
| Calcium, Total  | 54000         | 886      | 55400    | 158          | Q    | 59600     | 617           | Q    | 75-125          | 7   |      | 20         |
| Chromium, Total   | 8.71          | 17.7     | 22.7     | 79           |      | 24.5      | 87            |      | 75-125          | 8   |      | 20         |
| Cobalt, Total   | 4.27          | 44.3     | 36.1     | 72           | Q    | 39.2      | 77            |      | 75-125          | 8   |      | 20         |
| Copper, Total   | 10.0          | 22.1     | 30.0     | 90           |      | 33.1      | 102           |      | 75-125          | 10  |      | 20         |
| Iron, Total   | 10200         | 88.6     | 11000    | 903          | Q    | 11600     | 1540          | Q    | 75-125          | 5   |      | 20         |
| Lead, Total   | 9.85          | 45.2     | 43.1     | 74           | Q    | 46.0      | 78            |      | 75-125          | 7   |      | 20         |
| Magnesium, Total  | 20900         | 886      | 21400    | 56           | Q    | 23100     | 242           | Q    | 75-125          | 8   |      | 20         |
| Manganese, Total  | 315.          | 44.3     | 358      | 97           |      | 382       | 148           | Q    | 75-125          | 6   |      | 20         |
| Nickel, Total   | 8.85          | 44.3     | 41.0     | 73           | Q    | 44.2      | 78            |      | 75-125          | 8   |      | 20         |
| Potassium, Total  | 1010          | 886      | 1990     | 111          |      | 2150      | 126           | Q    | 75-125          | 8   |      | 20         |
| Selenium, Total   | ND            | 10.6     | 8.56     | 80           |      | 9.70      | 89            |      | 75-125          | 12  |      | 20         |
| Silver, Total   | ND            | 26.6     | 23.2     | 87           |      | 26.1      | 96            |      | 75-125          | 12  |      | 20         |
| Sodium, Total   | 375.          | 886      | 1120     | 84           |      | 1210      | 92            |      | 75-125          | 8   |      | 20         |
| Thallium, Total   | ND            | 10.6     | 6.16     | 58           | Q    | 7.10      | 65            | Q    | 75-125          | 14  |      | 20         |
| Vanadium, Total   | 12.8          | 44.3     | 48.9     | 82           |      | 53.8      | 90            |      | 75-125          | 10  |      | 20         |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1724590

**Project Number:** 0239-016-001

**Report Date:** 07/25/17

| Parameter   | Native Sample | MS Added | MS Found | MS %Recovery | MSD Found | MSD %Recovery | Recovery Limits | RPD | RPD Limits |
|---|---------------|----------|----------|--------------|-----------|---------------|-----------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-12 QC Batch ID: WG1023996-3 WG1023996-4 QC Sample: L1724590-01 Client ID: TP-14 |               |          |          |              |           |               |                 |     |            |
| Zinc, Total   | 47.6          | 44.3     | 82.2     | 78           | 91.6      | 97            | 75-125          | 11  | 20         |
| Total Metals - Mansfield Lab Associated sample(s): 01-12 QC Batch ID: WG1024082-3 WG1024082-4 QC Sample: L1724590-01 Client ID: TP-14 |               |          |          |              |           |               |                 |     |            |
| Mercury, Total  | ND            | 0.143    | 0.18     | 126          | Q         | 0.18          | 126             | Q   | 80-120     |

# **INORGANICS & MISCELLANEOUS**

Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

**SAMPLE RESULTS**

Lab ID: L1724590-01

Client ID: TP-14

Sample Location: Not Specified

Matrix: Soil

Date Collected: 07/18/17 09:40

Date Received: 07/18/17

Field Prep: Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 87.4   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |





**Project Name:** MAIN & E. BALCOM**Project Number:** 0239-016-001**Lab Number:** L1724590**Report Date:** 07/25/17**SAMPLE RESULTS****Lab ID:** L1724590-02**Client ID:** NS-1**Sample Location:** Not Specified**Matrix:** Soil**Date Collected:** 07/18/17 10:00**Date Received:** 07/18/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 86.8   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM**Project Number:** 0239-016-001**Lab Number:** L1724590**Report Date:** 07/25/17**SAMPLE RESULTS****Lab ID:** L1724590-03**Client ID:** TP-15**Sample Location:** Not Specified**Matrix:** Soil**Date Collected:** 07/18/17 10:40**Date Received:** 07/18/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 83.2   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM**Project Number:** 0239-016-001**Lab Number:** L1724590**Report Date:** 07/25/17**SAMPLE RESULTS****Lab ID:** L1724590-04**Client ID:** TP-18**Sample Location:** Not Specified**Matrix:** Soil**Date Collected:** 07/18/17 11:30**Date Received:** 07/18/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 84.7   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM**Project Number:** 0239-016-001**Lab Number:** L1724590**Report Date:** 07/25/17**SAMPLE RESULTS****Lab ID:** L1724590-05**Client ID:** TP-16**Sample Location:** Not Specified**Matrix:** Soil**Date Collected:** 07/18/17 11:50**Date Received:** 07/18/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 89.0   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |



Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-06

Client ID: NS-2

Sample Location: Not Specified

Matrix: Soil

Date Collected: 07/18/17 12:30

Date Received: 07/18/17

Field Prep: Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 73.2   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM**Project Number:** 0239-016-001**Lab Number:** L1724590**Report Date:** 07/25/17**SAMPLE RESULTS****Lab ID:** L1724590-07**Client ID:** TP-13**Sample Location:** Not Specified**Matrix:** Soil**Date Collected:** 07/18/17 13:15**Date Received:** 07/18/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 85.7   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |



Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-08

Client ID: BLINDDUP

Sample Location: Not Specified

Matrix: Soil

Date Collected: 07/18/17 12:00

Date Received: 07/18/17

Field Prep: Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 87.2   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM**Project Number:** 0239-016-001**Lab Number:** L1724590**Report Date:** 07/25/17**SAMPLE RESULTS****Lab ID:** L1724590-09**Client ID:** TP-12**Sample Location:** Not Specified**Matrix:** Soil**Date Collected:** 07/18/17 13:50**Date Received:** 07/18/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 74.0   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |





**Project Name:** MAIN & E. BALCOM**Project Number:** 0239-016-001**Lab Number:** L1724590**Report Date:** 07/25/17**SAMPLE RESULTS****Lab ID:** L1724590-10**Client ID:** TP-11**Sample Location:** Not Specified**Matrix:** Soil**Date Collected:** 07/18/17 14:45**Date Received:** 07/18/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 83.6   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |



Project Name: MAIN &amp; E. BALCOM

Project Number: 0239-016-001

Lab Number: L1724590

Report Date: 07/25/17

## SAMPLE RESULTS

Lab ID: L1724590-11

Client ID: NS-3

Sample Location: Not Specified

Matrix: Soil

Date Collected: 07/18/17 14:30

Date Received: 07/18/17

Field Prep: Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 87.6   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM**Project Number:** 0239-016-001**Lab Number:** L1724590**Report Date:** 07/25/17**SAMPLE RESULTS****Lab ID:** L1724590-12**Client ID:** NS-4**Sample Location:** Not Specified**Matrix:** Soil**Date Collected:** 07/18/17 15:00**Date Received:** 07/18/17**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 88.2   |           | %     | 0.100 | NA  | 1                  | -                | 07/19/17 13:57   | 121,2540G            | RI      |



**Lab Duplicate Analysis**  
Batch Quality Control**Project Name:** MAIN & E. BALCOM**Project Number:** 0239-016-001**Lab Number:** L1724590**Report Date:** 07/25/17

| Parameter  | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|--|---------------|------------------|-------|-----|------|------------|
| General Chemistry - Westborough Lab Associated sample(s): 01-12 QC Batch ID: WG1023892-1 QC Sample: L1724590-01 Client ID: TP-14 |               |                  |       |     |      |            |
| Solids, Total  | 87.4          | 87.7             | %     | 0   |      | 20         |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Serial\_No:**07251717:25  
**Lab Number:** L1724590  
**Report Date:** 07/25/17

### Sample Receipt and Container Information

Were project specific reporting limits specified?

YES

#### Cooler Information

**Cooler**                      **Custody Seal**  
A                                      Absent

#### Container Information

| Container ID  | Container Type                         | Cooler | Initial pH | Final pH | Temp deg C | Pres | Seal   | Frozen Date/Time | Analysis(*)  |
|---------------|--|--------|------------|----------|------------|------|--------|------------------|--|
| L1724590-01A  | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-01A1 | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-01A2 | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-01B  | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-01B1 | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-01B2 | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-01C  | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-01C1 | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-01C2 | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-01D  | Plastic 2oz unpreserved for TS         | A      | NA         |          | 5.5        | Y    | Absent |                  | TS(7)  |
| L1724590-01D1 | Plastic 2oz unpreserved for TS         | A      | NA         |          | 5.5        | Y    | Absent |                  | TS(7)  |
| L1724590-01D2 | Plastic 2oz unpreserved for TS         | A      | NA         |          | 5.5        | Y    | Absent |                  | TS(7)  |
| L1724590-01E  | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |
| L1724590-01E1 | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |
| L1724590-01E2 | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Serial\_No:**07251717:25  
**Lab Number:** L1724590  
**Report Date:** 07/25/17

**Container Information**

| Container ID  | Container Type              | Cooler | Initial pH | Final pH | Temp deg C | Pres | Seal   | Frozen Date/Time | Analysis(*)  |
|---------------|-----------------------------|--------|------------|----------|------------|------|--------|------------------|--|
| L1724590-01F  | Glass 60mL/2oz unpreserved  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14) |
| L1724590-01F1 | Glass 60mL/2oz unpreserved  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14) |
| L1724590-01F2 | Glass 60mL/2oz unpreserved  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14) |
| L1724590-01G  | Glass 120ml/4oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14) |
| L1724590-01G1 | Glass 120ml/4oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14) |
| L1724590-01G2 | Glass 120ml/4oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14) |
| L1724590-01H  | Glass 60mL/2oz unpreserved  | A      | NA         |          | 5.5        | Y    | Absent |                  | ARCHIVE()  |
| L1724590-01I  | Glass 60mL/2oz unpreserved  | A      | NA         |          | 5.5        | Y    | Absent |                  | ARCHIVE()  |
| L1724590-01J  | Glass 120ml/4oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | ARCHIVE()  |
| L1724590-01K  | Glass 120ml/4oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | ARCHIVE()  |
| L1724590-01L  | Glass 250ml/8oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14) |
| L1724590-01L1 | Glass 250ml/8oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14) |
| L1724590-01L2 | Glass 250ml/8oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14) |
| L1724590-01X  | Vial MeOH preserved split   | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(14)                                       |
| L1724590-01X1 | Vial MeOH preserved split   | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(14)                                       |
| L1724590-01X2 | Vial MeOH preserved split   | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(14)                                       |
| L1724590-01Y  | Vial Water preserved split  | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)                                       |
| L1724590-01Y1 | Vial Water preserved split  | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)                                       |
| L1724590-01Y2 | Vial Water preserved split  | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)                                       |
| L1724590-01Z  | Vial Water preserved split  | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)                                       |
| L1724590-01Z1 | Vial Water preserved split  | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)                                       |
| L1724590-01Z2 | Vial Water preserved split  | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)                                       |
| L1724590-02A  | Glass 60mL/2oz unpreserved  | A      | NA         |          | 5.5        | Y    | Absent |                  | TS(7)  |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1724590**Project Number:** 0239-016-001**Report Date:** 07/25/17**Container Information**

| <b>Container ID</b> | <b>Container Type</b>                  | <b>Cooler</b> | <b>Initial pH</b> | <b>Final pH</b> | <b>Temp deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen Date/Time</b> | <b>Analysis(*)</b>   |
|---------------------|--|---------------|-------------------|-----------------|-------------------|-------------|-------------|-------------------------|--|
| L1724590-02B        | Metals Only-Glass 60mL/2oz unpreserved | A             | NA                |                 | 5.5               | Y           | Absent      |                         | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |
| L1724590-02C        | Glass 120ml/4oz unpreserved            | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8270(14)   |
| L1724590-03A        | 5 gram Encore Sampler                  | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8260HLW-R2(2)  |
| L1724590-03B        | 5 gram Encore Sampler                  | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8260HLW-R2(2)  |
| L1724590-03C        | 5 gram Encore Sampler                  | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8260HLW-R2(2)  |
| L1724590-03D        | Plastic 2oz unpreserved for TS         | A             | NA                |                 | 5.5               | Y           | Absent      |                         | TS(7)  |
| L1724590-03E        | Glass 120ml/4oz unpreserved            | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8270(14)   |
| L1724590-03F        | Metals Only-Glass 60mL/2oz unpreserved | A             | NA                |                 | 5.5               | Y           | Absent      |                         | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |
| L1724590-03X        | Vial MeOH preserved split              | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8260HLW-R2(14)   |
| L1724590-03Y        | Vial Water preserved split             | A             | NA                |                 | 5.5               | Y           | Absent      | 19-JUL-17 09:07         | NYTCL-8260HLW-R2(14)   |
| L1724590-03Z        | Vial Water preserved split             | A             | NA                |                 | 5.5               | Y           | Absent      | 19-JUL-17 09:07         | NYTCL-8260HLW-R2(14)   |
| L1724590-04A        | 5 gram Encore Sampler                  | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8260HLW-R2(2)  |
| L1724590-04B        | 5 gram Encore Sampler                  | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8260HLW-R2(2)  |
| L1724590-04C        | 5 gram Encore Sampler                  | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8260HLW-R2(2)  |
| L1724590-04D        | Plastic 2oz unpreserved for TS         | A             | NA                |                 | 5.5               | Y           | Absent      |                         | TS(7)  |
| L1724590-04E        | Metals Only-Glass 60mL/2oz unpreserved | A             | NA                |                 | 5.5               | Y           | Absent      |                         | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |
| L1724590-04F        | Glass 250ml/8oz unpreserved            | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14)   |
| L1724590-04G        | Glass 120ml/4oz unpreserved            | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14)   |
| L1724590-04H        | Glass 60mL/2oz unpreserved             | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14)   |
| L1724590-04X        | Vial MeOH preserved split              | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8260HLW-R2(14)   |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Serial\_No:**07251717:25  
**Lab Number:** L1724590  
**Report Date:** 07/25/17

**Container Information**

| Container ID | Container Type                         | Cooler | Initial pH | Final pH | Temp deg C | Pres | Seal   | Frozen Date/Time | Analysis(*)  |
|--------------|--|--------|------------|----------|------------|------|--------|------------------|--|
| L1724590-04Y | Vial Water preserved split             | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)   |
| L1724590-04Z | Vial Water preserved split             | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)   |
| L1724590-05A | Glass 60mL/2oz unpreserved             | A      | NA         |          | 5.5        | Y    | Absent |                  | TS(7)  |
| L1724590-05B | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-TI(180),AS-TI(180),BA-TI(180),AG-TI(180),AL-TI(180),CR-TI(180),NI-TI(180),TL-TI(180),CU-TI(180),PB-TI(180),SB-TI(180),SE-TI(180),ZN-TI(180),CO-TI(180),V-TI(180),FE-TI(180),HG-T(28),MG-TI(180),MN-TI(180),CA-TI(180),CD-TI(180),K-TI(180),NA-TI(180) |
| L1724590-05C | Glass 120ml/4oz unpreserved            | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8082(14)  |
| L1724590-06A | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-TI(180),AS-TI(180),BA-TI(180),AG-TI(180),AL-TI(180),CR-TI(180),NI-TI(180),TL-TI(180),CU-TI(180),PB-TI(180),SB-TI(180),SE-TI(180),ZN-TI(180),CO-TI(180),V-TI(180),FE-TI(180),HG-T(28),MG-TI(180),MN-TI(180),CA-TI(180),CD-TI(180),K-TI(180),NA-TI(180) |
| L1724590-06B | Glass 120ml/4oz unpreserved            | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),TS(7)   |
| L1724590-07A | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-07B | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-07C | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-07D | Plastic 2oz unpreserved for TS         | A      | NA         |          | 5.5        | Y    | Absent |                  | TS(7)  |
| L1724590-07E | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-TI(180),AS-TI(180),BA-TI(180),AG-TI(180),AL-TI(180),CR-TI(180),NI-TI(180),TL-TI(180),CU-TI(180),PB-TI(180),SB-TI(180),SE-TI(180),ZN-TI(180),CO-TI(180),V-TI(180),FE-TI(180),HG-T(28),MG-TI(180),MN-TI(180),CA-TI(180),CD-TI(180),K-TI(180),NA-TI(180) |
| L1724590-07F | Glass 120ml/4oz unpreserved            | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14)   |
| L1724590-07X | Vial MeOH preserved split              | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(14)   |
| L1724590-07Y | Vial Water preserved split             | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)   |
| L1724590-07Z | Vial Water preserved split             | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)   |
| L1724590-08A | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-08B | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-08C | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(2)  |
| L1724590-08D | Plastic 2oz unpreserved for TS         | A      | NA         |          | 5.5        | Y    | Absent |                  | TS(7)  |



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**Container Information**

| Container ID | Container Type                         | Cooler | Initial pH | Final pH | Temp deg C | Pres | Seal   | Frozen Date/Time | Analysis(*)  |
|--------------|--|--------|------------|----------|------------|------|--------|------------------|--|
| L1724590-08E | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |
| L1724590-08F | Glass 250ml/8oz unpreserved            | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14)   |
| L1724590-08G | Glass 60mL/2oz unpreserved             | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14)   |
| L1724590-08H | Glass 120ml/4oz unpreserved            | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14)   |
| L1724590-08X | Vial MeOH preserved split              | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW-R2(14)   |
| L1724590-08Y | Vial Water preserved split             | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)   |
| L1724590-08Z | Vial Water preserved split             | A      | NA         |          | 5.5        | Y    | Absent | 19-JUL-17 09:07  | NYTCL-8260HLW-R2(14)   |
| L1724590-09A | Glass 60mL/2oz unpreserved             | A      | NA         |          | 5.5        | Y    | Absent |                  | TS(7)  |
| L1724590-09B | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |
| L1724590-09C | Glass 120ml/4oz unpreserved            | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8082(14)  |
| L1724590-10A | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |
| L1724590-10B | Glass 120ml/4oz unpreserved            | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),TS(7)   |
| L1724590-11A | Glass 60mL/2oz unpreserved             | A      | NA         |          | 5.5        | Y    | Absent |                  | TS(7)  |
| L1724590-11B | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |
| L1724590-11C | Glass 250ml/8oz unpreserved            | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8081(14),HERB-8151(14),NYTCL-8082(14)   |
| L1724590-11D | Glass 120ml/4oz unpreserved            | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260(14)   |
| L1724590-11X | Vial MeOH preserved split              | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260(14)   |

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**Container Information**

| <b>Container ID</b> | <b>Container Type</b>                  | <b>Cooler</b> | <b>Initial pH</b> | <b>Final pH</b> | <b>Temp deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen Date/Time</b> | <b>Analysis(*)</b>   |
|---------------------|--|---------------|-------------------|-----------------|-------------------|-------------|-------------|-------------------------|--|
| L1724590-11Y        | Vial Water preserved split             | A             | NA                |                 | 5.5               | Y           | Absent      | 19-JUL-17 09:36         | NYTCL-8260(14)   |
| L1724590-11Z        | Vial Water preserved split             | A             | NA                |                 | 5.5               | Y           | Absent      | 19-JUL-17 09:36         | NYTCL-8260(14)   |
| L1724590-12A        | Metals Only-Glass 60mL/2oz unpreserved | A             | NA                |                 | 5.5               | Y           | Absent      |                         | BE-TI(180),AS-TI(180),BA-TI(180),AG-TI(180),AL-TI(180),CR-TI(180),NI-TI(180),TL-TI(180),CU-TI(180),PB-TI(180),SB-TI(180),SE-TI(180),ZN-TI(180),CO-TI(180),V-TI(180),FE-TI(180),HG-T(28),MG-TI(180),MN-TI(180),CA-TI(180),CD-TI(180),K-TI(180),NA-TI(180) |
| L1724590-12B        | Glass 120ml/4oz unpreserved            | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8270(14),NYTCL-8082(14)  |

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**Lab Number:** L1724590  
**Report Date:** 07/25/17

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers



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#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM  
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## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



**Alpha Analytical, Inc.**

ID No.:17873

Facility: **Company-wide**

Revision 10

Department: **Quality Assurance**

Published Date: 1/16/2017 11:00:05 AM

Title: **Certificate/Approval Program Summary**

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**Certification Information**

The following analytes are not included in our Primary NELAP Scope of Accreditation:


**Westborough Facility****EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** NPW and SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**EPA 9012B:** NPW: Total Cyanide**EPA 9050A:** NPW: Specific Conductance**SM3500:** NPW: Ferrous Iron**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.**SM5310C:** DW: Dissolved Organic Carbon**Mansfield Facility****SM 2540D:** TSS**EPA 3005A** NPW**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation


**Westborough Facility:****Drinking Water****EPA 300.0:** Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE, EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH, EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E.****Mansfield Facility:****Drinking Water****EPA 200.7:** Ba, Be, Cd, Cr, Cu, Ni, Na, Ca. **EPA 200.8:** Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Ni, Se, TL. **EPA 245.1 Hg.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.



|  <b>NEW YORK CHAIN OF CUSTODY</b><br>Westborough, MA 01581<br>8 Walkup Dr.<br>TEL: 508-898-9220<br>FAX: 508-898-9193<br>Mansfield, MA 02048<br>320 Forbes Blvd<br>TEL: 508-822-9300<br>FAX: 508-822-3288  |           | <b>Service Centers</b><br>Mahwah, NJ 07430: 35 Whitney Rd, Suite 5<br>Albany, NY 12205: 14 Walker Way<br>Tonawanda, NY 14150: 275 Cooper Ave, Suite 105  |       | Page _____ of _____ |                    | Date Rec'd in Lab <b>7/19/17</b>  |   | ALPHA Job # <b>L1724590</b> |   |   |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
|---|-----------|--|-------|---------------------|--------------------|---|---|-----------------------------|---|---|-----------|---|--|--|--------------------|--|--|---------------------------------|--|--|--|--|--|------|------|--|--|--|--|--|--|--|--|-----------|-------|---------|------|------|-----|---|---|---|---|---|---|--|--|--|----|----------|---------|------|------|-----|---|---|---|---|---|---|--|--|--|----|-----------|---------|------|------|-----|---|---|---|---|---|---|--|--|--|----|------|---------|-------|------|-----|--|---|---|--|--|--|--|--|--|----|-------|---------|-------|------|-----|---|---|---|--|--|--|--|--|--|----|-------|---------|-------|------|-----|---|---|---|---|---|---|--|--|--|----|-------|---------|-------|------|-----|--|---|---|---|--|--|--|--|--|----|------|---------|-------|------|-----|--|---|---|--|--|--|--|--|--|----|-------|---------|-------|------|-----|---|---|---|--|--|--|--|--|--|----|-----------|---------|-------|------|-----|---|---|---|---|---|---|--|--|--|--|--|
|   |           | <b>Project Information</b><br>Project Name: <b>Maun + E Balcon</b><br>Project Location: _____<br>Project # _____<br>(Use Project name as Project #) <input type="checkbox"/>                                       |       |                     |                    | <b>Deliverables</b><br><input type="checkbox"/> ASP-A <input type="checkbox"/> ASP-B<br><input type="checkbox"/> EQUIS (1 File) <input type="checkbox"/> EQUIS (4 File)<br><input type="checkbox"/> Other _____   |   |                             |   | <b>Billing Information</b><br><input type="checkbox"/> Same as Client Info<br>PO # _____  |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
|   |           | <b>Client Information</b><br>Client: <b>Benchmark Env.</b><br>Address: <b>2558 Hamburg Turnpike</b><br><b>Buffalo NY 14218</b><br>Phone: <b>716-856-0599</b><br>Fax: _____<br>Email: <b>Nmunter@turnkeyllc.com</b> |       |                     |                    | <b>Regulatory Requirement</b><br><input type="checkbox"/> NY TOGS <input type="checkbox"/> NY Part 375<br><input type="checkbox"/> AWQ Standards <input type="checkbox"/> NY CP-51<br><input type="checkbox"/> NY Restricted Use <input type="checkbox"/> Other _____<br><input type="checkbox"/> NY Unrestricted Use<br><input type="checkbox"/> NYC Sewer Discharge |   |                             |   | <b>Disposal Site Information</b><br>Please identify below location of applicable disposal facilities.<br>Disposal Facility: _____<br><input type="checkbox"/> NJ <input type="checkbox"/> NY<br><input type="checkbox"/> Other: _____ |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| These samples have been previously analyzed by Alpha <input type="checkbox"/>   |           |  |       |                     |                    | <b>ANALYSIS</b>   |   |                             |   | <b>Sample Filtration</b><br><input type="checkbox"/> Done<br><input type="checkbox"/> Lab to do<br><b>Preservation</b><br><input type="checkbox"/> Lab to do<br>(Please Specify below) _____  |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| Other project specific requirements/comments:<br><div style="text-align: center; font-size: 2em; color: blue;">CAT B</div>  |           |  |       |                     |                    | Please specify Metals or TAL. _____   |   |                             |   | <b>Sample Specific Comments</b>   |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| <table border="1" style="width:100%; border-collapse: collapse;"> <thead> <tr> <th rowspan="2">ALPHA Lab ID<br/>(Lab Use Only)</th> <th rowspan="2">Sample ID</th> <th colspan="2">Collection</th> <th rowspan="2">Sample Matrix</th> <th rowspan="2">Sampler's Initials</th> <th colspan="8"></th> </tr> <tr> <th>Date</th> <th>Time</th> <th colspan="8"></th> </tr> </thead> <tbody> <tr> <td>24590 -01</td> <td>TP-14</td> <td>7-18-17</td> <td>9:40</td> <td>Soil</td> <td>CCB</td> <td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td></td><td></td><td></td> </tr> <tr> <td>01</td> <td>TP-14 MS</td> <td>7-18-17</td> <td>9:40</td> <td>Soil</td> <td>CCB</td> <td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td></td><td></td><td></td> </tr> <tr> <td>01</td> <td>TP-14 MSD</td> <td>7-18-17</td> <td>9:40</td> <td>Soil</td> <td>CCB</td> <td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td></td><td></td><td></td> </tr> <tr> <td>02</td> <td>NS-1</td> <td>7-18-17</td> <td>10:00</td> <td>Soil</td> <td>CCB</td> <td></td><td>X</td><td>X</td><td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>03</td> <td>TP-15</td> <td>7-18-17</td> <td>10:40</td> <td>Soil</td> <td>CCB</td> <td>X</td><td>X</td><td>X</td><td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>04</td> <td>TP-16</td> <td>7-18-17</td> <td>11:30</td> <td>Soil</td> <td>CCB</td> <td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td></td><td></td><td></td> </tr> <tr> <td>05</td> <td>TP-16</td> <td>7-18-17</td> <td>11:50</td> <td>Soil</td> <td>CCB</td> <td></td><td>X</td><td>X</td><td>X</td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>06</td> <td>NS-2</td> <td>7-18-17</td> <td>12:30</td> <td>Soil</td> <td>CCB</td> <td></td><td>X</td><td>X</td><td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>07</td> <td>TP-13</td> <td>7-18-17</td> <td>13:15</td> <td>Soil</td> <td>CCB</td> <td>X</td><td>X</td><td>X</td><td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>08</td> <td>Blind Dup</td> <td>7-18-17</td> <td>12:00</td> <td>Soil</td> <td>CCB</td> <td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td></td><td></td><td></td> </tr> </tbody> </table> |           |  |       |                     |                    |   |   |                             |   | ALPHA Lab ID<br>(Lab Use Only)  | Sample ID | Collection  |  | Sample Matrix  | Sampler's Initials |  |  |                                 |  |  |  |  |  | Date | Time |  |  |  |  |  |  |  |  | 24590 -01 | TP-14 | 7-18-17 | 9:40 | Soil | CCB | X | X | X | X | X | X |  |  |  | 01 | TP-14 MS | 7-18-17 | 9:40 | Soil | CCB | X | X | X | X | X | X |  |  |  | 01 | TP-14 MSD | 7-18-17 | 9:40 | Soil | CCB | X | X | X | X | X | X |  |  |  | 02 | NS-1 | 7-18-17 | 10:00 | Soil | CCB |  | X | X |  |  |  |  |  |  | 03 | TP-15 | 7-18-17 | 10:40 | Soil | CCB | X | X | X |  |  |  |  |  |  | 04 | TP-16 | 7-18-17 | 11:30 | Soil | CCB | X | X | X | X | X | X |  |  |  | 05 | TP-16 | 7-18-17 | 11:50 | Soil | CCB |  | X | X | X |  |  |  |  |  | 06 | NS-2 | 7-18-17 | 12:30 | Soil | CCB |  | X | X |  |  |  |  |  |  | 07 | TP-13 | 7-18-17 | 13:15 | Soil | CCB | X | X | X |  |  |  |  |  |  | 08 | Blind Dup | 7-18-17 | 12:00 | Soil | CCB | X | X | X | X | X | X |  |  |  | Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.) |  |
| ALPHA Lab ID<br>(Lab Use Only)  | Sample ID | Collection   |       | Sample Matrix       | Sampler's Initials |   |   |                             |   |   |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
|   |           | Date   | Time  |                     |                    |   |   |                             |   |   |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| 24590 -01   | TP-14     | 7-18-17  | 9:40  | Soil                | CCB                | X   | X | X                           | X | X   | X         |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| 01  | TP-14 MS  | 7-18-17  | 9:40  | Soil                | CCB                | X   | X | X                           | X | X   | X         |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| 01  | TP-14 MSD | 7-18-17  | 9:40  | Soil                | CCB                | X   | X | X                           | X | X   | X         |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| 02  | NS-1      | 7-18-17  | 10:00 | Soil                | CCB                |   | X | X                           |   |   |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| 03  | TP-15     | 7-18-17  | 10:40 | Soil                | CCB                | X   | X | X                           |   |   |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| 04  | TP-16     | 7-18-17  | 11:30 | Soil                | CCB                | X   | X | X                           | X | X   | X         |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| 05  | TP-16     | 7-18-17  | 11:50 | Soil                | CCB                |   | X | X                           | X |   |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| 06  | NS-2      | 7-18-17  | 12:30 | Soil                | CCB                |   | X | X                           |   |   |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| 07  | TP-13     | 7-18-17  | 13:15 | Soil                | CCB                | X   | X | X                           |   |   |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| 08  | Blind Dup | 7-18-17  | 12:00 | Soil                | CCB                | X   | X | X                           | X | X   | X         |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| Preservative Code:<br>A = None<br>B = HCl<br>C = HNO <sub>3</sub><br>D = H <sub>2</sub> SO <sub>4</sub><br>E = NaOH<br>F = MeOH<br>G = NaHSO <sub>4</sub><br>H = Na <sub>2</sub> S <sub>2</sub> O <sub>3</sub><br>K/E = Zn Ac/NaOH<br>O = Other   |           |  |       |                     |                    | Container Code:<br>P = Plastic<br>A = Amber Glass<br>V = Vial<br>G = Glass<br>B = Bacteria Cup<br>C = Cube<br>O = Other<br>E = Encore<br>D = BOD Bottle   |   |                             |   |   |           | Westboro: Certification No: MA935<br>Mansfield: Certification No: MA015 |  | Container Type: <b>E A A A A A</b><br>Preservative: <b>A A A A A A</b> |                    | Relinquished By: <b>JMAL AAL</b><br>Date/Time: <b>7/18/17 16:00</b><br>Received By: <b>JMAL AAL</b><br>Date/Time: <b>7/18/17 16:00</b> |  | Date/Time: <b>7/19/17 01:30</b> |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |
| Form No: 01-25 HC (rev. 30-Sept-2013)   |           |  |       |                     |                    |   |   |                             |   |   |           |   |  |  |                    |  |  |                                 |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |           |       |         |      |      |     |   |   |   |   |   |   |  |  |  |    |          |         |      |      |     |   |   |   |   |   |   |  |  |  |    |           |         |      |      |     |   |   |   |   |   |   |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |   |   |   |  |  |  |    |       |         |       |      |     |  |   |   |   |  |  |  |  |  |    |      |         |       |      |     |  |   |   |  |  |  |  |  |  |    |       |         |       |      |     |   |   |   |  |  |  |  |  |  |    |           |         |       |      |     |   |   |   |   |   |   |  |  |  |  |  |



|  <b>NEW YORK CHAIN OF CUSTODY</b><br>Westborough, MA 01581<br>8 Walkup Dr.<br>TEL: 508-898-9220<br>FAX: 508-898-9193<br>Mansfield, MA 02048<br>320 Forbes Blvd<br>TEL: 508-822-9300<br>FAX: 508-822-3288  |           | <b>Service Centers</b><br>Mahwah, NJ 07430: 35 Whitney Rd, Suite 5<br>Albany, NY 12205: 14 Walker Way<br>Tonawanda, NY 14150: 275 Cooper Ave, Suite 105  |      | Page _____ of _____   |                    | <b>Date Rec'd in Lab</b> 7/19/17  |   | <b>ALPHA Job #</b><br>L1724590                                     |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|---|-----------|--|------|---|--------------------|---|---|--|---|---|--------------------------------|--|------------|--|---------------|--------------------|--|--|--|--|--|--|--|--|--|--|------|------|--|--|--|--|--|--|--|--|--|--|----------|-------|---------|------|------|-----|--|--|--|--|--|--|--|--|--|--|--|--|--|--|----|-------|---------|--|------|-----|--|--|--|--|--|--|--|--|--|--|--|--|--|--|----|------|---------|------|------|-----|---|---|---|---|---|---|--|--|--|--|--|--|--|--|----|------|---------|--|------|-----|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|----------------|--|--|--|--|--|--|--|--|--|--|--------------|---|---|---|---|---|--|--|--|--|--|--|
|   |           | <b>Project Information</b><br>Project Name: <u>Mind E Balcom</u><br>Project Location: _____<br>Project # _____<br>(Use Project name as Project #) <input type="checkbox"/>                                       |      |   |                    | <b>Deliverables</b><br><input type="checkbox"/> ASP-A <input type="checkbox"/> ASP-B<br><input type="checkbox"/> EQuIS (1 File) <input type="checkbox"/> EQuIS (4 File)<br><input type="checkbox"/> Other   |   |  |   | <b>Billing Information</b><br><input type="checkbox"/> Same as Client Info<br>PO # _____  |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           | <b>Client Information</b><br>Client: <u>Benchmark Env.</u><br>Address: <u>2559 Hamburg Turnpike</u><br><u>Buffalo NY 14218</u><br>Phone: <u>716-856-0599</u><br>Fax: _____<br>Email: <u>kmunio@benchmark.com</u> |      |   |                    | <b>Regulatory Requirement</b><br><input type="checkbox"/> NY TOGS <input type="checkbox"/> NY Part 375<br><input type="checkbox"/> AWQ Standards <input type="checkbox"/> NY CP-51<br><input type="checkbox"/> NY Restricted Use <input type="checkbox"/> Other<br><input type="checkbox"/> NY Unrestricted Use<br><input type="checkbox"/> NYC Sewer Discharge   |   |  |   | <b>Disposal Site Information</b><br>Please identify below location of applicable disposal facilities.<br>Disposal Facility: _____<br><input type="checkbox"/> NJ <input type="checkbox"/> NY<br><input type="checkbox"/> Other: _____ |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| <b>Turn-Around Time</b><br>Standard <input checked="" type="checkbox"/> Due Date: _____<br>Rush (only if pre approved) <input type="checkbox"/> # of Days: _____  |           |  |      |   |                    | <b>ANALYSIS</b><br><div style="display: flex; justify-content: space-between;"> <div style="width: 60%;">           VOC 8260C<br/>           Fullset<br/>           TEL SVOCs 8270<br/>           TAL Metals local<br/>           PCBs 8082<br/>           Pest 8081<br/>           Herb 8151         </div> <div style="width: 35%;"> <input type="checkbox"/> Done<br/> <input type="checkbox"/> Lab to do<br/> <b>Preservation</b><br/> <input type="checkbox"/> Lab to do<br/>           (Please Specify below)         </div> </div> |   |  |   | Total Bottles   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| These samples have been previously analyzed by Alpha <input type="checkbox"/><br>Other project specific requirements/comments: <u>CAT B.</u>  |           |  |      |   |                    | <b>Sample Filtration</b><br><input type="checkbox"/> Done<br><input type="checkbox"/> Lab to do<br><b>Preservation</b><br><input type="checkbox"/> Lab to do<br>(Please Specify below)  |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| Please specify Metals or TAL.   |           |  |      |   |                    | <b>Sample Specific Comments</b>   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| <table border="1" style="width:100%; border-collapse: collapse;"> <thead> <tr> <th rowspan="2">ALPHA Lab ID<br/>(Lab Use Only)</th> <th rowspan="2">Sample ID</th> <th colspan="2">Collection</th> <th rowspan="2">Sample Matrix</th> <th rowspan="2">Sampler's Initials</th> <th colspan="10"></th> </tr> <tr> <th>Date</th> <th>Time</th> <th colspan="10"></th> </tr> </thead> <tbody> <tr> <td>24590-09</td> <td>TP-12</td> <td>7-18-17</td> <td>1:50</td> <td>Soil</td> <td>CCB</td> <td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>10</td> <td>TP-11</td> <td>7-18-17</td> <td></td> <td>Soil</td> <td>CCB</td> <td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>11</td> <td>NS-3</td> <td>7-18-17</td> <td>2:30</td> <td>Soil</td> <td>CCB</td> 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<td>A</td><td>A</td><td>A</td><td>A</td><td>A</td><td></td><td></td><td></td><td></td><td></td><td></td> </tr> </tbody> </table> |  |  |  | Container Type |  |  |  |  |  |  |  |  |  |  | Preservative | A | A | A | A | A |  |  |  |  |  |  |
| ALPHA Lab ID<br>(Lab Use Only)  | Sample ID | Collection   |      | Sample Matrix   | Sampler's Initials |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           | Date   | Time |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| 24590-09  | TP-12     | 7-18-17  | 1:50 | Soil  | CCB                |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| 10  | TP-11     | 7-18-17  |      | Soil  | CCB                |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| 11  | NS-3      | 7-18-17  | 2:30 | Soil  | CCB                | X   | X | X  | X | X   | X                              |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| 12  | NS-4      | 7-18-17  |      | Soil  | CCB                |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
|   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| Container Type  |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| Preservative  | A         | A  | A    | A   | A                  |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| Preservative Code:<br>A = None<br>B = HCl<br>C = HNO <sub>3</sub><br>D = H <sub>2</sub> SO <sub>4</sub><br>E = NaOH<br>F = MeOH<br>G = NaHSO <sub>4</sub><br>H = Na <sub>2</sub> S <sub>2</sub> O <sub>3</sub><br>K/E = Zn Ac/NaOH<br>O = Other   |           | Container Code:<br>P = Plastic<br>A = Amber Glass<br>V = Vial<br>G = Glass<br>B = Bacteria Cup<br>C = Cube<br>O = Other<br>E = Encore<br>D = BOD Bottle  |      | Westboro: Certification No: MA935<br>Mansfield: Certification No: MA015 |                    | Relinquished By: <u>[Signature]</u><br>Date/Time: <u>7/18/17 16:00</u>  |   | Received By: <u>[Signature]</u><br>Date/Time: <u>7/18/17 16:00</u> |   | Date/Time: <u>7/19/17 1:30</u>  |                                | Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.) |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |
| Form No: 01-25 HC (rev. 30-Sept-2013)   |           |  |      |   |                    |   |   |  |   |   |                                |  |            |  |               |                    |  |  |  |  |  |  |  |  |  |  |      |      |  |  |  |  |  |  |  |  |  |  |          |       |         |      |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |       |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |      |         |      |      |     |   |   |   |   |   |   |  |  |  |  |  |  |  |  |    |      |         |  |      |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |  |              |   |   |   |   |   |  |  |  |  |  |  |





## ANALYTICAL REPORT

|                 |   |
|-----------------|---|
| Lab Number:     | L1733060  |
| Client:         | Turnkey Environmental Restoration, LLC<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley   |
| Phone:          | (716) 856-0599  |
| Project Name:   | MAIN & EAST BALCOM STREET SITE  |
| Project Number: | B0239-016-001-004   |
| Report Date:    | 09/26/17  |

The original project report/data package is held by Alpha Analytical. This report/data package is paginated and should be reproduced only in its entirety. Alpha Analytical holds no responsibility for results and/or data that are not consistent with the original.

Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)



**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1733060-01                | MW-1 (16-18')    | SOIL          | BUFFALO, NY                | 09/18/17 10:30                  | 09/18/17            |
| L1733060-02                | MW-2 (18-20')    | SOIL          | BUFFALO, NY                | 09/18/17 13:40                  | 09/18/17            |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

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**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

**Case Narrative (continued)**

Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

Total Metals

L1733060-01 and -02: The samples have elevated detection limits for all elements, with the exception of mercury, due to the dilution required by matrix interferences encountered during analysis.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:



Kara Lindquist

Title: Technical Director/Representative

Date: 09/26/17

# ORGANICS

# **VOLATILES**

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733060-01  
 Client ID: MW-1 (16-18')  
 Sample Location: BUFFALO, NY

Date Collected: 09/18/17 10:30  
 Date Received: 09/18/17  
 Field Prep: Not Specified

Matrix: Soil  
 Analytical Method: 1,8260C  
 Analytical Date: 09/23/17 19:18  
 Analyst: JC  
 Percent Solids: 84%

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                               | ND     |           | ug/kg | 8.8  | 1.4  | 1               |
| 1,1-Dichloroethane                               | ND     |           | ug/kg | 1.3  | 0.24 | 1               |
| Chloroform                                       | ND     |           | ug/kg | 1.3  | 0.32 | 1               |
| Carbon tetrachloride                             | ND     |           | ug/kg | 0.88 | 0.30 | 1               |
| 1,2-Dichloropropane                              | ND     |           | ug/kg | 3.1  | 0.20 | 1               |
| Dibromochloromethane                             | ND     |           | ug/kg | 0.88 | 0.15 | 1               |
| 1,1,2-Trichloroethane                            | ND     |           | ug/kg | 1.3  | 0.27 | 1               |
| Tetrachloroethene                                | ND     |           | ug/kg | 0.88 | 0.26 | 1               |
| Chlorobenzene                                    | ND     |           | ug/kg | 0.88 | 0.30 | 1               |
| Trichlorofluoromethane                           | ND     |           | ug/kg | 4.4  | 0.36 | 1               |
| 1,2-Dichloroethane                               | ND     |           | ug/kg | 0.88 | 0.22 | 1               |
| 1,1,1-Trichloroethane                            | ND     |           | ug/kg | 0.88 | 0.31 | 1               |
| Bromodichloromethane                             | ND     |           | ug/kg | 0.88 | 0.27 | 1               |
| trans-1,3-Dichloropropene                        | ND     |           | ug/kg | 0.88 | 0.18 | 1               |
| cis-1,3-Dichloropropene                          | ND     |           | ug/kg | 0.88 | 0.20 | 1               |
| Bromoform  | ND     |           | ug/kg | 3.5  | 0.21 | 1               |
| 1,1,2,2-Tetrachloroethane                        | ND     |           | ug/kg | 0.88 | 0.26 | 1               |
| Benzene  | ND     |           | ug/kg | 0.88 | 0.17 | 1               |
| Toluene  | ND     |           | ug/kg | 1.3  | 0.17 | 1               |
| Ethylbenzene                                     | ND     |           | ug/kg | 0.88 | 0.15 | 1               |
| Chloromethane                                    | ND     |           | ug/kg | 4.4  | 0.38 | 1               |
| Bromomethane                                     | ND     |           | ug/kg | 1.8  | 0.30 | 1               |
| Vinyl chloride                                   | ND     |           | ug/kg | 1.8  | 0.28 | 1               |
| Chloroethane                                     | ND     |           | ug/kg | 1.8  | 0.28 | 1               |
| 1,1-Dichloroethene                               | ND     |           | ug/kg | 0.88 | 0.33 | 1               |
| trans-1,2-Dichloroethene                         | ND     |           | ug/kg | 1.3  | 0.21 | 1               |
| Trichloroethene                                  | ND     |           | ug/kg | 0.88 | 0.26 | 1               |
| 1,2-Dichlorobenzene                              | ND     |           | ug/kg | 4.4  | 0.16 | 1               |
| 1,3-Dichlorobenzene                              | ND     |           | ug/kg | 4.4  | 0.19 | 1               |
| 1,4-Dichlorobenzene                              | ND     |           | ug/kg | 4.4  | 0.16 | 1               |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS****Lab ID:** L1733060-01**Date Collected:** 09/18/17 10:30**Client ID:** MW-1 (16-18')**Date Received:** 09/18/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |      |      |                 |
| Methyl tert butyl ether                          | ND     |           | ug/kg | 1.8  | 0.13 | 1               |
| p/m-Xylene                                       | ND     |           | ug/kg | 1.8  | 0.31 | 1               |
| o-Xylene   | ND     |           | ug/kg | 1.8  | 0.30 | 1               |
| cis-1,2-Dichloroethene                           | ND     |           | ug/kg | 0.88 | 0.30 | 1               |
| Styrene  | ND     |           | ug/kg | 1.8  | 0.35 | 1               |
| Dichlorodifluoromethane                          | ND     |           | ug/kg | 8.8  | 0.44 | 1               |
| Acetone  | 3.8    | J         | ug/kg | 8.8  | 2.0  | 1               |
| Carbon disulfide                                 | ND     |           | ug/kg | 8.8  | 0.96 | 1               |
| 2-Butanone                                       | ND     |           | ug/kg | 8.8  | 0.60 | 1               |
| 4-Methyl-2-pentanone                             | ND     |           | ug/kg | 8.8  | 0.21 | 1               |
| 2-Hexanone                                       | ND     |           | ug/kg | 8.8  | 0.58 | 1               |
| Bromochloromethane                               | ND     |           | ug/kg | 4.4  | 0.31 | 1               |
| 1,2-Dibromoethane                                | ND     |           | ug/kg | 3.5  | 0.17 | 1               |
| n-Butylbenzene                                   | ND     |           | ug/kg | 0.88 | 0.20 | 1               |
| sec-Butylbenzene                                 | 0.28   | J         | ug/kg | 0.88 | 0.19 | 1               |
| 1,2-Dibromo-3-chloropropane                      | ND     |           | ug/kg | 4.4  | 0.35 | 1               |
| Isopropylbenzene                                 | 1.1    |           | ug/kg | 0.88 | 0.17 | 1               |
| p-Isopropyltoluene                               | ND     |           | ug/kg | 0.88 | 0.18 | 1               |
| n-Propylbenzene                                  | ND     |           | ug/kg | 0.88 | 0.19 | 1               |
| 1,2,3-Trichlorobenzene                           | ND     |           | ug/kg | 4.4  | 0.22 | 1               |
| 1,2,4-Trichlorobenzene                           | ND     |           | ug/kg | 4.4  | 0.19 | 1               |
| 1,3,5-Trimethylbenzene                           | 0.88   | J         | ug/kg | 4.4  | 0.14 | 1               |
| 1,2,4-Trimethylbenzene                           | ND     |           | ug/kg | 4.4  | 0.16 | 1               |
| Methyl Acetate                                   | ND     |           | ug/kg | 18   | 0.40 | 1               |
| Cyclohexane                                      | ND     |           | ug/kg | 18   | 0.38 | 1               |
| 1,4-Dioxane                                      | ND     |           | ug/kg | 35   | 13.  | 1               |
| Freon-113  | ND     |           | ug/kg | 18   | 0.45 | 1               |
| Methyl cyclohexane                               | 1.4    | J         | ug/kg | 3.5  | 0.21 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 125        |           | 70-130              |
| Toluene-d8            | 119        |           | 70-130              |
| 4-Bromofluorobenzene  | 112        |           | 70-130              |
| Dibromofluoromethane  | 113        |           | 70-130              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 09/23/17 11:06  
 Analyst: MV

| Parameter   | Result | Qualifier | Units | RL  | MDL  |
|---|--------|-----------|-------|-----|------|
| Volatile Organics by 8260/5035 - Westborough Lab for sample(s): 01 Batch: WG1044984-5 |        |           |       |     |      |
| Methylene chloride  | ND     |           | ug/kg | 10  | 1.6  |
| 1,1-Dichloroethane  | ND     |           | ug/kg | 1.5 | 0.27 |
| Chloroform  | ND     |           | ug/kg | 1.5 | 0.37 |
| Carbon tetrachloride  | ND     |           | ug/kg | 1.0 | 0.34 |
| 1,2-Dichloropropane   | ND     |           | ug/kg | 3.5 | 0.23 |
| Dibromochloromethane  | ND     |           | ug/kg | 1.0 | 0.18 |
| 1,1,2-Trichloroethane   | ND     |           | ug/kg | 1.5 | 0.31 |
| Tetrachloroethene   | ND     |           | ug/kg | 1.0 | 0.30 |
| Chlorobenzene   | ND     |           | ug/kg | 1.0 | 0.35 |
| Trichlorofluoromethane  | ND     |           | ug/kg | 5.0 | 0.42 |
| 1,2-Dichloroethane  | ND     |           | ug/kg | 1.0 | 0.25 |
| 1,1,1-Trichloroethane   | ND     |           | ug/kg | 1.0 | 0.35 |
| Bromodichloromethane  | ND     |           | ug/kg | 1.0 | 0.31 |
| trans-1,3-Dichloropropene   | ND     |           | ug/kg | 1.0 | 0.21 |
| cis-1,3-Dichloropropene   | ND     |           | ug/kg | 1.0 | 0.23 |
| Bromoform   | ND     |           | ug/kg | 4.0 | 0.24 |
| 1,1,2,2-Tetrachloroethane   | ND     |           | ug/kg | 1.0 | 0.30 |
| Benzene   | ND     |           | ug/kg | 1.0 | 0.19 |
| Toluene   | ND     |           | ug/kg | 1.5 | 0.20 |
| Ethylbenzene  | ND     |           | ug/kg | 1.0 | 0.17 |
| Chloromethane   | ND     |           | ug/kg | 5.0 | 0.44 |
| Bromomethane  | ND     |           | ug/kg | 2.0 | 0.34 |
| Vinyl chloride  | ND     |           | ug/kg | 2.0 | 0.32 |
| Chloroethane  | ND     |           | ug/kg | 2.0 | 0.32 |
| 1,1-Dichloroethene  | ND     |           | ug/kg | 1.0 | 0.37 |
| trans-1,2-Dichloroethene  | ND     |           | ug/kg | 1.5 | 0.24 |
| Trichloroethene   | ND     |           | ug/kg | 1.0 | 0.30 |
| 1,2-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.18 |
| 1,3-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.22 |

Project Name: MAIN &amp; EAST BALCOM STREET SITE

Lab Number: L1733060

Project Number: B0239-016-001-004

Report Date: 09/26/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 09/23/17 11:06  
 Analyst: MV

| Parameter   | Result | Qualifier | Units | RL  | MDL  |
|---|--------|-----------|-------|-----|------|
| Volatile Organics by 8260/5035 - Westborough Lab for sample(s): 01 Batch: WG1044984-5 |        |           |       |     |      |
| 1,4-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.18 |
| Methyl tert butyl ether   | ND     |           | ug/kg | 2.0 | 0.15 |
| p/m-Xylene  | ND     |           | ug/kg | 2.0 | 0.35 |
| o-Xylene  | ND     |           | ug/kg | 2.0 | 0.34 |
| cis-1,2-Dichloroethene  | ND     |           | ug/kg | 1.0 | 0.34 |
| Styrene   | ND     |           | ug/kg | 2.0 | 0.40 |
| Dichlorodifluoromethane   | ND     |           | ug/kg | 10  | 0.50 |
| Acetone   | ND     |           | ug/kg | 10  | 2.3  |
| Carbon disulfide  | ND     |           | ug/kg | 10  | 1.1  |
| 2-Butanone  | ND     |           | ug/kg | 10  | 0.69 |
| 4-Methyl-2-pentanone  | ND     |           | ug/kg | 10  | 0.24 |
| 2-Hexanone  | ND     |           | ug/kg | 10  | 0.67 |
| Bromochloromethane  | ND     |           | ug/kg | 5.0 | 0.36 |
| 1,2-Dibromoethane   | ND     |           | ug/kg | 4.0 | 0.20 |
| n-Butylbenzene  | ND     |           | ug/kg | 1.0 | 0.23 |
| sec-Butylbenzene  | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,2-Dibromo-3-chloropropane   | ND     |           | ug/kg | 5.0 | 0.40 |
| Isopropylbenzene  | ND     |           | ug/kg | 1.0 | 0.19 |
| p-Isopropyltoluene  | ND     |           | ug/kg | 1.0 | 0.20 |
| n-Propylbenzene   | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,2,3-Trichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.25 |
| 1,2,4-Trichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.22 |
| 1,3,5-Trimethylbenzene  | ND     |           | ug/kg | 5.0 | 0.16 |
| 1,2,4-Trimethylbenzene  | ND     |           | ug/kg | 5.0 | 0.19 |
| Methyl Acetate  | ND     |           | ug/kg | 20  | 0.46 |
| Cyclohexane   | ND     |           | ug/kg | 20  | 0.43 |
| 1,4-Dioxane   | ND     |           | ug/kg | 40  | 14.  |
| Freon-113   | ND     |           | ug/kg | 20  | 0.51 |
| Methyl cyclohexane  | ND     |           | ug/kg | 4.0 | 0.24 |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**Method Blank Analysis**  
**Batch Quality Control**

Analytical Method: 1,8260C  
Analytical Date: 09/23/17 11:06  
Analyst: MV

| Parameter   | Result | Qualifier | Units | RL | MDL |
|---|--------|-----------|-------|----|-----|
| Volatile Organics by 8260/5035 - Westborough Lab for sample(s): 01 Batch: WG1044984-5 |        |           |       |    |     |

| Surrogate             | %Recovery | Qualifier | Acceptance<br>Criteria |
|-----------------------|-----------|-----------|------------------------|
| 1,2-Dichloroethane-d4 | 117       |           | 70-130                 |
| Toluene-d8            | 117       |           | 70-130                 |
| 4-Bromofluorobenzene  | 102       |           | 70-130                 |
| Dibromofluoromethane  | 108       |           | 70-130                 |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733060

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01 Batch: WG1044984-3 WG1044984-4 |                  |      |                   |      |                     |     |      |               |
| Methylene chloride   | 98               |      | 98                |      | 70-130              | 0   |      | 30            |
| 1,1-Dichloroethane   | 96               |      | 95                |      | 70-130              | 1   |      | 30            |
| Chloroform   | 97               |      | 97                |      | 70-130              | 0   |      | 30            |
| Carbon tetrachloride   | 94               |      | 93                |      | 70-130              | 1   |      | 30            |
| 1,2-Dichloropropane  | 92               |      | 92                |      | 70-130              | 0   |      | 30            |
| Dibromochloromethane   | 95               |      | 94                |      | 70-130              | 1   |      | 30            |
| 1,1,2-Trichloroethane  | 110              |      | 111               |      | 70-130              | 1   |      | 30            |
| Tetrachloroethene  | 109              |      | 105               |      | 70-130              | 4   |      | 30            |
| Chlorobenzene  | 109              |      | 108               |      | 70-130              | 1   |      | 30            |
| Trichlorofluoromethane   | 126              |      | 120               |      | 70-139              | 5   |      | 30            |
| 1,2-Dichloroethane   | 91               |      | 89                |      | 70-130              | 2   |      | 30            |
| 1,1,1-Trichloroethane  | 103              |      | 100               |      | 70-130              | 3   |      | 30            |
| Bromodichloromethane   | 95               |      | 94                |      | 70-130              | 1   |      | 30            |
| trans-1,3-Dichloropropene  | 111              |      | 113               |      | 70-130              | 2   |      | 30            |
| cis-1,3-Dichloropropene  | 98               |      | 96                |      | 70-130              | 2   |      | 30            |
| Bromoform  | 101              |      | 100               |      | 70-130              | 1   |      | 30            |
| 1,1,2,2-Tetrachloroethane  | 108              |      | 107               |      | 70-130              | 1   |      | 30            |
| Benzene  | 97               |      | 95                |      | 70-130              | 2   |      | 30            |
| Toluene  | 117              |      | 115               |      | 70-130              | 2   |      | 30            |
| Ethylbenzene   | 122              |      | 120               |      | 70-130              | 2   |      | 30            |
| Chloromethane  | 94               |      | 90                |      | 52-130              | 4   |      | 30            |
| Bromomethane   | 119              |      | 113               |      | 57-147              | 5   |      | 30            |
| Vinyl chloride   | 106              |      | 100               |      | 67-130              | 6   |      | 30            |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Project Number:** B0239-016-001-004

**Lab Number:** L1733060

**Report Date:** 09/26/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01 Batch: WG1044984-3 WG1044984-4 |                  |      |                   |      |                     |     |      |               |
| Chloroethane   | 118              |      | 107               |      | 50-151              | 10  |      | 30            |
| 1,1-Dichloroethene   | 110              |      | 109               |      | 65-135              | 1   |      | 30            |
| trans-1,2-Dichloroethene   | 102              |      | 100               |      | 70-130              | 2   |      | 30            |
| Trichloroethene  | 100              |      | 96                |      | 70-130              | 4   |      | 30            |
| 1,2-Dichlorobenzene  | 98               |      | 95                |      | 70-130              | 3   |      | 30            |
| 1,3-Dichlorobenzene  | 99               |      | 96                |      | 70-130              | 3   |      | 30            |
| 1,4-Dichlorobenzene  | 97               |      | 93                |      | 70-130              | 4   |      | 30            |
| Methyl tert butyl ether  | 91               |      | 90                |      | 66-130              | 1   |      | 30            |
| p/m-Xylene   | 110              |      | 109               |      | 70-130              | 1   |      | 30            |
| o-Xylene   | 109              |      | 106               |      | 70-130              | 3   |      | 30            |
| cis-1,2-Dichloroethene   | 99               |      | 97                |      | 70-130              | 2   |      | 30            |
| Styrene  | 105              |      | 104               |      | 70-130              | 1   |      | 30            |
| Dichlorodifluoromethane  | 96               |      | 90                |      | 30-146              | 6   |      | 30            |
| Acetone  | 74               |      | 80                |      | 54-140              | 8   |      | 30            |
| Carbon disulfide   | 98               |      | 95                |      | 59-130              | 3   |      | 30            |
| 2-Butanone   | 77               |      | 75                |      | 70-130              | 3   |      | 30            |
| 4-Methyl-2-pentanone   | 96               |      | 94                |      | 70-130              | 2   |      | 30            |
| 2-Hexanone   | 88               |      | 86                |      | 70-130              | 2   |      | 30            |
| Bromochloromethane   | 86               |      | 83                |      | 70-130              | 4   |      | 30            |
| 1,2-Dibromoethane  | 106              |      | 104               |      | 70-130              | 2   |      | 30            |
| n-Butylbenzene   | 122              |      | 118               |      | 70-130              | 3   |      | 30            |
| sec-Butylbenzene   | 111              |      | 109               |      | 70-130              | 2   |      | 30            |
| 1,2-Dibromo-3-chloropropane  | 92               |      | 89                |      | 68-130              | 3   |      | 30            |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Project Number:** B0239-016-001-004

**Lab Number:** L1733060

**Report Date:** 09/26/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01 Batch: WG1044984-3 WG1044984-4 |                  |      |                   |      |                     |     |      |               |
| Isopropylbenzene   | 114              |      | 109               |      | 70-130              | 4   |      | 30            |
| p-Isopropyltoluene   | 110              |      | 106               |      | 70-130              | 4   |      | 30            |
| n-Propylbenzene  | 122              |      | 118               |      | 70-130              | 3   |      | 30            |
| 1,2,3-Trichlorobenzene   | 102              |      | 102               |      | 70-130              | 0   |      | 30            |
| 1,2,4-Trichlorobenzene   | 106              |      | 104               |      | 70-130              | 2   |      | 30            |
| 1,3,5-Trimethylbenzene   | 114              |      | 111               |      | 70-130              | 3   |      | 30            |
| 1,2,4-Trimethylbenzene   | 114              |      | 110               |      | 70-130              | 4   |      | 30            |
| Methyl Acetate   | 83               |      | 82                |      | 51-146              | 1   |      | 30            |
| Cyclohexane  | 106              |      | 101               |      | 59-142              | 5   |      | 30            |
| 1,4-Dioxane  | 77               |      | 75                |      | 65-136              | 3   |      | 30            |
| Freon-113  | 114              |      | 110               |      | 50-139              | 4   |      | 30            |
| Methyl cyclohexane   | 110              |      | 106               |      | 70-130              | 4   |      | 30            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 106              |      | 106               |      | 70-130                 |
| Toluene-d8            | 120              |      | 120               |      | 70-130                 |
| 4-Bromofluorobenzene  | 107              |      | 104               |      | 70-130                 |
| Dibromofluoromethane  | 101              |      | 103               |      | 70-130                 |

# SEMIVOLATILES

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733060-01  
 Client ID: MW-1 (16-18')  
 Sample Location: BUFFALO, NY

Date Collected: 09/18/17 10:30  
 Date Received: 09/18/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3546  
 Extraction Date: 09/20/17 18:10

Matrix: Soil  
 Analytical Method: 1,8270D  
 Analytical Date: 09/22/17 16:33  
 Analyst: CB  
 Percent Solids: 84%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 160 | 20. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 120 | 22. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 170 | 26. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 190 | 19. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 190 | 52. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 39. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 33. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 120 | 22. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 190 | 21. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 190 | 30. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 230 | 33. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 210 | 19. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 190 | 28. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 560 | 180 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 160 | 31. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 170 | 25. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 24. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 170 | 29. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 160 | 22. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 190 | 30. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 190 | 67. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 190 | 49. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 190 | 37. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 190 | 66. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 190 | 18. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 190 | 41. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 120 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 160 | 47. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 120 | 33. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 120 | 31. | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS****Lab ID:** L1733060-01**Date Collected:** 09/18/17 10:30**Client ID:** MW-1 (16-18')**Date Received:** 09/18/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | ND     |           | ug/kg | 120 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 160 | 30. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 120 | 38. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 160 | 23. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 19. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 120 | 24. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 120 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 160 | 27. | 1               |
| Pyrene   | ND     |           | ug/kg | 120 | 19. | 1               |
| Biphenyl   | ND     |           | ug/kg | 440 | 45. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 190 | 35. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 190 | 37. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 190 | 37. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 190 | 80. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 190 | 18. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 230 | 23. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 190 | 20. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 190 | 24. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 120 | 37. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 190 | 29. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 190 | 23. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 170 | 31. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 190 | 64. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 420 | 73. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 270 | 79. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 930 | 90. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 500 | 93. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 160 | 43. | 1               |
| Phenol   | ND     |           | ug/kg | 190 | 29. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 190 | 30. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 280 | 30. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 190 | 37. | 1               |
| Carbazole  | ND     |           | ug/kg | 190 | 19. | 1               |
| Atrazine   | ND     |           | ug/kg | 160 | 68. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 260 | 52. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 190 | 59. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 190 | 39. | 1               |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733060-01

Date Collected: 09/18/17 10:30

Client ID: MW-1 (16-18')

Date Received: 09/18/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 112        |           | 25-120              |
| Phenol-d6            | 112        |           | 10-120              |
| Nitrobenzene-d5      | <b>123</b> | Q         | 23-120              |
| 2-Fluorobiphenyl     | 105        |           | 30-120              |
| 2,4,6-Tribromophenol | 119        |           | 10-136              |
| 4-Terphenyl-d14      | <b>122</b> | Q         | 18-120              |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733060-02  
 Client ID: MW-2 (18-20')  
 Sample Location: BUFFALO, NY

Date Collected: 09/18/17 13:40  
 Date Received: 09/18/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3546  
 Extraction Date: 09/20/17 18:10

Matrix: Soil  
 Analytical Method: 1,8270D  
 Analytical Date: 09/22/17 17:53  
 Analyst: CB  
 Percent Solids: 83%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 160 | 20. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 120 | 22. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 180 | 27. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 200 | 19. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 200 | 52. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 200 | 39. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 200 | 34. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 120 | 22. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 200 | 21. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 200 | 30. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 240 | 34. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 210 | 20. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 200 | 29. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 560 | 180 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 160 | 32. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 180 | 26. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 200 | 24. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 180 | 29. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 160 | 22. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 200 | 30. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 200 | 68. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 200 | 50. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 200 | 37. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 200 | 67. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 200 | 18. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 200 | 41. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 120 | 22. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 160 | 48. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 120 | 33. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 120 | 31. | 1               |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS****Lab ID:** L1733060-02**Date Collected:** 09/18/17 13:40**Client ID:** MW-2 (18-20')**Date Received:** 09/18/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | ND     |           | ug/kg | 120 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 160 | 30. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 120 | 38. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 160 | 23. | 1               |
| Fluorene   | ND     |           | ug/kg | 200 | 19. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 120 | 24. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 120 | 23. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 160 | 27. | 1               |
| Pyrene   | ND     |           | ug/kg | 120 | 20. | 1               |
| Biphenyl   | ND     |           | ug/kg | 450 | 46. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 200 | 36. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 200 | 38. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 200 | 37. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 200 | 81. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 200 | 18. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 240 | 24. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 200 | 20. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 200 | 24. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 120 | 37. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 200 | 29. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 200 | 23. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 180 | 32. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 200 | 65. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 420 | 74. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 280 | 80. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 940 | 92. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 510 | 94. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 160 | 43. | 1               |
| Phenol   | ND     |           | ug/kg | 200 | 30. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 200 | 30. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 280 | 31. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 200 | 38. | 1               |
| Carbazole  | ND     |           | ug/kg | 200 | 19. | 1               |
| Atrazine   | ND     |           | ug/kg | 160 | 69. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 260 | 53. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 200 | 60. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 200 | 40. | 1               |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733060-02

Date Collected: 09/18/17 13:40

Client ID: MW-2 (18-20')

Date Received: 09/18/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 89         |           | 25-120              |
| Phenol-d6            | 88         |           | 10-120              |
| Nitrobenzene-d5      | 98         |           | 23-120              |
| 2-Fluorobiphenyl     | 83         |           | 30-120              |
| 2,4,6-Tribromophenol | 91         |           | 10-136              |
| 4-Terphenyl-d14      | 94         |           | 18-120              |

Project Name: MAIN &amp; EAST BALCOM STREET SITE

Lab Number: L1733060

Project Number: B0239-016-001-004

Report Date: 09/26/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 09/21/17 15:54  
 Analyst: SZ

Extraction Method: EPA 3546  
 Extraction Date: 09/20/17 07:25

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1043551-1 |        |           |       |     |     |
| Acenaphthene   | ND     |           | ug/kg | 130 | 17. |
| Hexachlorobenzene  | ND     |           | ug/kg | 98  | 18. |
| Bis(2-chloroethyl)ether  | ND     |           | ug/kg | 150 | 22. |
| 2-Chloronaphthalene  | ND     |           | ug/kg | 160 | 16. |
| 3,3'-Dichlorobenzidine   | ND     |           | ug/kg | 160 | 43. |
| 2,4-Dinitrotoluene   | ND     |           | ug/kg | 160 | 32. |
| 2,6-Dinitrotoluene   | ND     |           | ug/kg | 160 | 28. |
| Fluoranthene   | ND     |           | ug/kg | 98  | 19. |
| 4-Chlorophenyl phenyl ether  | ND     |           | ug/kg | 160 | 17. |
| 4-Bromophenyl phenyl ether   | ND     |           | ug/kg | 160 | 25. |
| Bis(2-chloroisopropyl)ether  | ND     |           | ug/kg | 200 | 28. |
| Bis(2-chloroethoxy)methane   | ND     |           | ug/kg | 180 | 16. |
| Hexachlorobutadiene  | ND     |           | ug/kg | 160 | 24. |
| Hexachlorocyclopentadiene  | ND     |           | ug/kg | 460 | 150 |
| Hexachloroethane   | ND     |           | ug/kg | 130 | 26. |
| Isophorone   | ND     |           | ug/kg | 150 | 21. |
| Naphthalene  | ND     |           | ug/kg | 160 | 20. |
| Nitrobenzene   | ND     |           | ug/kg | 150 | 24. |
| NDPA/DPA   | ND     |           | ug/kg | 130 | 18. |
| n-Nitrosodi-n-propylamine  | ND     |           | ug/kg | 160 | 25. |
| Bis(2-ethylhexyl)phthalate   | ND     |           | ug/kg | 160 | 56. |
| Butyl benzyl phthalate   | ND     |           | ug/kg | 160 | 41. |
| Di-n-butylphthalate  | ND     |           | ug/kg | 160 | 31. |
| Di-n-octylphthalate  | ND     |           | ug/kg | 160 | 55. |
| Diethyl phthalate  | ND     |           | ug/kg | 160 | 15. |
| Dimethyl phthalate   | ND     |           | ug/kg | 160 | 34. |
| Benzo(a)anthracene   | ND     |           | ug/kg | 98  | 18. |
| Benzo(a)pyrene   | ND     |           | ug/kg | 130 | 40. |
| Benzo(b)fluoranthene   | ND     |           | ug/kg | 98  | 27. |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 09/21/17 15:54  
 Analyst: SZ

Extraction Method: EPA 3546  
 Extraction Date: 09/20/17 07:25

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1043551-1 |        |           |       |     |     |
| Benzo(k)fluoranthene   | ND     |           | ug/kg | 98  | 26. |
| Chrysene   | ND     |           | ug/kg | 98  | 17. |
| Acenaphthylene   | ND     |           | ug/kg | 130 | 25. |
| Anthracene   | ND     |           | ug/kg | 98  | 32. |
| Benzo(ghi)perylene   | ND     |           | ug/kg | 130 | 19. |
| Fluorene   | ND     |           | ug/kg | 160 | 16. |
| Phenanthrene   | ND     |           | ug/kg | 98  | 20. |
| Dibenzo(a,h)anthracene   | ND     |           | ug/kg | 98  | 19. |
| Indeno(1,2,3-cd)pyrene   | ND     |           | ug/kg | 130 | 23. |
| Pyrene   | ND     |           | ug/kg | 98  | 16. |
| Biphenyl   | ND     |           | ug/kg | 370 | 38. |
| 4-Chloroaniline  | ND     |           | ug/kg | 160 | 30. |
| 2-Nitroaniline   | ND     |           | ug/kg | 160 | 31. |
| 3-Nitroaniline   | ND     |           | ug/kg | 160 | 31. |
| 4-Nitroaniline   | ND     |           | ug/kg | 160 | 67. |
| Dibenzofuran   | ND     |           | ug/kg | 160 | 15. |
| 2-Methylnaphthalene  | ND     |           | ug/kg | 200 | 20. |
| 1,2,4,5-Tetrachlorobenzene   | ND     |           | ug/kg | 160 | 17. |
| Acetophenone   | ND     |           | ug/kg | 160 | 20. |
| 2,4,6-Trichlorophenol  | ND     |           | ug/kg | 98  | 31. |
| p-Chloro-m-cresol  | ND     |           | ug/kg | 160 | 24. |
| 2-Chlorophenol   | ND     |           | ug/kg | 160 | 19. |
| 2,4-Dichlorophenol   | ND     |           | ug/kg | 150 | 26. |
| 2,4-Dimethylphenol   | ND     |           | ug/kg | 160 | 54. |
| 2-Nitrophenol  | ND     |           | ug/kg | 350 | 61. |
| 4-Nitrophenol  | ND     |           | ug/kg | 230 | 66. |
| 2,4-Dinitrophenol  | ND     |           | ug/kg | 780 | 76. |
| 4,6-Dinitro-o-cresol   | ND     |           | ug/kg | 420 | 78. |
| Pentachlorophenol  | ND     |           | ug/kg | 130 | 36. |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**Method Blank Analysis  
Batch Quality Control**

Analytical Method: 1,8270D  
 Analytical Date: 09/21/17 15:54  
 Analyst: SZ

Extraction Method: EPA 3546  
 Extraction Date: 09/20/17 07:25

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1043551-1 |        |           |       |     |     |
| Phenol   | ND     |           | ug/kg | 160 | 24. |
| 2-Methylphenol   | ND     |           | ug/kg | 160 | 25. |
| 3-Methylphenol/4-Methylphenol  | ND     |           | ug/kg | 230 | 25. |
| 2,4,5-Trichlorophenol  | ND     |           | ug/kg | 160 | 31. |
| Carbazole  | ND     |           | ug/kg | 160 | 16. |
| Atrazine   | ND     |           | ug/kg | 130 | 57. |
| Benzaldehyde   | ND     |           | ug/kg | 210 | 44. |
| Caprolactam  | ND     |           | ug/kg | 160 | 49. |
| 2,3,4,6-Tetrachlorophenol  | ND     |           | ug/kg | 160 | 33. |

**Tentatively Identified Compounds**

No Tentatively Identified Compounds      ND      ug/kg

| Surrogate            | %Recovery | Qualifier | Acceptance<br>Criteria |
|----------------------|-----------|-----------|------------------------|
| 2-Fluorophenol       | 74        |           | 25-120                 |
| Phenol-d6            | 75        |           | 10-120                 |
| Nitrobenzene-d5      | 84        |           | 23-120                 |
| 2-Fluorobiphenyl     | 71        |           | 30-120                 |
| 2,4,6-Tribromophenol | 70        |           | 10-136                 |
| 4-Terphenyl-d14      | 69        |           | 18-120                 |



## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733060

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1043551-2 WG1043551-3 |                  |      |                   |      |                     |     |      |               |
| Acenaphthene  | 76               |      | 78                |      | 31-137              | 3   |      | 50            |
| Hexachlorobenzene   | 79               |      | 81                |      | 40-140              | 3   |      | 50            |
| Bis(2-chloroethyl)ether   | 78               |      | 92                |      | 40-140              | 16  |      | 50            |
| 2-Chloronaphthalene   | 80               |      | 88                |      | 40-140              | 10  |      | 50            |
| 3,3'-Dichlorobenzidine  | 65               |      | 70                |      | 40-140              | 7   |      | 50            |
| 2,4-Dinitrotoluene  | 89               |      | 92                |      | 40-132              | 3   |      | 50            |
| 2,6-Dinitrotoluene  | 88               |      | 98                |      | 40-140              | 11  |      | 50            |
| Fluoranthene  | 76               |      | 79                |      | 40-140              | 4   |      | 50            |
| 4-Chlorophenyl phenyl ether   | 76               |      | 79                |      | 40-140              | 4   |      | 50            |
| 4-Bromophenyl phenyl ether  | 80               |      | 82                |      | 40-140              | 2   |      | 50            |
| Bis(2-chloroisopropyl)ether   | 76               |      | 90                |      | 40-140              | 17  |      | 50            |
| Bis(2-chloroethoxy)methane  | 81               |      | 96                |      | 40-117              | 17  |      | 50            |
| Hexachlorobutadiene   | 76               |      | 84                |      | 40-140              | 10  |      | 50            |
| Hexachlorocyclopentadiene   | 61               |      | 71                |      | 40-140              | 15  |      | 50            |
| Hexachloroethane  | 75               |      | 88                |      | 40-140              | 16  |      | 50            |
| Isophorone  | 80               |      | 97                |      | 40-140              | 19  |      | 50            |
| Naphthalene   | 75               |      | 81                |      | 40-140              | 8   |      | 50            |
| Nitrobenzene  | 89               |      | 108               |      | 40-140              | 19  |      | 50            |
| NDPA/DPA  | 80               |      | 82                |      | 36-157              | 2   |      | 50            |
| n-Nitrosodi-n-propylamine   | 80               |      | 95                |      | 32-121              | 17  |      | 50            |
| Bis(2-ethylhexyl)phthalate  | 92               |      | 96                |      | 40-140              | 4   |      | 50            |
| Butyl benzyl phthalate  | 89               |      | 92                |      | 40-140              | 3   |      | 50            |
| Di-n-butylphthalate   | 83               |      | 86                |      | 40-140              | 4   |      | 50            |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1043551-2 WG1043551-3 |                  |      |                   |      |                     |     |      |               |
| Di-n-octylphthalate   | 88               |      | 91                |      | 40-140              | 3   |      | 50            |
| Diethyl phthalate   | 81               |      | 83                |      | 40-140              | 2   |      | 50            |
| Dimethyl phthalate  | 84               |      | 91                |      | 40-140              | 8   |      | 50            |
| Benzo(a)anthracene  | 79               |      | 81                |      | 40-140              | 3   |      | 50            |
| Benzo(a)pyrene  | 82               |      | 85                |      | 40-140              | 4   |      | 50            |
| Benzo(b)fluoranthene  | 82               |      | 84                |      | 40-140              | 2   |      | 50            |
| Benzo(k)fluoranthene  | 78               |      | 81                |      | 40-140              | 4   |      | 50            |
| Chrysene  | 76               |      | 78                |      | 40-140              | 3   |      | 50            |
| Acenaphthylene  | 82               |      | 91                |      | 40-140              | 10  |      | 50            |
| Anthracene  | 75               |      | 79                |      | 40-140              | 5   |      | 50            |
| Benzo(ghi)perylene  | 77               |      | 78                |      | 40-140              | 1   |      | 50            |
| Fluorene  | 78               |      | 80                |      | 40-140              | 3   |      | 50            |
| Phenanthrene  | 73               |      | 76                |      | 40-140              | 4   |      | 50            |
| Dibenzo(a,h)anthracene  | 75               |      | 77                |      | 40-140              | 3   |      | 50            |
| Indeno(1,2,3-cd)pyrene  | 79               |      | 80                |      | 40-140              | 1   |      | 50            |
| Pyrene  | 74               |      | 77                |      | 35-142              | 4   |      | 50            |
| Biphenyl  | 81               |      | 89                |      | 54-104              | 9   |      | 50            |
| 4-Chloroaniline   | 72               |      | 84                |      | 40-140              | 15  |      | 50            |
| 2-Nitroaniline  | 104              |      | 115               |      | 47-134              | 10  |      | 50            |
| 3-Nitroaniline  | 81               |      | 86                |      | 26-129              | 6   |      | 50            |
| 4-Nitroaniline  | 91               |      | 95                |      | 41-125              | 4   |      | 50            |
| Dibenzofuran  | 77               |      | 79                |      | 40-140              | 3   |      | 50            |
| 2-Methylnaphthalene   | 78               |      | 86                |      | 40-140              | 10  |      | 50            |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733060

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1043551-2 WG1043551-3 |                  |      |                   |      |                     |     |      |               |
| 1,2,4,5-Tetrachlorobenzene  | 79               |      | 87                |      | 40-117              | 10  |      | 50            |
| Acetophenone  | 80               |      | 96                |      | 14-144              | 18  |      | 50            |
| 2,4,6-Trichlorophenol   | 90               |      | 99                |      | 30-130              | 10  |      | 50            |
| p-Chloro-m-cresol   | 89               |      | 98                |      | 26-103              | 10  |      | 50            |
| 2-Chlorophenol  | 82               |      | 97                |      | 25-102              | 17  |      | 50            |
| 2,4-Dichlorophenol  | 86               |      | 104               |      | 30-130              | 19  |      | 50            |
| 2,4-Dimethylphenol  | 93               |      | 112               |      | 30-130              | 19  |      | 50            |
| 2-Nitrophenol   | 101              |      | 120               |      | 30-130              | 17  |      | 50            |
| 4-Nitrophenol   | 109              |      | 109               |      | 11-114              | 0   |      | 50            |
| 2,4-Dinitrophenol   | 63               |      | 64                |      | 4-130               | 2   |      | 50            |
| 4,6-Dinitro-o-cresol  | 97               |      | 98                |      | 10-130              | 1   |      | 50            |
| Pentachlorophenol   | 70               |      | 72                |      | 17-109              | 3   |      | 50            |
| Phenol  | 76               |      | 90                |      | 26-90               | 17  |      | 50            |
| 2-Methylphenol  | 84               |      | 100               |      | 30-130              | 17  |      | 50            |
| 3-Methylphenol/4-Methylphenol   | 84               |      | 102               |      | 30-130              | 19  |      | 50            |
| 2,4,5-Trichlorophenol   | 92               |      | 102               |      | 30-130              | 10  |      | 50            |
| Carbazole   | 76               |      | 79                |      | 54-128              | 4   |      | 50            |
| Atrazine  | 95               |      | 98                |      | 40-140              | 3   |      | 50            |
| Benzaldehyde  | 68               |      | 83                |      | 40-140              | 20  |      | 50            |
| Caprolactam   | 97               |      | 106               |      | 15-130              | 9   |      | 50            |
| 2,3,4,6-Tetrachlorophenol   | 87               |      | 89                |      | 40-140              | 2   |      | 50            |

**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

| <b>Parameter</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|

Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1043551-2 WG1043551-3

| <b>Surrogate</b>     | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> |
|----------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|
| 2-Fluorophenol       | 82                       |             | 97                        |             | 25-120                         |
| Phenol-d6            | 83                       |             | 100                       |             | 10-120                         |
| Nitrobenzene-d5      | 93                       |             | 113                       |             | 23-120                         |
| 2-Fluorobiphenyl     | 79                       |             | 87                        |             | 30-120                         |
| 2,4,6-Tribromophenol | 82                       |             | 86                        |             | 10-136                         |
| 4-Terphenyl-d14      | 73                       |             | 77                        |             | 18-120                         |

# PCBS

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

**SAMPLE RESULTS**

**Lab ID:** L1733060-01  
**Client ID:** MW-1 (16-18')  
**Sample Location:** BUFFALO, NY

**Matrix:** Soil  
**Analytical Method:** 1,8082A  
**Analytical Date:** 09/21/17 13:47  
**Analyst:** AF  
**Percent Solids:** 84%

**Date Collected:** 09/18/17 10:30  
**Date Received:** 09/18/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 09/20/17 17:11  
**Cleanup Method:** EPA 3665A  
**Cleanup Date:** 09/21/17  
**Cleanup Method:** EPA 3660B  
**Cleanup Date:** 09/21/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|---|--------|-----------|-------|------|------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |      |      |                 |        |
| Aroclor 1016                                      | ND     |           | ug/kg | 38.4 | 4.36 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/kg | 38.4 | 5.85 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/kg | 38.4 | 3.78 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/kg | 38.4 | 4.70 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/kg | 38.4 | 4.31 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/kg | 38.4 | 3.14 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/kg | 38.4 | 4.01 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/kg | 38.4 | 3.16 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/kg | 38.4 | 2.72 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/kg | 38.4 | 2.72 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 53         |           | 30-150              | A      |
| Decachlorobiphenyl           | 34         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 56         |           | 30-150              | B      |
| Decachlorobiphenyl           | 44         |           | 30-150              | B      |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

**SAMPLE RESULTS**

**Lab ID:** L1733060-02  
**Client ID:** MW-2 (18-20')  
**Sample Location:** BUFFALO, NY

**Matrix:** Soil  
**Analytical Method:** 1,8082A  
**Analytical Date:** 09/21/17 15:10  
**Analyst:** AF  
**Percent Solids:** 83%

**Date Collected:** 09/18/17 13:40  
**Date Received:** 09/18/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 09/20/17 17:11  
**Cleanup Method:** EPA 3665A  
**Cleanup Date:** 09/21/17  
**Cleanup Method:** EPA 3660B  
**Cleanup Date:** 09/21/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|---|--------|-----------|-------|------|------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |      |      |                 |        |
| Aroclor 1016                                      | ND     |           | ug/kg | 38.5 | 4.36 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/kg | 38.5 | 5.85 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/kg | 38.5 | 3.78 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/kg | 38.5 | 4.71 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/kg | 38.5 | 4.32 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/kg | 38.5 | 3.14 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/kg | 38.5 | 4.02 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/kg | 38.5 | 3.16 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/kg | 38.5 | 2.72 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/kg | 38.5 | 2.72 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 75         |           | 30-150              | A      |
| Decachlorobiphenyl           | 51         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 79         |           | 30-150              | B      |
| Decachlorobiphenyl           | 58         |           | 30-150              | B      |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8082A  
 Analytical Date: 09/20/17 23:30  
 Analyst: HT

Extraction Method: EPA 3546  
 Extraction Date: 09/20/17 08:04  
 Cleanup Method: EPA 3665A  
 Cleanup Date: 09/20/17  
 Cleanup Method: EPA 3660B  
 Cleanup Date: 09/20/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Column |
|---|--------|-----------|-------|------|------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab for sample(s): 01-02 Batch: WG1043574-1 |        |           |       |      |      |        |
| Aroclor 1016  | ND     |           | ug/kg | 32.8 | 3.72 | A      |
| Aroclor 1221  | ND     |           | ug/kg | 32.8 | 4.99 | A      |
| Aroclor 1232  | ND     |           | ug/kg | 32.8 | 3.23 | A      |
| Aroclor 1242  | ND     |           | ug/kg | 32.8 | 4.02 | A      |
| Aroclor 1248  | ND     |           | ug/kg | 32.8 | 3.68 | A      |
| Aroclor 1254  | ND     |           | ug/kg | 32.8 | 2.68 | A      |
| Aroclor 1260  | ND     |           | ug/kg | 32.8 | 3.42 | A      |
| Aroclor 1262  | ND     |           | ug/kg | 32.8 | 2.70 | A      |
| Aroclor 1268  | ND     |           | ug/kg | 32.8 | 2.32 | A      |
| PCBs, Total   | ND     |           | ug/kg | 32.8 | 2.32 | A      |

| Surrogate                    | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|------------------------------|-----------|-----------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 49        |           | 30-150                 | A      |
| Decachlorobiphenyl           | 74        |           | 30-150                 | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 46        |           | 30-150                 | B      |
| Decachlorobiphenyl           | 79        |           | 30-150                 | B      |



**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

| <b>Parameter</b>   | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> | <b>Column</b> |
|--|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|---------------|
| Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 01-02 Batch: WG1043574-2 WG1043574-3 |                          |             |                           |             |                             |            |             |                       |               |
| Aroclor 1016   | 87                       |             | 86                        |             | 40-140                      | 1          |             | 50                    | A             |
| Aroclor 1260   | 98                       |             | 101                       |             | 40-140                      | 3          |             | 50                    | A             |

| <b>Surrogate</b>             | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> | <b>Column</b> |
|------------------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|---------------|
| 2,4,5,6-Tetrachloro-m-xylene | 76                       |             | 75                        |             | 30-150                         | A             |
| Decachlorobiphenyl           | 77                       |             | 78                        |             | 30-150                         | A             |
| 2,4,5,6-Tetrachloro-m-xylene | 73                       |             | 75                        |             | 30-150                         | B             |
| Decachlorobiphenyl           | 82                       |             | 85                        |             | 30-150                         | B             |

## METALS

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733060-01

Date Collected: 09/18/17 10:30

Client ID: MW-1 (16-18')

Date Received: 09/18/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 84%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 3520   |           | mg/kg | 9.47  | 2.56  | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Antimony, Total              | ND     |           | mg/kg | 4.73  | 0.360 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Arsenic, Total               | 1.43   |           | mg/kg | 0.947 | 0.197 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Barium, Total                | 37.0   |           | mg/kg | 0.947 | 0.165 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Beryllium, Total             | 0.066  | J         | mg/kg | 0.473 | 0.031 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Cadmium, Total               | 0.596  | J         | mg/kg | 0.947 | 0.093 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Calcium, Total               | 54700  |           | mg/kg | 9.47  | 3.31  | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Chromium, Total              | 6.13   |           | mg/kg | 0.947 | 0.091 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Cobalt, Total                | 3.30   |           | mg/kg | 1.89  | 0.157 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Copper, Total                | 9.68   |           | mg/kg | 0.947 | 0.244 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Iron, Total                  | 8480   |           | mg/kg | 4.73  | 0.855 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Lead, Total                  | 9.63   |           | mg/kg | 4.73  | 0.254 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Magnesium, Total             | 24200  |           | mg/kg | 9.47  | 1.46  | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Manganese, Total             | 282    |           | mg/kg | 0.947 | 0.150 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Mercury, Total               | 0.02   | J         | mg/kg | 0.08  | 0.02  | 1               | 09/20/17 08:00 | 09/20/17 18:24 | EPA 7471B   | 1,7471B           | EA      |
| Nickel, Total                | 6.67   |           | mg/kg | 2.37  | 0.229 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Potassium, Total             | 662    |           | mg/kg | 237   | 13.6  | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Selenium, Total              | ND     |           | mg/kg | 1.89  | 0.244 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Silver, Total                | ND     |           | mg/kg | 0.947 | 0.268 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Sodium, Total                | 231    |           | mg/kg | 189   | 2.98  | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Thallium, Total              | ND     |           | mg/kg | 1.89  | 0.298 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Vanadium, Total              | 10.5   |           | mg/kg | 0.947 | 0.192 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |
| Zinc, Total                  | 75.7   |           | mg/kg | 4.73  | 0.277 | 2               | 09/20/17 18:50 | 09/25/17 21:51 | EPA 3050B   | 1,6010C           | AB      |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733060-02

Date Collected: 09/18/17 13:40

Client ID: MW-2 (18-20')

Date Received: 09/18/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 83%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 1540   |           | mg/kg | 9.30  | 2.51  | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Antimony, Total              | ND     |           | mg/kg | 4.65  | 0.354 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Arsenic, Total               | 1.36   |           | mg/kg | 0.930 | 0.194 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Barium, Total                | 21.4   |           | mg/kg | 0.930 | 0.162 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Beryllium, Total             | ND     |           | mg/kg | 0.465 | 0.031 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Cadmium, Total               | 0.409  | J         | mg/kg | 0.930 | 0.091 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Calcium, Total               | 47300  |           | mg/kg | 9.30  | 3.26  | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Chromium, Total              | 3.21   |           | mg/kg | 0.930 | 0.089 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Cobalt, Total                | 1.80   | J         | mg/kg | 1.86  | 0.154 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Copper, Total                | 5.24   |           | mg/kg | 0.930 | 0.240 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Iron, Total                  | 5180   |           | mg/kg | 4.65  | 0.840 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Lead, Total                  | 7.62   |           | mg/kg | 4.65  | 0.249 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Magnesium, Total             | 21800  |           | mg/kg | 9.30  | 1.43  | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Manganese, Total             | 185    |           | mg/kg | 0.930 | 0.148 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Mercury, Total               | ND     |           | mg/kg | 0.08  | 0.02  | 1               | 09/20/17 08:00 | 09/20/17 18:29 | EPA 7471B   | 1,7471B           | EA      |
| Nickel, Total                | 3.23   |           | mg/kg | 2.33  | 0.225 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Potassium, Total             | 314    |           | mg/kg | 233   | 13.4  | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Selenium, Total              | ND     |           | mg/kg | 1.86  | 0.240 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Silver, Total                | ND     |           | mg/kg | 0.930 | 0.263 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Sodium, Total                | 168    | J         | mg/kg | 186   | 2.93  | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Thallium, Total              | ND     |           | mg/kg | 1.86  | 0.293 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Vanadium, Total              | 7.59   |           | mg/kg | 0.930 | 0.189 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |
| Zinc, Total                  | 62.7   |           | mg/kg | 4.65  | 0.273 | 2               | 09/20/17 18:50 | 09/25/17 21:56 | EPA 3050B   | 1,6010C           | AB      |



Project Name: MAIN &amp; EAST BALCOM STREET SITE

Lab Number: L1733060

Project Number: B0239-016-001-004

Report Date: 09/26/17

## Method Blank Analysis Batch Quality Control

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|--|--------|-----------|-------|------|------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01-02 Batch: WG1043512-1 |        |           |       |      |      |                    |                  |                  |                      |         |
| Mercury, Total   | ND     |           | mg/kg | 0.08 | 0.02 | 1                  | 09/20/17 08:00   | 09/20/17 18:13   | 1,7471B              | EA      |

### Prep Information

Digestion Method: EPA 7471B

| Parameter  | Result | Qualifier | Units | RL    | MDL   | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|--|--------|-----------|-------|-------|-------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01-02 Batch: WG1043816-1 |        |           |       |       |       |                    |                  |                  |                      |         |
| Aluminum, Total  | ND     |           | mg/kg | 4.00  | 1.08  | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Antimony, Total  | ND     |           | mg/kg | 2.00  | 0.152 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Arsenic, Total   | ND     |           | mg/kg | 0.400 | 0.083 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Barium, Total  | ND     |           | mg/kg | 0.400 | 0.070 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Beryllium, Total   | ND     |           | mg/kg | 0.200 | 0.013 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Cadmium, Total   | ND     |           | mg/kg | 0.400 | 0.039 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Calcium, Total   | ND     |           | mg/kg | 4.00  | 1.40  | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Chromium, Total  | ND     |           | mg/kg | 0.400 | 0.038 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Cobalt, Total  | ND     |           | mg/kg | 0.800 | 0.066 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Copper, Total  | ND     |           | mg/kg | 0.400 | 0.103 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Iron, Total  | ND     |           | mg/kg | 2.00  | 0.361 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Lead, Total  | ND     |           | mg/kg | 2.00  | 0.107 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Magnesium, Total   | ND     |           | mg/kg | 4.00  | 0.616 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Manganese, Total   | ND     |           | mg/kg | 0.400 | 0.064 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Nickel, Total  | ND     |           | mg/kg | 1.00  | 0.097 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Potassium, Total   | ND     |           | mg/kg | 100   | 5.76  | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Selenium, Total  | ND     |           | mg/kg | 0.800 | 0.103 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Silver, Total  | ND     |           | mg/kg | 0.400 | 0.113 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Sodium, Total  | 1.48   | J         | mg/kg | 80.0  | 1.26  | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Thallium, Total  | ND     |           | mg/kg | 0.800 | 0.126 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Vanadium, Total  | ND     |           | mg/kg | 0.400 | 0.081 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |
| Zinc, Total  | ND     |           | mg/kg | 2.00  | 0.117 | 1                  | 09/20/17 18:50   | 09/25/17 18:47   | 1,6010C              | AB      |

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733060

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

## **Method Blank Analysis Batch Quality Control**

### **Prep Information**

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Digestion Method: EPA 3050B

**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1043512-2 SRM Lot Number: D093-540 |                  |      |                   |      |                     |     |      |            |
| Mercury, Total   | 94               |      | -                 |      | 72-128              | -   |      |            |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733060

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter  | LCS<br>%Recovery | LCSD<br>%Recovery | %Recovery<br>Limits | RPD | RPD Limits |
|--|------------------|-------------------|---------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1043816-2 SRM Lot Number: D093-540 |                  |                   |                     |     |            |
| Aluminum, Total  | 86               | -                 | 55-146              | -   |            |
| Antimony, Total  | 143              | -                 | 2-204               | -   |            |
| Arsenic, Total   | 97               | -                 | 70-130              | -   |            |
| Barium, Total  | 93               | -                 | 83-117              | -   |            |
| Beryllium, Total   | 91               | -                 | 83-117              | -   |            |
| Cadmium, Total   | 90               | -                 | 83-117              | -   |            |
| Calcium, Total   | 90               | -                 | 83-117              | -   |            |
| Chromium, Total  | 97               | -                 | 80-120              | -   |            |
| Cobalt, Total  | 92               | -                 | 84-116              | -   |            |
| Copper, Total  | 95               | -                 | 82-118              | -   |            |
| Iron, Total  | 97               | -                 | 47-153              | -   |            |
| Lead, Total  | 104              | -                 | 82-117              | -   |            |
| Magnesium, Total   | 88               | -                 | 77-124              | -   |            |
| Manganese, Total   | 88               | -                 | 81-119              | -   |            |
| Nickel, Total  | 91               | -                 | 83-117              | -   |            |
| Potassium, Total   | 92               | -                 | 71-129              | -   |            |
| Selenium, Total  | 94               | -                 | 78-122              | -   |            |
| Silver, Total  | 97               | -                 | 76-124              | -   |            |
| Sodium, Total  | 98               | -                 | 72-128              | -   |            |
| Thallium, Total  | 90               | -                 | 79-121              | -   |            |
| Vanadium, Total  | 93               | -                 | 78-122              | -   |            |



**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & EAST BALCOM STREET SITE**Project Number:** B0239-016-001-004**Lab Number:** L1733060**Report Date:** 09/26/17

| Parameter  | LCS<br>%Recovery | LCSD<br>%Recovery | %Recovery<br>Limits | RPD | RPD Limits |
|--|------------------|-------------------|---------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1043816-2 SRM Lot Number: D093-540 |                  |                   |                     |     |            |
| Zinc, Total  | 90               | -                 | 83-117              | -   |            |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733060

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02    QC Batch ID: WG1043512-3    QC Sample: L1733107-01    Client ID: MS Sample |               |          |          |              |      |           |               |      |                 |     |      |            |
| Mercury, Total   | 0.05J         | 0.164    | 0.20     | 122          | Q    | -         | -             |      | 80-120          | -   |      | 20         |

# **Matrix Spike Analysis** **Batch Quality Control**

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

| Parameter  | Native Sample | MS Added | MS Found                 | MS %Recovery | MSD Found              | MSD %Recovery | Recovery Limits      | RPD | RPD Limits |
|--|---------------|----------|--------------------------|--------------|------------------------|---------------|----------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 |               |          | QC Batch ID: WG1043816-3 |              | QC Sample: L1733203-01 |               | Client ID: MS Sample |     |            |
| Aluminum, Total  | 7520          | 992      | 9650                     | 215          | Q                      | -             | 75-125               | -   | 20         |
| Antimony, Total  | ND            | 248      | 136                      | 55           | Q                      | -             | 75-125               | -   | 20         |
| Arsenic, Total   | 367.          | 59.5     | 467                      | 168          | Q                      | -             | 75-125               | -   | 20         |
| Barium, Total  | 295.          | 992      | 1170                     | 88           |                        | -             | 75-125               | -   | 20         |
| Beryllium, Total   | 4.35          | 24.8     | 25.3                     | 84           |                        | -             | 75-125               | -   | 20         |
| Cadmium, Total   | 18.1          | 25.3     | 41.0                     | 90           |                        | -             | 75-125               | -   | 20         |
| Calcium, Total   | 5370          | 4960     | 10100                    | 95           |                        | -             | 75-125               | -   | 20         |
| Chromium, Total  | 18.8          | 99.2     | 102                      | 84           |                        | -             | 75-125               | -   | 20         |
| Cobalt, Total  | 17.2          | 248      | 210                      | 78           |                        | -             | 75-125               | -   | 20         |
| Copper, Total  | 657.          | 124      | 841                      | 148          | Q                      | -             | 75-125               | -   | 20         |
| Iron, Total  | 146000        | 496      | 160000                   | 2820         | Q                      | -             | 75-125               | -   | 20         |
| Lead, Total  | 15.8          | 253      | 217                      | 80           |                        | -             | 75-125               | -   | 20         |
| Magnesium, Total   | 266.          | 4960     | 4070                     | 77           |                        | -             | 75-125               | -   | 20         |
| Manganese, Total   | 6460          | 248      | 7260                     | 322          | Q                      | -             | 75-125               | -   | 20         |
| Nickel, Total  | 71.8          | 248      | 267                      | 79           |                        | -             | 75-125               | -   | 20         |
| Potassium, Total   | 131.J         | 4960     | 4640                     | 94           |                        | -             | 75-125               | -   | 20         |
| Selenium, Total  | ND            | 59.5     | 41.4                     | 70           | Q                      | -             | 75-125               | -   | 20         |
| Silver, Total  | 3.43          | 149      | 135                      | 88           |                        | -             | 75-125               | -   | 20         |
| Sodium, Total  | 862.          | 4960     | 5510                     | 94           |                        | -             | 75-125               | -   | 20         |
| Thallium, Total  | 4.87J         | 59.5     | 9.52                     | 16           | Q                      | -             | 75-125               | -   | 20         |
| Vanadium, Total  | 21.3          | 248      | 233                      | 85           |                        | -             | 75-125               | -   | 20         |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733060

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | MSD Found | MSD %Recovery | Recovery Limits | RPD | RPD Limits |
|--|---------------|----------|----------|--------------|-----------|---------------|-----------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02    QC Batch ID: WG1043816-3    QC Sample: L1733203-01    Client ID: MS Sample |               |          |          |              |           |               |                 |     |            |
| Zinc, Total  | 210.          | 248      | 428      | 88           | -         | -             | 75-125          | -   | 20         |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-00

## Lab Duplicate Analysis

Batch Quality Control

**Lab Number:** L1733060  
**Report Date:** 09/26/17

| Parameter  | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|--|---------------|------------------|-------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 QC Batch ID: WG1043512-4 QC Sample: L1733107-01 Client ID: DUP Sample |               |                  |       |     |      |            |
| Mercury, Total   | 0.05J         | 0.05J            | mg/kg | NC  |      | 20         |
| Total Metals - Mansfield Lab Associated sample(s): 01-02 QC Batch ID: WG1043816-4 QC Sample: L1733203-01 Client ID: DUP Sample |               |                  |       |     |      |            |
| Arsenic, Total   | 367.          | 412              | mg/kg | 12  |      | 20         |
| Barium, Total  | 295.          | 339              | mg/kg | 14  |      | 20         |
| Cadmium, Total   | 18.1          | 20.5             | mg/kg | 12  |      | 20         |
| Chromium, Total  | 18.8          | 21.2             | mg/kg | 12  |      | 20         |
| Lead, Total  | 15.8          | 18.4             | mg/kg | 15  |      | 20         |
| Selenium, Total  | ND            | ND               | mg/kg | NC  |      | 20         |
| Silver, Total  | 3.43          | 3.87             | mg/kg | 12  |      | 20         |

# **INORGANICS & MISCELLANEOUS**

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

**SAMPLE RESULTS**

**Lab ID:** L1733060-01  
**Client ID:** MW-1 (16-18')  
**Sample Location:** BUFFALO, NY  
**Matrix:** Soil

**Date Collected:** 09/18/17 10:30  
**Date Received:** 09/18/17  
**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 83.9   |           | %     | 0.100 | NA  | 1                  | -                | 09/19/17 10:12   | 121,2540G            | RI      |



**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

**SAMPLE RESULTS**

**Lab ID:** L1733060-02  
**Client ID:** MW-2 (18-20')  
**Sample Location:** BUFFALO, NY  
**Matrix:** Soil

**Date Collected:** 09/18/17 13:40  
**Date Received:** 09/18/17  
**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 82.8   |           | %     | 0.100 | NA  | 1                  | -                | 09/19/17 10:12   | 121,2540G            | RI      |





**Project Name:** MAIN & EAST BALCOM STREET SITE**Project Number:** B0239-016-001-00**Lab Duplicate Analysis****Batch Quality Control****Lab Number:** L1733060**Report Date:** 09/26/17

| Parameter   | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|---|---------------|------------------|-------|-----|------|------------|
| General Chemistry - Westborough Lab Associated sample(s): 01-02 QC Batch ID: WG1043162-1 QC Sample: L1732935-07 Client ID: DUP Sample |               |                  |       |     |      |            |
| Solids, Total   | 88.3          | 87.5             | %     | 1   |      | 20         |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733060**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information**

|               |                     |
|---------------|---------------------|
| <b>Cooler</b> | <b>Custody Seal</b> |
| A             | Absent              |

**Container Information**

| Container ID | Container Type                         | Cooler | Initial pH | Final pH | Temp deg C | Pres | Seal   | Frozen Date/Time | Analysis(*)  |
|--------------|--|--------|------------|----------|------------|------|--------|------------------|--|
| L1733060-01A | 5 gram Encore Sampler                  | A      | NA         |          | 3.2        | Y    | Absent |                  | NYTCL-8260HLW(14)  |
| L1733060-01B | 5 gram Encore Sampler                  | A      | NA         |          | 3.2        | Y    | Absent |                  | NYTCL-8260HLW(14)  |
| L1733060-01C | 5 gram Encore Sampler                  | A      | NA         |          | 3.2        | Y    | Absent |                  | NYTCL-8260HLW(14)  |
| L1733060-01D | Plastic 2oz unpreserved for TS         | A      | NA         |          | 3.2        | Y    | Absent |                  | TS(7)  |
| L1733060-01E | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 3.2        | Y    | Absent |                  | BE-TI(180),AS-TI(180),BA-TI(180),AG-TI(180),AL-TI(180),CR-TI(180),NI-TI(180),TL-TI(180),CU-TI(180),PB-TI(180),SB-TI(180),SE-TI(180),ZN-TI(180),CO-TI(180),V-TI(180),FE-TI(180),HG-T(28),MG-TI(180),MN-TI(180),CA-TI(180),CD-TI(180),K-TI(180),NA-TI(180) |
| L1733060-01F | Glass 120ml/4oz unpreserved            | A      | NA         |          | 3.2        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8082(14)  |
| L1733060-01G | Glass 60mL/2oz unpreserved             | A      | NA         |          | 3.2        | Y    | Absent |                  | NYTCL-8270(14),NYTCL-8082(14)  |
| L1733060-01X | Vial MeOH preserved split              | A      | NA         |          | 3.2        | Y    | Absent |                  | NYTCL-8260HLW(14)  |
| L1733060-01Y | Vial Water preserved split             | A      | NA         |          | 3.2        | Y    | Absent | 19-SEP-17 07:36  | NYTCL-8260HLW(14)  |
| L1733060-01Z | Vial Water preserved split             | A      | NA         |          | 3.2        | Y    | Absent | 19-SEP-17 07:36  | NYTCL-8260HLW(14)  |
| L1733060-02A | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 3.2        | Y    | Absent |                  | BE-TI(180),AS-TI(180),BA-TI(180),AG-TI(180),AL-TI(180),CR-TI(180),NI-TI(180),TL-TI(180),CU-TI(180),PB-TI(180),SB-TI(180),SE-TI(180),ZN-TI(180),CO-TI(180),V-TI(180),FE-TI(180),HG-T(28),MG-TI(180),MN-TI(180),CA-TI(180),CD-TI(180),K-TI(180),NA-TI(180) |
| L1733060-02B | Glass 60mL/2oz unpreserved             | A      | NA         |          | 3.2        | Y    | Absent |                  | NYTCL-8270(14),TS(7),NYTCL-8082(14)  |
| L1733060-02D | Glass 120ml/4oz unpreserved            | A      | NA         |          | 3.2        | Y    | Absent |                  | NYTCL-8270(14),TS(7),NYTCL-8082(14)  |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers



**Project Name:** MAIN & EAST BALCOM STREET SITE  
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#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers



**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



**Alpha Analytical, Inc.**

ID No.:17873

Facility: **Company-wide**

Revision 10

Department: **Quality Assurance**

Published Date: 1/16/2017 11:00:05 AM

Title: **Certificate/Approval Program Summary**

Page 1 of 1

**Certification Information**

The following analytes are not included in our Primary NELAP Scope of Accreditation:

**Westborough Facility****EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** NPW and SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**EPA 9012B:** NPW: Total Cyanide**EPA 9050A:** NPW: Specific Conductance**SM3500:** NPW: Ferrous Iron**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.**SM5310C:** DW: Dissolved Organic Carbon**Mansfield Facility****SM 2540D:** TSS**EPA 3005A** NPW**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

**Westborough Facility:****Drinking Water****EPA 300.0:** Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE, EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH, EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E.****Mansfield Facility:****Drinking Water****EPA 200.7:** Ba, Be, Cd, Cr, Cu, Ni, Na, Ca. **EPA 200.8:** Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Ni, Se, TL. **EPA 245.1 Hg.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.

9) 19/11

L1733060



## ANALYTICAL REPORT

|                 |   |
|-----------------|---|
| Lab Number:     | L1733355  |
| Client:         | Turnkey Environmental Restoration, LLC<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley   |
| Phone:          | (716) 856-0599  |
| Project Name:   | MAIN & EAST BALCOM STREET SITE  |
| Project Number: | B0239-016-001-004   |
| Report Date:    | 09/26/17  |

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Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)





**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1733355-01                | MW-3 (18-20')    | SOIL          | BUFFALO, NY                | 09/19/17 09:30                  | 09/19/17            |
| L1733355-02                | BD               | SOIL          | BUFFALO, NY                | 09/19/17 10:00                  | 09/19/17            |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

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**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

### Case Narrative (continued)

#### Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

#### Total Metals

L1733355-01 and -02: The samples have elevated detection limits for all elements, with the exception of mercury, due to the dilution required by matrix interferences encountered during analysis.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:



Kara Lindquist

Title: Technical Director/Representative

Date: 09/26/17

# ORGANICS

# **VOLATILES**

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-01  
 Client ID: MW-3 (18-20')  
 Sample Location: BUFFALO, NY

Date Collected: 09/19/17 09:30  
 Date Received: 09/19/17  
 Field Prep: Not Specified

Matrix: Soil  
 Analytical Method: 1,8260C  
 Analytical Date: 09/25/17 14:32  
 Analyst: JC  
 Percent Solids: 87%

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |     |      |                 |
| Methylene chloride                               | 2.2    | J         | ug/kg | 10  | 1.7  | 1               |
| 1,1-Dichloroethane                               | ND     |           | ug/kg | 1.6 | 0.28 | 1               |
| Chloroform                                       | ND     |           | ug/kg | 1.6 | 0.39 | 1               |
| Carbon tetrachloride                             | ND     |           | ug/kg | 1.0 | 0.36 | 1               |
| 1,2-Dichloropropane                              | ND     |           | ug/kg | 3.7 | 0.24 | 1               |
| Dibromochloromethane                             | ND     |           | ug/kg | 1.0 | 0.18 | 1               |
| 1,1,2-Trichloroethane                            | ND     |           | ug/kg | 1.6 | 0.33 | 1               |
| Tetrachloroethene                                | ND     |           | ug/kg | 1.0 | 0.32 | 1               |
| Chlorobenzene                                    | ND     |           | ug/kg | 1.0 | 0.36 | 1               |
| Trichlorofluoromethane                           | ND     |           | ug/kg | 5.2 | 0.44 | 1               |
| 1,2-Dichloroethane                               | ND     |           | ug/kg | 1.0 | 0.26 | 1               |
| 1,1,1-Trichloroethane                            | ND     |           | ug/kg | 1.0 | 0.37 | 1               |
| Bromodichloromethane                             | ND     |           | ug/kg | 1.0 | 0.32 | 1               |
| trans-1,3-Dichloropropene                        | ND     |           | ug/kg | 1.0 | 0.22 | 1               |
| cis-1,3-Dichloropropene                          | ND     |           | ug/kg | 1.0 | 0.24 | 1               |
| Bromoform  | ND     |           | ug/kg | 4.2 | 0.25 | 1               |
| 1,1,2,2-Tetrachloroethane                        | ND     |           | ug/kg | 1.0 | 0.31 | 1               |
| Benzene  | ND     |           | ug/kg | 1.0 | 0.20 | 1               |
| Toluene  | ND     |           | ug/kg | 1.6 | 0.20 | 1               |
| Ethylbenzene                                     | ND     |           | ug/kg | 1.0 | 0.18 | 1               |
| Chloromethane                                    | ND     |           | ug/kg | 5.2 | 0.46 | 1               |
| Bromomethane                                     | ND     |           | ug/kg | 2.1 | 0.35 | 1               |
| Vinyl chloride                                   | ND     |           | ug/kg | 2.1 | 0.33 | 1               |
| Chloroethane                                     | ND     |           | ug/kg | 2.1 | 0.33 | 1               |
| 1,1-Dichloroethene                               | ND     |           | ug/kg | 1.0 | 0.39 | 1               |
| trans-1,2-Dichloroethene                         | ND     |           | ug/kg | 1.6 | 0.25 | 1               |
| Trichloroethene                                  | 1.7    |           | ug/kg | 1.0 | 0.32 | 1               |
| 1,2-Dichlorobenzene                              | ND     |           | ug/kg | 5.2 | 0.19 | 1               |
| 1,3-Dichlorobenzene                              | ND     |           | ug/kg | 5.2 | 0.23 | 1               |
| 1,4-Dichlorobenzene                              | ND     |           | ug/kg | 5.2 | 0.19 | 1               |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

**SAMPLE RESULTS**

**Lab ID:** L1733355-01  
**Client ID:** MW-3 (18-20')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 09/19/17 09:30  
**Date Received:** 09/19/17  
**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |     |      |                 |
| Methyl tert butyl ether                          | ND     |           | ug/kg | 2.1 | 0.16 | 1               |
| p/m-Xylene                                       | ND     |           | ug/kg | 2.1 | 0.37 | 1               |
| o-Xylene   | ND     |           | ug/kg | 2.1 | 0.35 | 1               |
| cis-1,2-Dichloroethene                           | ND     |           | ug/kg | 1.0 | 0.36 | 1               |
| Styrene  | ND     |           | ug/kg | 2.1 | 0.42 | 1               |
| Dichlorodifluoromethane                          | ND     |           | ug/kg | 10  | 0.52 | 1               |
| Acetone  | 8.0    | J         | ug/kg | 10  | 2.4  | 1               |
| Carbon disulfide                                 | ND     |           | ug/kg | 10  | 1.2  | 1               |
| 2-Butanone                                       | ND     |           | ug/kg | 10  | 0.72 | 1               |
| 4-Methyl-2-pentanone                             | ND     |           | ug/kg | 10  | 0.26 | 1               |
| 2-Hexanone                                       | ND     |           | ug/kg | 10  | 0.70 | 1               |
| Bromochloromethane                               | ND     |           | ug/kg | 5.2 | 0.37 | 1               |
| 1,2-Dibromoethane                                | ND     |           | ug/kg | 4.2 | 0.21 | 1               |
| n-Butylbenzene                                   | ND     |           | ug/kg | 1.0 | 0.24 | 1               |
| sec-Butylbenzene                                 | ND     |           | ug/kg | 1.0 | 0.23 | 1               |
| 1,2-Dibromo-3-chloropropane                      | ND     |           | ug/kg | 5.2 | 0.42 | 1               |
| Isopropylbenzene                                 | ND     |           | ug/kg | 1.0 | 0.20 | 1               |
| p-Isopropyltoluene                               | ND     |           | ug/kg | 1.0 | 0.21 | 1               |
| n-Propylbenzene                                  | ND     |           | ug/kg | 1.0 | 0.22 | 1               |
| 1,2,3-Trichlorobenzene                           | ND     |           | ug/kg | 5.2 | 0.26 | 1               |
| 1,2,4-Trichlorobenzene                           | ND     |           | ug/kg | 5.2 | 0.22 | 1               |
| 1,3,5-Trimethylbenzene                           | ND     |           | ug/kg | 5.2 | 0.17 | 1               |
| 1,2,4-Trimethylbenzene                           | ND     |           | ug/kg | 5.2 | 0.20 | 1               |
| Methyl Acetate                                   | ND     |           | ug/kg | 21  | 0.48 | 1               |
| Cyclohexane                                      | ND     |           | ug/kg | 21  | 0.45 | 1               |
| 1,4-Dioxane                                      | ND     |           | ug/kg | 42  | 15.  | 1               |
| Freon-113  | ND     |           | ug/kg | 21  | 0.54 | 1               |
| Methyl cyclohexane                               | ND     |           | ug/kg | 4.2 | 0.25 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 115        |           | 70-130              |
| Toluene-d8            | 101        |           | 70-130              |
| 4-Bromofluorobenzene  | 120        |           | 70-130              |
| Dibromofluoromethane  | 106        |           | 70-130              |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-02  
 Client ID: BD  
 Sample Location: BUFFALO, NY

Date Collected: 09/19/17 10:00  
 Date Received: 09/19/17  
 Field Prep: Not Specified

Matrix: Soil  
 Analytical Method: 1,8260C  
 Analytical Date: 09/25/17 14:58  
 Analyst: JC  
 Percent Solids: 87%

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                               | ND     |           | ug/kg | 9.9  | 1.6  | 1               |
| 1,1-Dichloroethane                               | ND     |           | ug/kg | 1.5  | 0.27 | 1               |
| Chloroform                                       | ND     |           | ug/kg | 1.5  | 0.36 | 1               |
| Carbon tetrachloride                             | ND     |           | ug/kg | 0.99 | 0.34 | 1               |
| 1,2-Dichloropropane                              | ND     |           | ug/kg | 3.4  | 0.22 | 1               |
| Dibromochloromethane                             | ND     |           | ug/kg | 0.99 | 0.17 | 1               |
| 1,1,2-Trichloroethane                            | ND     |           | ug/kg | 1.5  | 0.31 | 1               |
| Tetrachloroethene                                | ND     |           | ug/kg | 0.99 | 0.30 | 1               |
| Chlorobenzene                                    | ND     |           | ug/kg | 0.99 | 0.34 | 1               |
| Trichlorofluoromethane                           | ND     |           | ug/kg | 4.9  | 0.41 | 1               |
| 1,2-Dichloroethane                               | ND     |           | ug/kg | 0.99 | 0.24 | 1               |
| 1,1,1-Trichloroethane                            | ND     |           | ug/kg | 0.99 | 0.34 | 1               |
| Bromodichloromethane                             | ND     |           | ug/kg | 0.99 | 0.30 | 1               |
| trans-1,3-Dichloropropene                        | ND     |           | ug/kg | 0.99 | 0.20 | 1               |
| cis-1,3-Dichloropropene                          | ND     |           | ug/kg | 0.99 | 0.23 | 1               |
| Bromoform  | ND     |           | ug/kg | 3.9  | 0.23 | 1               |
| 1,1,2,2-Tetrachloroethane                        | ND     |           | ug/kg | 0.99 | 0.29 | 1               |
| Benzene  | ND     |           | ug/kg | 0.99 | 0.19 | 1               |
| Toluene  | ND     |           | ug/kg | 1.5  | 0.19 | 1               |
| Ethylbenzene                                     | ND     |           | ug/kg | 0.99 | 0.17 | 1               |
| Chloromethane                                    | ND     |           | ug/kg | 4.9  | 0.43 | 1               |
| Bromomethane                                     | ND     |           | ug/kg | 2.0  | 0.33 | 1               |
| Vinyl chloride                                   | ND     |           | ug/kg | 2.0  | 0.31 | 1               |
| Chloroethane                                     | ND     |           | ug/kg | 2.0  | 0.31 | 1               |
| 1,1-Dichloroethene                               | ND     |           | ug/kg | 0.99 | 0.37 | 1               |
| trans-1,2-Dichloroethene                         | ND     |           | ug/kg | 1.5  | 0.24 | 1               |
| Trichloroethene                                  | 1.7    |           | ug/kg | 0.99 | 0.30 | 1               |
| 1,2-Dichlorobenzene                              | ND     |           | ug/kg | 4.9  | 0.18 | 1               |
| 1,3-Dichlorobenzene                              | ND     |           | ug/kg | 4.9  | 0.22 | 1               |
| 1,4-Dichlorobenzene                              | ND     |           | ug/kg | 4.9  | 0.18 | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS****Lab ID:** L1733355-02**Date Collected:** 09/19/17 10:00**Client ID:** BD**Date Received:** 09/19/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by 8260/5035 - Westborough Lab |        |           |       |      |      |                 |
| Methyl tert butyl ether                          | ND     |           | ug/kg | 2.0  | 0.15 | 1               |
| p/m-Xylene                                       | ND     |           | ug/kg | 2.0  | 0.35 | 1               |
| o-Xylene   | ND     |           | ug/kg | 2.0  | 0.33 | 1               |
| cis-1,2-Dichloroethene                           | ND     |           | ug/kg | 0.99 | 0.34 | 1               |
| Styrene  | ND     |           | ug/kg | 2.0  | 0.40 | 1               |
| Dichlorodifluoromethane                          | ND     |           | ug/kg | 9.9  | 0.49 | 1               |
| Acetone  | 5.1    | J         | ug/kg | 9.9  | 2.3  | 1               |
| Carbon disulfide                                 | ND     |           | ug/kg | 9.9  | 1.1  | 1               |
| 2-Butanone                                       | ND     |           | ug/kg | 9.9  | 0.68 | 1               |
| 4-Methyl-2-pentanone                             | ND     |           | ug/kg | 9.9  | 0.24 | 1               |
| 2-Hexanone                                       | ND     |           | ug/kg | 9.9  | 0.66 | 1               |
| Bromochloromethane                               | ND     |           | ug/kg | 4.9  | 0.35 | 1               |
| 1,2-Dibromoethane                                | ND     |           | ug/kg | 3.9  | 0.20 | 1               |
| n-Butylbenzene                                   | ND     |           | ug/kg | 0.99 | 0.22 | 1               |
| sec-Butylbenzene                                 | ND     |           | ug/kg | 0.99 | 0.21 | 1               |
| 1,2-Dibromo-3-chloropropane                      | ND     |           | ug/kg | 4.9  | 0.39 | 1               |
| Isopropylbenzene                                 | ND     |           | ug/kg | 0.99 | 0.19 | 1               |
| p-Isopropyltoluene                               | ND     |           | ug/kg | 0.99 | 0.20 | 1               |
| n-Propylbenzene                                  | ND     |           | ug/kg | 0.99 | 0.21 | 1               |
| 1,2,3-Trichlorobenzene                           | ND     |           | ug/kg | 4.9  | 0.25 | 1               |
| 1,2,4-Trichlorobenzene                           | ND     |           | ug/kg | 4.9  | 0.21 | 1               |
| 1,3,5-Trimethylbenzene                           | ND     |           | ug/kg | 4.9  | 0.16 | 1               |
| 1,2,4-Trimethylbenzene                           | ND     |           | ug/kg | 4.9  | 0.18 | 1               |
| Methyl Acetate                                   | ND     |           | ug/kg | 20   | 0.46 | 1               |
| Cyclohexane                                      | ND     |           | ug/kg | 20   | 0.43 | 1               |
| 1,4-Dioxane                                      | ND     |           | ug/kg | 39   | 14.  | 1               |
| Freon-113  | ND     |           | ug/kg | 20   | 0.51 | 1               |
| Methyl cyclohexane                               | ND     |           | ug/kg | 3.9  | 0.24 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 124        |           | 70-130              |
| Toluene-d8            | 101        |           | 70-130              |
| 4-Bromofluorobenzene  | 124        |           | 70-130              |
| Dibromofluoromethane  | 109        |           | 70-130              |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 09/25/17 09:16  
 Analyst: CBN

| Parameter  | Result | Qualifier | Units | RL  | MDL  |
|--|--------|-----------|-------|-----|------|
| Volatile Organics by 8260/5035 - Westborough Lab for sample(s): 01-02 Batch: WG1045593-5 |        |           |       |     |      |
| Methylene chloride   | ND     |           | ug/kg | 10  | 1.6  |
| 1,1-Dichloroethane   | ND     |           | ug/kg | 1.5 | 0.27 |
| Chloroform   | ND     |           | ug/kg | 1.5 | 0.37 |
| Carbon tetrachloride   | ND     |           | ug/kg | 1.0 | 0.34 |
| 1,2-Dichloropropane  | ND     |           | ug/kg | 3.5 | 0.23 |
| Dibromochloromethane   | ND     |           | ug/kg | 1.0 | 0.18 |
| 1,1,2-Trichloroethane  | ND     |           | ug/kg | 1.5 | 0.31 |
| Tetrachloroethene  | ND     |           | ug/kg | 1.0 | 0.30 |
| Chlorobenzene  | ND     |           | ug/kg | 1.0 | 0.35 |
| Trichlorofluoromethane   | ND     |           | ug/kg | 5.0 | 0.42 |
| 1,2-Dichloroethane   | ND     |           | ug/kg | 1.0 | 0.25 |
| 1,1,1-Trichloroethane  | ND     |           | ug/kg | 1.0 | 0.35 |
| Bromodichloromethane   | ND     |           | ug/kg | 1.0 | 0.31 |
| trans-1,3-Dichloropropene  | ND     |           | ug/kg | 1.0 | 0.21 |
| cis-1,3-Dichloropropene  | ND     |           | ug/kg | 1.0 | 0.23 |
| Bromoform  | ND     |           | ug/kg | 4.0 | 0.24 |
| 1,1,2,2-Tetrachloroethane  | ND     |           | ug/kg | 1.0 | 0.30 |
| Benzene  | ND     |           | ug/kg | 1.0 | 0.19 |
| Toluene  | ND     |           | ug/kg | 1.5 | 0.20 |
| Ethylbenzene   | ND     |           | ug/kg | 1.0 | 0.17 |
| Chloromethane  | ND     |           | ug/kg | 5.0 | 0.44 |
| Bromomethane   | 0.84   | J         | ug/kg | 2.0 | 0.34 |
| Vinyl chloride   | ND     |           | ug/kg | 2.0 | 0.32 |
| Chloroethane   | ND     |           | ug/kg | 2.0 | 0.32 |
| 1,1-Dichloroethene   | ND     |           | ug/kg | 1.0 | 0.37 |
| trans-1,2-Dichloroethene   | ND     |           | ug/kg | 1.5 | 0.24 |
| Trichloroethene  | ND     |           | ug/kg | 1.0 | 0.30 |
| 1,2-Dichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.18 |
| 1,3-Dichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.22 |

Project Name: MAIN &amp; EAST BALCOM STREET SITE

Lab Number: L1733355

Project Number: B0239-016-001-004

Report Date: 09/26/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 09/25/17 09:16  
 Analyst: CBN

| Parameter  | Result | Qualifier | Units | RL  | MDL  |
|--|--------|-----------|-------|-----|------|
| Volatile Organics by 8260/5035 - Westborough Lab for sample(s): 01-02 Batch: WG1045593-5 |        |           |       |     |      |
| 1,4-Dichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.18 |
| Methyl tert butyl ether  | ND     |           | ug/kg | 2.0 | 0.15 |
| p/m-Xylene   | ND     |           | ug/kg | 2.0 | 0.35 |
| o-Xylene   | ND     |           | ug/kg | 2.0 | 0.34 |
| cis-1,2-Dichloroethene   | ND     |           | ug/kg | 1.0 | 0.34 |
| Styrene  | ND     |           | ug/kg | 2.0 | 0.40 |
| Dichlorodifluoromethane  | ND     |           | ug/kg | 10  | 0.50 |
| Acetone  | ND     |           | ug/kg | 10  | 2.3  |
| Carbon disulfide   | ND     |           | ug/kg | 10  | 1.1  |
| 2-Butanone   | ND     |           | ug/kg | 10  | 0.69 |
| 4-Methyl-2-pentanone   | ND     |           | ug/kg | 10  | 0.24 |
| 2-Hexanone   | ND     |           | ug/kg | 10  | 0.67 |
| Bromochloromethane   | ND     |           | ug/kg | 5.0 | 0.36 |
| 1,2-Dibromoethane  | ND     |           | ug/kg | 4.0 | 0.20 |
| n-Butylbenzene   | ND     |           | ug/kg | 1.0 | 0.23 |
| sec-Butylbenzene   | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,2-Dibromo-3-chloropropane  | ND     |           | ug/kg | 5.0 | 0.40 |
| Isopropylbenzene   | ND     |           | ug/kg | 1.0 | 0.19 |
| p-Isopropyltoluene   | ND     |           | ug/kg | 1.0 | 0.20 |
| n-Propylbenzene  | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,2,3-Trichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.25 |
| 1,2,4-Trichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.22 |
| 1,3,5-Trimethylbenzene   | ND     |           | ug/kg | 5.0 | 0.16 |
| 1,2,4-Trimethylbenzene   | ND     |           | ug/kg | 5.0 | 0.19 |
| Methyl Acetate   | ND     |           | ug/kg | 20  | 0.46 |
| Cyclohexane  | ND     |           | ug/kg | 20  | 0.43 |
| 1,4-Dioxane  | ND     |           | ug/kg | 40  | 14.  |
| Freon-113  | ND     |           | ug/kg | 20  | 0.51 |
| Methyl cyclohexane   | ND     |           | ug/kg | 4.0 | 0.24 |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**Method Blank Analysis**  
**Batch Quality Control**

Analytical Method: 1,8260C  
Analytical Date: 09/25/17 09:16  
Analyst: CBN

| Parameter  | Result | Qualifier | Units | RL | MDL |
|--|--------|-----------|-------|----|-----|
| Volatile Organics by 8260/5035 - Westborough Lab for sample(s): 01-02 Batch: WG1045593-5 |        |           |       |    |     |

| Surrogate             | %Recovery | Qualifier | Acceptance<br>Criteria |
|-----------------------|-----------|-----------|------------------------|
| 1,2-Dichloroethane-d4 | 114       |           | 70-130                 |
| Toluene-d8            | 102       |           | 70-130                 |
| 4-Bromofluorobenzene  | 114       |           | 70-130                 |
| Dibromofluoromethane  | 99        |           | 70-130                 |

# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733355

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01-02 Batch: WG1045593-3 WG1045593-4 |                  |      |                   |      |                     |     |      |               |
| Methylene chloride  | 109              |      | 104               |      | 70-130              | 5   |      | 30            |
| 1,1-Dichloroethane  | 123              |      | 121               |      | 70-130              | 2   |      | 30            |
| Chloroform  | 110              |      | 107               |      | 70-130              | 3   |      | 30            |
| Carbon tetrachloride  | 119              |      | 115               |      | 70-130              | 3   |      | 30            |
| 1,2-Dichloropropane   | 118              |      | 116               |      | 70-130              | 2   |      | 30            |
| Dibromochloromethane  | 101              |      | 101               |      | 70-130              | 0   |      | 30            |
| 1,1,2-Trichloroethane   | 105              |      | 103               |      | 70-130              | 2   |      | 30            |
| Tetrachloroethene   | 108              |      | 103               |      | 70-130              | 5   |      | 30            |
| Chlorobenzene   | 101              |      | 99                |      | 70-130              | 2   |      | 30            |
| Trichlorofluoromethane  | 75               |      | 71                |      | 70-139              | 5   |      | 30            |
| 1,2-Dichloroethane  | 119              |      | 115               |      | 70-130              | 3   |      | 30            |
| 1,1,1-Trichloroethane   | 116              |      | 113               |      | 70-130              | 3   |      | 30            |
| Bromodichloromethane  | 110              |      | 106               |      | 70-130              | 4   |      | 30            |
| trans-1,3-Dichloropropene   | 110              |      | 110               |      | 70-130              | 0   |      | 30            |
| cis-1,3-Dichloropropene   | 109              |      | 105               |      | 70-130              | 4   |      | 30            |
| Bromoform   | 85               |      | 86                |      | 70-130              | 1   |      | 30            |
| 1,1,2,2-Tetrachloroethane   | 103              |      | 102               |      | 70-130              | 1   |      | 30            |
| Benzene   | 108              |      | 105               |      | 70-130              | 3   |      | 30            |
| Toluene   | 104              |      | 103               |      | 70-130              | 1   |      | 30            |
| Ethylbenzene  | 100              |      | 100               |      | 70-130              | 0   |      | 30            |
| Chloromethane   | 146              | Q    | 136               | Q    | 52-130              | 7   |      | 30            |
| Bromomethane  | 69               |      | 64                |      | 57-147              | 8   |      | 30            |
| Vinyl chloride  | 98               |      | 93                |      | 67-130              | 5   |      | 30            |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733355

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01-02 Batch: WG1045593-3 WG1045593-4 |                  |      |                   |      |                     |     |      |               |
| Chloroethane  | 75               |      | 71                |      | 50-151              | 5   |      | 30            |
| 1,1-Dichloroethene  | 112              |      | 109               |      | 65-135              | 3   |      | 30            |
| trans-1,2-Dichloroethene  | 111              |      | 106               |      | 70-130              | 5   |      | 30            |
| Trichloroethene   | 108              |      | 104               |      | 70-130              | 4   |      | 30            |
| 1,2-Dichlorobenzene   | 94               |      | 92                |      | 70-130              | 2   |      | 30            |
| 1,3-Dichlorobenzene   | 95               |      | 94                |      | 70-130              | 1   |      | 30            |
| 1,4-Dichlorobenzene   | 94               |      | 93                |      | 70-130              | 1   |      | 30            |
| Methyl tert butyl ether   | 105              |      | 101               |      | 66-130              | 4   |      | 30            |
| p/m-Xylene  | 94               |      | 92                |      | 70-130              | 2   |      | 30            |
| o-Xylene  | 96               |      | 95                |      | 70-130              | 1   |      | 30            |
| cis-1,2-Dichloroethene  | 102              |      | 102               |      | 70-130              | 0   |      | 30            |
| Styrene   | 97               |      | 95                |      | 70-130              | 2   |      | 30            |
| Dichlorodifluoromethane   | 121              |      | 112               |      | 30-146              | 8   |      | 30            |
| Acetone   | 145              | Q    | 142               | Q    | 54-140              | 2   |      | 30            |
| Carbon disulfide  | 112              |      | 108               |      | 59-130              | 4   |      | 30            |
| 2-Butanone  | 130              |      | 128               |      | 70-130              | 2   |      | 30            |
| 4-Methyl-2-pentanone  | 111              |      | 105               |      | 70-130              | 6   |      | 30            |
| 2-Hexanone  | 116              |      | 124               |      | 70-130              | 7   |      | 30            |
| Bromochloromethane  | 101              |      | 97                |      | 70-130              | 4   |      | 30            |
| 1,2-Dibromoethane   | 102              |      | 101               |      | 70-130              | 1   |      | 30            |
| n-Butylbenzene  | 100              |      | 98                |      | 70-130              | 2   |      | 30            |
| sec-Butylbenzene  | 95               |      | 96                |      | 70-130              | 1   |      | 30            |
| 1,2-Dibromo-3-chloropropane   | 92               |      | 89                |      | 68-130              | 3   |      | 30            |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733355

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by 8260/5035 - Westborough Lab Associated sample(s): 01-02 Batch: WG1045593-3 WG1045593-4 |                  |      |                   |      |                     |     |      |               |
| Isopropylbenzene  | 92               |      | 91                |      | 70-130              | 1   |      | 30            |
| p-Isopropyltoluene  | 91               |      | 90                |      | 70-130              | 1   |      | 30            |
| n-Propylbenzene   | 95               |      | 94                |      | 70-130              | 1   |      | 30            |
| 1,2,3-Trichlorobenzene  | 91               |      | 90                |      | 70-130              | 1   |      | 30            |
| 1,2,4-Trichlorobenzene  | 92               |      | 88                |      | 70-130              | 4   |      | 30            |
| 1,3,5-Trimethylbenzene  | 94               |      | 93                |      | 70-130              | 1   |      | 30            |
| 1,2,4-Trimethylbenzene  | 94               |      | 92                |      | 70-130              | 2   |      | 30            |
| Methyl Acetate  | 145              |      | 138               |      | 51-146              | 5   |      | 30            |
| Cyclohexane   | 131              |      | 125               |      | 59-142              | 5   |      | 30            |
| 1,4-Dioxane   | 97               |      | 96                |      | 65-136              | 1   |      | 30            |
| Freon-113   | 127              |      | 119               |      | 50-139              | 7   |      | 30            |
| Methyl cyclohexane  | 111              |      | 109               |      | 70-130              | 2   |      | 30            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 109              |      | 108               |      | 70-130                 |
| Toluene-d8            | 102              |      | 105               |      | 70-130                 |
| 4-Bromofluorobenzene  | 107              |      | 107               |      | 70-130                 |
| Dibromofluoromethane  | 100              |      | 102               |      | 70-130                 |

# SEMIVOLATILES



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-01  
 Client ID: MW-3 (18-20')  
 Sample Location: BUFFALO, NY

Date Collected: 09/19/17 09:30  
 Date Received: 09/19/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3546  
 Extraction Date: 09/22/17 22:47

Matrix: Soil  
 Analytical Method: 1,8270D  
 Analytical Date: 09/24/17 21:05  
 Analyst: RC  
 Percent Solids: 87%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 19. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 110 | 21. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 170 | 25. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 190 | 19. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 190 | 50. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 38. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 32. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 110 | 22. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 190 | 20. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 190 | 29. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 220 | 32. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 200 | 19. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 190 | 27. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 540 | 170 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 150 | 30. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 170 | 24. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 170 | 28. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 150 | 21. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 190 | 29. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 190 | 65. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 190 | 47. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 190 | 36. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 190 | 64. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 190 | 17. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 190 | 39. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 46. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 32. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 30. | 1               |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS****Lab ID:** L1733355-01**Date Collected:** 09/19/17 09:30**Client ID:** MW-3 (18-20')**Date Received:** 09/19/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | ND     |           | ug/kg | 110 | 20. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 29. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 36. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 26. | 1               |
| Pyrene   | ND     |           | ug/kg | 110 | 19. | 1               |
| Biphenyl   | ND     |           | ug/kg | 430 | 44. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 190 | 34. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 190 | 36. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 190 | 35. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 190 | 78. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 190 | 18. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 220 | 23. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 190 | 20. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 190 | 23. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 110 | 36. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 190 | 28. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 190 | 22. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 170 | 30. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 190 | 62. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 400 | 70. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 260 | 76. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 900 | 87. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 490 | 90. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 150 | 41. | 1               |
| Phenol   | ND     |           | ug/kg | 190 | 28. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 190 | 29. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 270 | 29. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 190 | 36. | 1               |
| Carbazole  | ND     |           | ug/kg | 190 | 18. | 1               |
| Atrazine   | ND     |           | ug/kg | 150 | 66. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 250 | 51. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 190 | 57. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 190 | 38. | 1               |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-01

Date Collected: 09/19/17 09:30

Client ID: MW-3 (18-20')

Date Received: 09/19/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 88         |           | 25-120              |
| Phenol-d6            | 90         |           | 10-120              |
| Nitrobenzene-d5      | 90         |           | 23-120              |
| 2-Fluorobiphenyl     | 92         |           | 30-120              |
| 2,4,6-Tribromophenol | 86         |           | 10-136              |
| 4-Terphenyl-d14      | 76         |           | 18-120              |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-02  
 Client ID: BD  
 Sample Location: BUFFALO, NY

Date Collected: 09/19/17 10:00  
 Date Received: 09/19/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3546  
 Extraction Date: 09/22/17 22:47

Matrix: Soil  
 Analytical Method: 1,8270D  
 Analytical Date: 09/24/17 20:10  
 Analyst: RC  
 Percent Solids: 87%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 19. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 110 | 21. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 170 | 25. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 190 | 18. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 190 | 49. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 37. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 32. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 110 | 21. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 190 | 20. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 190 | 28. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 220 | 32. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 200 | 19. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 190 | 27. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 530 | 170 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 150 | 30. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 170 | 24. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 170 | 28. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 150 | 21. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 190 | 29. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 190 | 64. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 190 | 47. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 190 | 35. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 190 | 63. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 190 | 17. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 190 | 39. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 45. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 31. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 30. | 1               |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS****Lab ID:** L1733355-02**Date Collected:** 09/19/17 10:00**Client ID:** BD**Date Received:** 09/19/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | ND     |           | ug/kg | 110 | 19. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 29. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 36. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 26. | 1               |
| Pyrene   | ND     |           | ug/kg | 110 | 18. | 1               |
| Biphenyl   | ND     |           | ug/kg | 420 | 43. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 190 | 34. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 190 | 36. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 190 | 35. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 190 | 77. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 190 | 18. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 220 | 22. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 190 | 19. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 190 | 23. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 110 | 35. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 190 | 28. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 190 | 22. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 170 | 30. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 190 | 61. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 400 | 70. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 260 | 76. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 890 | 87. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 480 | 89. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 150 | 41. | 1               |
| Phenol   | ND     |           | ug/kg | 190 | 28. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 190 | 29. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 270 | 29. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 190 | 36. | 1               |
| Carbazole  | ND     |           | ug/kg | 190 | 18. | 1               |
| Atrazine   | ND     |           | ug/kg | 150 | 65. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 240 | 50. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 190 | 56. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 190 | 38. | 1               |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-02

Date Collected: 09/19/17 10:00

Client ID: BD

Date Received: 09/19/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 84         |           | 25-120              |
| Phenol-d6            | 84         |           | 10-120              |
| Nitrobenzene-d5      | 84         |           | 23-120              |
| 2-Fluorobiphenyl     | 89         |           | 30-120              |
| 2,4,6-Tribromophenol | 91         |           | 10-136              |
| 4-Terphenyl-d14      | 83         |           | 18-120              |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 09/23/17 16:33  
 Analyst: HL

Extraction Method: EPA 3546  
 Extraction Date: 09/22/17 22:47

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1044801-1 |        |           |       |     |     |
| Acenaphthene   | ND     |           | ug/kg | 130 | 17. |
| Hexachlorobenzene  | ND     |           | ug/kg | 98  | 18. |
| Bis(2-chloroethyl)ether  | ND     |           | ug/kg | 150 | 22. |
| 2-Chloronaphthalene  | ND     |           | ug/kg | 160 | 16. |
| 3,3'-Dichlorobenzidine   | ND     |           | ug/kg | 160 | 43. |
| 2,4-Dinitrotoluene   | ND     |           | ug/kg | 160 | 32. |
| 2,6-Dinitrotoluene   | ND     |           | ug/kg | 160 | 28. |
| Fluoranthene   | ND     |           | ug/kg | 98  | 19. |
| 4-Chlorophenyl phenyl ether  | ND     |           | ug/kg | 160 | 17. |
| 4-Bromophenyl phenyl ether   | ND     |           | ug/kg | 160 | 25. |
| Bis(2-chloroisopropyl)ether  | ND     |           | ug/kg | 200 | 28. |
| Bis(2-chloroethoxy)methane   | ND     |           | ug/kg | 180 | 16. |
| Hexachlorobutadiene  | ND     |           | ug/kg | 160 | 24. |
| Hexachlorocyclopentadiene  | ND     |           | ug/kg | 460 | 150 |
| Hexachloroethane   | ND     |           | ug/kg | 130 | 26. |
| Isophorone   | ND     |           | ug/kg | 150 | 21. |
| Naphthalene  | ND     |           | ug/kg | 160 | 20. |
| Nitrobenzene   | ND     |           | ug/kg | 150 | 24. |
| NDPA/DPA   | ND     |           | ug/kg | 130 | 18. |
| n-Nitrosodi-n-propylamine  | ND     |           | ug/kg | 160 | 25. |
| Bis(2-ethylhexyl)phthalate   | ND     |           | ug/kg | 160 | 56. |
| Butyl benzyl phthalate   | ND     |           | ug/kg | 160 | 41. |
| Di-n-butylphthalate  | ND     |           | ug/kg | 160 | 31. |
| Di-n-octylphthalate  | ND     |           | ug/kg | 160 | 55. |
| Diethyl phthalate  | ND     |           | ug/kg | 160 | 15. |
| Dimethyl phthalate   | ND     |           | ug/kg | 160 | 34. |
| Benzo(a)anthracene   | ND     |           | ug/kg | 98  | 18. |
| Benzo(a)pyrene   | ND     |           | ug/kg | 130 | 40. |
| Benzo(b)fluoranthene   | ND     |           | ug/kg | 98  | 27. |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 09/23/17 16:33  
 Analyst: HL

Extraction Method: EPA 3546  
 Extraction Date: 09/22/17 22:47

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1044801-1 |        |           |       |     |     |
| Benzo(k)fluoranthene   | ND     |           | ug/kg | 98  | 26. |
| Chrysene   | ND     |           | ug/kg | 98  | 17. |
| Acenaphthylene   | ND     |           | ug/kg | 130 | 25. |
| Anthracene   | ND     |           | ug/kg | 98  | 32. |
| Benzo(ghi)perylene   | ND     |           | ug/kg | 130 | 19. |
| Fluorene   | ND     |           | ug/kg | 160 | 16. |
| Phenanthrene   | ND     |           | ug/kg | 98  | 20. |
| Dibenzo(a,h)anthracene   | ND     |           | ug/kg | 98  | 19. |
| Indeno(1,2,3-cd)pyrene   | ND     |           | ug/kg | 130 | 23. |
| Pyrene   | ND     |           | ug/kg | 98  | 16. |
| Biphenyl   | ND     |           | ug/kg | 370 | 38. |
| 4-Chloroaniline  | ND     |           | ug/kg | 160 | 30. |
| 2-Nitroaniline   | ND     |           | ug/kg | 160 | 31. |
| 3-Nitroaniline   | ND     |           | ug/kg | 160 | 31. |
| 4-Nitroaniline   | ND     |           | ug/kg | 160 | 67. |
| Dibenzofuran   | ND     |           | ug/kg | 160 | 15. |
| 2-Methylnaphthalene  | ND     |           | ug/kg | 200 | 20. |
| 1,2,4,5-Tetrachlorobenzene   | ND     |           | ug/kg | 160 | 17. |
| Acetophenone   | ND     |           | ug/kg | 160 | 20. |
| 2,4,6-Trichlorophenol  | ND     |           | ug/kg | 98  | 31. |
| p-Chloro-m-cresol  | ND     |           | ug/kg | 160 | 24. |
| 2-Chlorophenol   | ND     |           | ug/kg | 160 | 19. |
| 2,4-Dichlorophenol   | ND     |           | ug/kg | 150 | 26. |
| 2,4-Dimethylphenol   | ND     |           | ug/kg | 160 | 54. |
| 2-Nitrophenol  | ND     |           | ug/kg | 350 | 61. |
| 4-Nitrophenol  | ND     |           | ug/kg | 230 | 66. |
| 2,4-Dinitrophenol  | ND     |           | ug/kg | 780 | 76. |
| 4,6-Dinitro-o-cresol   | ND     |           | ug/kg | 420 | 78. |
| Pentachlorophenol  | ND     |           | ug/kg | 130 | 36. |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**Method Blank Analysis  
Batch Quality Control**

Analytical Method: 1,8270D  
 Analytical Date: 09/23/17 16:33  
 Analyst: HL

Extraction Method: EPA 3546  
 Extraction Date: 09/22/17 22:47

| Parameter  | Result | Qualifier | Units | RL  | MDL |
|--|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1044801-1 |        |           |       |     |     |
| Phenol   | ND     |           | ug/kg | 160 | 24. |
| 2-Methylphenol   | ND     |           | ug/kg | 160 | 25. |
| 3-Methylphenol/4-Methylphenol  | ND     |           | ug/kg | 230 | 25. |
| 2,4,5-Trichlorophenol  | ND     |           | ug/kg | 160 | 31. |
| Carbazole  | ND     |           | ug/kg | 160 | 16. |
| Atrazine   | ND     |           | ug/kg | 130 | 57. |
| Benzaldehyde   | ND     |           | ug/kg | 210 | 44. |
| Caprolactam  | ND     |           | ug/kg | 160 | 49. |
| 2,3,4,6-Tetrachlorophenol  | ND     |           | ug/kg | 160 | 33. |

**Tentatively Identified Compounds**

No Tentatively Identified Compounds      ND      ug/kg

| Surrogate            | %Recovery | Qualifier | Acceptance<br>Criteria |
|----------------------|-----------|-----------|------------------------|
| 2-Fluorophenol       | 78        |           | 25-120                 |
| Phenol-d6            | 81        |           | 10-120                 |
| Nitrobenzene-d5      | 72        |           | 23-120                 |
| 2-Fluorobiphenyl     | 88        |           | 30-120                 |
| 2,4,6-Tribromophenol | 74        |           | 10-136                 |
| 4-Terphenyl-d14      | 81        |           | 18-120                 |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733355

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1044801-2 WG1044801-3 |                  |      |                   |      |                     |     |      |               |
| Acenaphthene  | 84               |      | 83                |      | 31-137              | 1   |      | 50            |
| Hexachlorobenzene   | 87               |      | 86                |      | 40-140              | 1   |      | 50            |
| Bis(2-chloroethyl)ether   | 78               |      | 77                |      | 40-140              | 1   |      | 50            |
| 2-Chloronaphthalene   | 84               |      | 83                |      | 40-140              | 1   |      | 50            |
| 3,3'-Dichlorobenzidine  | 58               |      | 57                |      | 40-140              | 2   |      | 50            |
| 2,4-Dinitrotoluene  | 91               |      | 90                |      | 40-132              | 1   |      | 50            |
| 2,6-Dinitrotoluene  | 91               |      | 91                |      | 40-140              | 0   |      | 50            |
| Fluoranthene  | 90               |      | 88                |      | 40-140              | 2   |      | 50            |
| 4-Chlorophenyl phenyl ether   | 86               |      | 85                |      | 40-140              | 1   |      | 50            |
| 4-Bromophenyl phenyl ether  | 88               |      | 86                |      | 40-140              | 2   |      | 50            |
| Bis(2-chloroisopropyl)ether   | 69               |      | 68                |      | 40-140              | 1   |      | 50            |
| Bis(2-chloroethoxy)methane  | 84               |      | 82                |      | 40-117              | 2   |      | 50            |
| Hexachlorobutadiene   | 83               |      | 83                |      | 40-140              | 0   |      | 50            |
| Hexachlorocyclopentadiene   | 85               |      | 84                |      | 40-140              | 1   |      | 50            |
| Hexachloroethane  | 76               |      | 74                |      | 40-140              | 3   |      | 50            |
| Isophorone  | 83               |      | 81                |      | 40-140              | 2   |      | 50            |
| Naphthalene   | 82               |      | 81                |      | 40-140              | 1   |      | 50            |
| Nitrobenzene  | 81               |      | 79                |      | 40-140              | 3   |      | 50            |
| NDPA/DPA  | 89               |      | 88                |      | 36-157              | 1   |      | 50            |
| n-Nitrosodi-n-propylamine   | 81               |      | 80                |      | 32-121              | 1   |      | 50            |
| Bis(2-ethylhexyl)phthalate  | 87               |      | 87                |      | 40-140              | 0   |      | 50            |
| Butyl benzyl phthalate  | 90               |      | 90                |      | 40-140              | 0   |      | 50            |
| Di-n-butylphthalate   | 92               |      | 91                |      | 40-140              | 1   |      | 50            |

# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733355

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1044801-2 WG1044801-3 |                  |      |                   |      |                     |     |      |               |
| Di-n-octylphthalate   | 84               |      | 84                |      | 40-140              | 0   |      | 50            |
| Diethyl phthalate   | 89               |      | 87                |      | 40-140              | 2   |      | 50            |
| Dimethyl phthalate  | 84               |      | 82                |      | 40-140              | 2   |      | 50            |
| Benzo(a)anthracene  | 87               |      | 85                |      | 40-140              | 2   |      | 50            |
| Benzo(a)pyrene  | 93               |      | 94                |      | 40-140              | 1   |      | 50            |
| Benzo(b)fluoranthene  | 91               |      | 86                |      | 40-140              | 6   |      | 50            |
| Benzo(k)fluoranthene  | 93               |      | 94                |      | 40-140              | 1   |      | 50            |
| Chrysene  | 84               |      | 83                |      | 40-140              | 1   |      | 50            |
| Acenaphthylene  | 90               |      | 89                |      | 40-140              | 1   |      | 50            |
| Anthracene  | 91               |      | 88                |      | 40-140              | 3   |      | 50            |
| Benzo(ghi)perylene  | 99               |      | 98                |      | 40-140              | 1   |      | 50            |
| Fluorene  | 88               |      | 86                |      | 40-140              | 2   |      | 50            |
| Phenanthrene  | 87               |      | 84                |      | 40-140              | 4   |      | 50            |
| Dibenzo(a,h)anthracene  | 101              |      | 100               |      | 40-140              | 1   |      | 50            |
| Indeno(1,2,3-cd)pyrene  | 94               |      | 95                |      | 40-140              | 1   |      | 50            |
| Pyrene  | 89               |      | 86                |      | 35-142              | 3   |      | 50            |
| Biphenyl  | 88               |      | 88                |      | 54-104              | 0   |      | 50            |
| 4-Chloroaniline   | 67               |      | 67                |      | 40-140              | 0   |      | 50            |
| 2-Nitroaniline  | 88               |      | 86                |      | 47-134              | 2   |      | 50            |
| 3-Nitroaniline  | 71               |      | 72                |      | 26-129              | 1   |      | 50            |
| 4-Nitroaniline  | 81               |      | 80                |      | 41-125              | 1   |      | 50            |
| Dibenzofuran  | 85               |      | 84                |      | 40-140              | 1   |      | 50            |
| 2-Methylnaphthalene   | 86               |      | 85                |      | 40-140              | 1   |      | 50            |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733355

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1044801-2 WG1044801-3 |                  |      |                   |      |                     |     |      |               |
| 1,2,4,5-Tetrachlorobenzene  | 86               |      | 85                |      | 40-117              | 1   |      | 50            |
| Acetophenone  | 90               |      | 88                |      | 14-144              | 2   |      | 50            |
| 2,4,6-Trichlorophenol   | 91               |      | 90                |      | 30-130              | 1   |      | 50            |
| p-Chloro-m-cresol   | 90               |      | 88                |      | 26-103              | 2   |      | 50            |
| 2-Chlorophenol  | 83               |      | 82                |      | 25-102              | 1   |      | 50            |
| 2,4-Dichlorophenol  | 90               |      | 88                |      | 30-130              | 2   |      | 50            |
| 2,4-Dimethylphenol  | 94               |      | 92                |      | 30-130              | 2   |      | 50            |
| 2-Nitrophenol   | 80               |      | 80                |      | 30-130              | 0   |      | 50            |
| 4-Nitrophenol   | 81               |      | 81                |      | 11-114              | 0   |      | 50            |
| 2,4-Dinitrophenol   | 50               |      | 55                |      | 4-130               | 10  |      | 50            |
| 4,6-Dinitro-o-cresol  | 76               |      | 78                |      | 10-130              | 3   |      | 50            |
| Pentachlorophenol   | 88               |      | 88                |      | 17-109              | 0   |      | 50            |
| Phenol  | 82               |      | 81                |      | 26-90               | 1   |      | 50            |
| 2-Methylphenol  | 86               |      | 85                |      | 30-130              | 1   |      | 50            |
| 3-Methylphenol/4-Methylphenol   | 88               |      | 86                |      | 30-130              | 2   |      | 50            |
| 2,4,5-Trichlorophenol   | 91               |      | 90                |      | 30-130              | 1   |      | 50            |
| Carbazole   | 88               |      | 86                |      | 54-128              | 2   |      | 50            |
| Atrazine  | 101              |      | 100               |      | 40-140              | 1   |      | 50            |
| Benzaldehyde  | 79               |      | 76                |      | 40-140              | 4   |      | 50            |
| Caprolactam   | 81               |      | 81                |      | 15-130              | 0   |      | 50            |
| 2,3,4,6-Tetrachlorophenol   | 89               |      | 88                |      | 40-140              | 1   |      | 50            |

**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

| <b>Parameter</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|

Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1044801-2 WG1044801-3

| <b>Surrogate</b>     | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> |
|----------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|
| 2-Fluorophenol       | 78                       |             | 77                        |             | 25-120                         |
| Phenol-d6            | 81                       |             | 79                        |             | 10-120                         |
| Nitrobenzene-d5      | 75                       |             | 74                        |             | 23-120                         |
| 2-Fluorobiphenyl     | 86                       |             | 85                        |             | 30-120                         |
| 2,4,6-Tribromophenol | 85                       |             | 83                        |             | 10-136                         |
| 4-Terphenyl-d14      | 79                       |             | 77                        |             | 18-120                         |

# PCBS

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

**SAMPLE RESULTS**

**Lab ID:** L1733355-01  
**Client ID:** MW-3 (18-20')  
**Sample Location:** BUFFALO, NY

**Matrix:** Soil  
**Analytical Method:** 1,8082A  
**Analytical Date:** 09/25/17 18:13  
**Analyst:** WR  
**Percent Solids:** 87%

**Date Collected:** 09/19/17 09:30  
**Date Received:** 09/19/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 09/22/17 12:01  
**Cleanup Method:** EPA 3665A  
**Cleanup Date:** 09/22/17  
**Cleanup Method:** EPA 3660B  
**Cleanup Date:** 09/23/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|---|--------|-----------|-------|------|------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |      |      |                 |        |
| Aroclor 1016                                      | ND     |           | ug/kg | 37.5 | 4.25 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/kg | 37.5 | 5.71 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/kg | 37.5 | 3.69 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/kg | 37.5 | 4.59 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/kg | 37.5 | 4.21 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/kg | 37.5 | 3.06 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/kg | 37.5 | 3.91 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/kg | 37.5 | 3.08 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/kg | 37.5 | 2.65 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/kg | 37.5 | 2.65 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 62         |           | 30-150              | A      |
| Decachlorobiphenyl           | 38         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 63         |           | 30-150              | B      |
| Decachlorobiphenyl           | 45         |           | 30-150              | B      |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

**SAMPLE RESULTS**

**Lab ID:** L1733355-02  
**Client ID:** BD  
**Sample Location:** BUFFALO, NY

**Matrix:** Soil  
**Analytical Method:** 1,8082A  
**Analytical Date:** 09/25/17 18:25  
**Analyst:** WR  
**Percent Solids:** 87%

**Date Collected:** 09/19/17 10:00  
**Date Received:** 09/19/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 09/22/17 12:01  
**Cleanup Method:** EPA 3665A  
**Cleanup Date:** 09/22/17  
**Cleanup Method:** EPA 3660B  
**Cleanup Date:** 09/23/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution Factor | Column |
|---|--------|-----------|-------|------|------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |      |      |                 |        |
| Aroclor 1016                                      | ND     |           | ug/kg | 37.6 | 4.27 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/kg | 37.6 | 5.73 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/kg | 37.6 | 3.70 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/kg | 37.6 | 4.61 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/kg | 37.6 | 4.22 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/kg | 37.6 | 3.07 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/kg | 37.6 | 3.93 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/kg | 37.6 | 3.10 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/kg | 37.6 | 2.66 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/kg | 37.6 | 2.66 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 80         |           | 30-150              | A      |
| Decachlorobiphenyl           | 51         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 82         |           | 30-150              | B      |
| Decachlorobiphenyl           | 59         |           | 30-150              | B      |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8082A  
 Analytical Date: 09/22/17 09:38  
 Analyst: WR

Extraction Method: EPA 3546  
 Extraction Date: 09/21/17 13:44  
 Cleanup Method: EPA 3665A  
 Cleanup Date: 09/22/17  
 Cleanup Method: EPA 3660B  
 Cleanup Date: 09/22/17

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Column |
|---|--------|-----------|-------|------|------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab for sample(s): 01-02 Batch: WG1044171-1 |        |           |       |      |      |        |
| Aroclor 1016  | ND     |           | ug/kg | 32.3 | 3.67 | A      |
| Aroclor 1221  | ND     |           | ug/kg | 32.3 | 4.92 | A      |
| Aroclor 1232  | ND     |           | ug/kg | 32.3 | 3.18 | A      |
| Aroclor 1242  | ND     |           | ug/kg | 32.3 | 3.96 | A      |
| Aroclor 1248  | ND     |           | ug/kg | 32.3 | 3.63 | A      |
| Aroclor 1254  | ND     |           | ug/kg | 32.3 | 2.64 | A      |
| Aroclor 1260  | ND     |           | ug/kg | 32.3 | 3.38 | A      |
| Aroclor 1262  | ND     |           | ug/kg | 32.3 | 2.66 | A      |
| Aroclor 1268  | ND     |           | ug/kg | 32.3 | 2.29 | A      |
| PCBs, Total   | ND     |           | ug/kg | 32.3 | 2.29 | A      |

| Surrogate                    | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|------------------------------|-----------|-----------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 91        |           | 30-150                 | A      |
| Decachlorobiphenyl           | 77        |           | 30-150                 | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 82        |           | 30-150                 | B      |
| Decachlorobiphenyl           | 78        |           | 30-150                 | B      |

**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

| <b>Parameter</b>   | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> | <b>Column</b> |
|--|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|---------------|
| Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 01-02 Batch: WG1044171-2 WG1044171-3 |                          |             |                           |             |                             |            |             |                       |               |
| Aroclor 1016   | 93                       |             | 99                        |             | 40-140                      | 6          |             | 50                    | A             |
| Aroclor 1260   | 91                       |             | 98                        |             | 40-140                      | 7          |             | 50                    | A             |

| <b>Surrogate</b>             | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> | <b>Column</b> |
|------------------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|---------------|
| 2,4,5,6-Tetrachloro-m-xylene | 88                       |             | 93                        |             | 30-150                         | A             |
| Decachlorobiphenyl           | 74                       |             | 78                        |             | 30-150                         | A             |
| 2,4,5,6-Tetrachloro-m-xylene | 79                       |             | 82                        |             | 30-150                         | B             |
| Decachlorobiphenyl           | 75                       |             | 78                        |             | 30-150                         | B             |

# PESTICIDES

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-01  
 Client ID: MW-3 (18-20')  
 Sample Location: BUFFALO, NY

Date Collected: 09/19/17 09:30  
 Date Received: 09/19/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3546  
 Extraction Date: 09/22/17 09:42  
 Cleanup Method: EPA 3620B  
 Cleanup Date: 09/23/17

Matrix: Soil  
 Analytical Method: 1,8081B  
 Analytical Date: 09/23/17 12:41  
 Analyst: KEG  
 Percent Solids: 87%

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Delta-BHC   | ND     |           | ug/kg | 1.79  | 0.351 | 1               | A      |
| Lindane   | ND     |           | ug/kg | 0.747 | 0.334 | 1               | A      |
| Alpha-BHC   | ND     |           | ug/kg | 0.747 | 0.212 | 1               | A      |
| Beta-BHC  | ND     |           | ug/kg | 1.79  | 0.680 | 1               | A      |
| Heptachlor  | ND     |           | ug/kg | 0.896 | 0.402 | 1               | A      |
| Aldrin  | ND     |           | ug/kg | 1.79  | 0.631 | 1               | A      |
| Heptachlor epoxide                                | ND     |           | ug/kg | 3.36  | 1.01  | 1               | A      |
| Endrin  | ND     |           | ug/kg | 0.747 | 0.306 | 1               | A      |
| Endrin aldehyde                                   | ND     |           | ug/kg | 2.24  | 0.784 | 1               | A      |
| Endrin ketone                                     | ND     |           | ug/kg | 1.79  | 0.462 | 1               | A      |
| Dieldrin  | ND     |           | ug/kg | 1.12  | 0.560 | 1               | A      |
| 4,4'-DDE  | ND     |           | ug/kg | 1.79  | 0.414 | 1               | A      |
| 4,4'-DDD  | ND     |           | ug/kg | 1.79  | 0.639 | 1               | A      |
| 4,4'-DDT  | ND     |           | ug/kg | 3.36  | 1.44  | 1               | A      |
| Endosulfan I                                      | ND     |           | ug/kg | 1.79  | 0.424 | 1               | A      |
| Endosulfan II                                     | ND     |           | ug/kg | 1.79  | 0.599 | 1               | A      |
| Endosulfan sulfate                                | ND     |           | ug/kg | 0.747 | 0.356 | 1               | A      |
| Methoxychlor                                      | ND     |           | ug/kg | 3.36  | 1.04  | 1               | A      |
| Toxaphene   | ND     |           | ug/kg | 33.6  | 9.41  | 1               | A      |
| cis-Chlordane                                     | ND     |           | ug/kg | 2.24  | 0.624 | 1               | A      |
| trans-Chlordane                                   | ND     |           | ug/kg | 2.24  | 0.592 | 1               | A      |
| Chlordane   | ND     |           | ug/kg | 14.6  | 5.94  | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 76         |           | 30-150              | B      |
| Decachlorobiphenyl           | 78         |           | 30-150              | B      |
| 2,4,5,6-Tetrachloro-m-xylene | 80         |           | 30-150              | A      |
| Decachlorobiphenyl           | 97         |           | 30-150              | A      |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-01  
 Client ID: MW-3 (18-20')  
 Sample Location: BUFFALO, NY

Date Collected: 09/19/17 09:30  
 Date Received: 09/19/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 8151A  
 Extraction Date: 09/22/17 13:06

Matrix: Soil  
 Analytical Method: 1,8151A  
 Analytical Date: 09/24/17 02:33  
 Analyst: SL  
 Percent Solids: 87%  
 Methylation Date: 09/23/17 11:57

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor | Column |
|-----------|--------|-----------|-------|----|-----|-----------------|--------|
|-----------|--------|-----------|-------|----|-----|-----------------|--------|

## Chlorinated Herbicides by GC - Westborough Lab

|                   |    |  |       |     |      |   |   |
|-------------------|----|--|-------|-----|------|---|---|
| 2,4-D             | ND |  | ug/kg | 187 | 11.8 | 1 | A |
| 2,4,5-T           | ND |  | ug/kg | 187 | 5.81 | 1 | A |
| 2,4,5-TP (Silvex) | ND |  | ug/kg | 187 | 4.98 | 1 | A |

| Surrogate | % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|------------|-----------|---------------------|--------|
| DCAA      | 92         |           | 30-150              | A      |
| DCAA      | 82         |           | 30-150              | B      |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-02  
 Client ID: BD  
 Sample Location: BUFFALO, NY

Date Collected: 09/19/17 10:00  
 Date Received: 09/19/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3546  
 Extraction Date: 09/22/17 09:42  
 Cleanup Method: EPA 3620B  
 Cleanup Date: 09/23/17

Matrix: Soil  
 Analytical Method: 1,8081B  
 Analytical Date: 09/23/17 12:54  
 Analyst: KEG  
 Percent Solids: 87%

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Delta-BHC   | ND     |           | ug/kg | 1.78  | 0.350 | 1               | A      |
| Lindane   | ND     |           | ug/kg | 0.744 | 0.332 | 1               | A      |
| Alpha-BHC   | ND     |           | ug/kg | 0.744 | 0.211 | 1               | A      |
| Beta-BHC  | ND     |           | ug/kg | 1.78  | 0.677 | 1               | A      |
| Heptachlor  | ND     |           | ug/kg | 0.892 | 0.400 | 1               | A      |
| Aldrin  | ND     |           | ug/kg | 1.78  | 0.628 | 1               | A      |
| Heptachlor epoxide                                | ND     |           | ug/kg | 3.35  | 1.00  | 1               | A      |
| Endrin  | ND     |           | ug/kg | 0.744 | 0.305 | 1               | A      |
| Endrin aldehyde                                   | ND     |           | ug/kg | 2.23  | 0.781 | 1               | A      |
| Endrin ketone                                     | ND     |           | ug/kg | 1.78  | 0.460 | 1               | A      |
| Dieldrin  | ND     |           | ug/kg | 1.12  | 0.558 | 1               | A      |
| 4,4'-DDE  | ND     |           | ug/kg | 1.78  | 0.413 | 1               | A      |
| 4,4'-DDD  | ND     |           | ug/kg | 1.78  | 0.637 | 1               | A      |
| 4,4'-DDT  | ND     |           | ug/kg | 3.35  | 1.44  | 1               | A      |
| Endosulfan I                                      | ND     |           | ug/kg | 1.78  | 0.422 | 1               | A      |
| Endosulfan II                                     | ND     |           | ug/kg | 1.78  | 0.596 | 1               | A      |
| Endosulfan sulfate                                | ND     |           | ug/kg | 0.744 | 0.354 | 1               | A      |
| Methoxychlor                                      | ND     |           | ug/kg | 3.35  | 1.04  | 1               | A      |
| Toxaphene   | ND     |           | ug/kg | 33.5  | 9.37  | 1               | A      |
| cis-Chlordane                                     | ND     |           | ug/kg | 2.23  | 0.622 | 1               | A      |
| trans-Chlordane                                   | ND     |           | ug/kg | 2.23  | 0.589 | 1               | A      |
| Chlordane   | ND     |           | ug/kg | 14.5  | 5.91  | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 86         |           | 30-150              | B      |
| Decachlorobiphenyl           | 87         |           | 30-150              | B      |
| 2,4,5,6-Tetrachloro-m-xylene | 85         |           | 30-150              | A      |
| Decachlorobiphenyl           | 113        |           | 30-150              | A      |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-02  
 Client ID: BD  
 Sample Location: BUFFALO, NY

Date Collected: 09/19/17 10:00  
 Date Received: 09/19/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 8151A  
 Extraction Date: 09/22/17 13:06

Matrix: Soil  
 Analytical Method: 1,8151A  
 Analytical Date: 09/24/17 02:53  
 Analyst: SL  
 Percent Solids: 87%  
 Methylation Date: 09/23/17 11:57

| Parameter                                      | Result | Qualifier | Units | RL  | MDL  | Dilution Factor | Column |
|--|--------|-----------|-------|-----|------|-----------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab |        |           |       |     |      |                 |        |
| 2,4-D  | ND     |           | ug/kg | 186 | 11.7 | 1               | A      |
| 2,4,5-T  | ND     |           | ug/kg | 186 | 5.78 | 1               | A      |
| 2,4,5-TP (Silvex)                              | ND     |           | ug/kg | 186 | 4.96 | 1               | A      |

| Surrogate | % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|------------|-----------|---------------------|--------|
| DCAA      | 104        |           | 30-150              | A      |
| DCAA      | 90         |           | 30-150              | B      |

Project Name: MAIN &amp; EAST BALCOM STREET SITE

Lab Number: L1733355

Project Number: B0239-016-001-004

Report Date: 09/26/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8081B  
 Analytical Date: 09/23/17 12:03  
 Analyst: KEG

Extraction Method: EPA 3546  
 Extraction Date: 09/22/17 00:39  
 Cleanup Method: EPA 3620B  
 Cleanup Date: 09/22/17

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Column |
|---|--------|-----------|-------|-------|-------|--------|
| Organochlorine Pesticides by GC - Westborough Lab for sample(s): 01-02 Batch: WG1044382-1 |        |           |       |       |       |        |
| Delta-BHC   | ND     |           | ug/kg | 1.52  | 0.298 | A      |
| Lindane   | ND     |           | ug/kg | 0.634 | 0.283 | A      |
| Alpha-BHC   | ND     |           | ug/kg | 0.634 | 0.180 | A      |
| Beta-BHC  | ND     |           | ug/kg | 1.52  | 0.577 | A      |
| Heptachlor  | ND     |           | ug/kg | 0.760 | 0.341 | A      |
| Aldrin  | ND     |           | ug/kg | 1.52  | 0.535 | A      |
| Heptachlor epoxide  | ND     |           | ug/kg | 2.85  | 0.856 | A      |
| Endrin  | ND     |           | ug/kg | 0.634 | 0.260 | A      |
| Endrin aldehyde   | ND     |           | ug/kg | 1.90  | 0.665 | A      |
| Endrin ketone   | ND     |           | ug/kg | 1.52  | 0.392 | A      |
| Dieldrin  | ND     |           | ug/kg | 0.950 | 0.475 | A      |
| 4,4'-DDE  | ND     |           | ug/kg | 1.52  | 0.352 | A      |
| 4,4'-DDD  | ND     |           | ug/kg | 1.52  | 0.542 | A      |
| 4,4'-DDT  | ND     |           | ug/kg | 2.85  | 1.22  | A      |
| Endosulfan I  | ND     |           | ug/kg | 1.52  | 0.359 | A      |
| Endosulfan II   | ND     |           | ug/kg | 1.52  | 0.508 | A      |
| Endosulfan sulfate  | ND     |           | ug/kg | 0.634 | 0.302 | A      |
| Methoxychlor  | ND     |           | ug/kg | 2.85  | 0.887 | A      |
| Toxaphene   | ND     |           | ug/kg | 28.5  | 7.98  | A      |
| cis-Chlordane   | ND     |           | ug/kg | 1.90  | 0.530 | A      |
| trans-Chlordane   | ND     |           | ug/kg | 1.90  | 0.502 | A      |
| Chlordane   | ND     |           | ug/kg | 12.4  | 5.04  | A      |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**Method Blank Analysis**  
**Batch Quality Control**Analytical Method: 1,8081B  
Analytical Date: 09/23/17 12:03  
Analyst: KEGExtraction Method: EPA 3546  
Extraction Date: 09/22/17 00:39  
Cleanup Method: EPA 3620B  
Cleanup Date: 09/22/17

| Parameter   | Result | Qualifier | Units | RL | MDL | Column |
|---|--------|-----------|-------|----|-----|--------|
| Organochlorine Pesticides by GC - Westborough Lab for sample(s): 01-02 Batch: WG1044382-1 |        |           |       |    |     |        |

| Surrogate                    | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|------------------------------|-----------|-----------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 96        |           | 30-150                 | B      |
| Decachlorobiphenyl           | 86        |           | 30-150                 | B      |
| 2,4,5,6-Tetrachloro-m-xylene | 98        |           | 30-150                 | A      |
| Decachlorobiphenyl           | 87        |           | 30-150                 | A      |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**Method Blank Analysis**  
**Batch Quality Control**

Analytical Method: 1,8151A  
 Analytical Date: 09/24/17 00:17  
 Analyst: SL

Extraction Method: EPA 8151A  
 Extraction Date: 09/22/17 13:06

Methylation Date: 09/23/17 11:57

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Column |
|--|--------|-----------|-------|-----|------|--------|
| Chlorinated Herbicides by GC - Westborough Lab for sample(s): 01-02 Batch: WG1044654-1 |        |           |       |     |      |        |
| 2,4-D  | ND     |           | ug/kg | 166 | 10.4 | A      |
| 2,4,5-T  | ND     |           | ug/kg | 166 | 5.14 | A      |
| 2,4,5-TP (Silvex)  | ND     |           | ug/kg | 166 | 4.41 | A      |

| Surrogate | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|-----------|-----------|-----------|------------------------|--------|
| DCAA      | 59        |           | 30-150                 | A      |
| DCAA      | 52        |           | 30-150                 | B      |

# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733355

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits | Column |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01-02 Batch: WG1044382-2 WG1044382-3 |                  |      |                   |      |                     |     |      |               |        |
| Delta-BHC  | 100              |      | 106               |      | 30-150              | 6   |      | 30            | A      |
| Lindane  | 97               |      | 103               |      | 30-150              | 6   |      | 30            | A      |
| Alpha-BHC  | 101              |      | 108               |      | 30-150              | 7   |      | 30            | A      |
| Beta-BHC   | 91               |      | 96                |      | 30-150              | 5   |      | 30            | A      |
| Heptachlor   | 87               |      | 91                |      | 30-150              | 4   |      | 30            | A      |
| Aldrin   | 93               |      | 98                |      | 30-150              | 5   |      | 30            | A      |
| Heptachlor epoxide   | 93               |      | 96                |      | 30-150              | 3   |      | 30            | A      |
| Endrin   | 105              |      | 111               |      | 30-150              | 6   |      | 30            | A      |
| Endrin aldehyde  | 77               |      | 78                |      | 30-150              | 1   |      | 30            | A      |
| Endrin ketone  | 94               |      | 98                |      | 30-150              | 4   |      | 30            | A      |
| Dieldrin   | 103              |      | 110               |      | 30-150              | 7   |      | 30            | A      |
| 4,4'-DDE   | 95               |      | 101               |      | 30-150              | 6   |      | 30            | A      |
| 4,4'-DDD   | 99               |      | 105               |      | 30-150              | 6   |      | 30            | A      |
| 4,4'-DDT   | 103              |      | 109               |      | 30-150              | 6   |      | 30            | A      |
| Endosulfan I   | 92               |      | 97                |      | 30-150              | 5   |      | 30            | A      |
| Endosulfan II  | 96               |      | 102               |      | 30-150              | 6   |      | 30            | A      |
| Endosulfan sulfate   | 80               |      | 81                |      | 30-150              | 1   |      | 30            | A      |
| Methoxychlor   | 92               |      | 95                |      | 30-150              | 3   |      | 30            | A      |
| cis-Chlordane  | 90               |      | 92                |      | 30-150              | 2   |      | 30            | A      |
| trans-Chlordane  | 99               |      | 103               |      | 30-150              | 4   |      | 30            | A      |

**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

| <b>Parameter</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|

Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01-02 Batch: WG1044382-2 WG1044382-3

| <b>Surrogate</b>             | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> | <b>Column</b> |
|------------------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|---------------|
| 2,4,5,6-Tetrachloro-m-xylene | 89                       |             | 94                        |             | 30-150                         | B             |
| Decachlorobiphenyl           | 77                       |             | 81                        |             | 30-150                         | B             |
| 2,4,5,6-Tetrachloro-m-xylene | 91                       |             | 95                        |             | 30-150                         | A             |
| Decachlorobiphenyl           | 74                       |             | 78                        |             | 30-150                         | A             |

**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17

| <b>Parameter</b>  | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> | <b>Column</b> |
|---|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|---------------|
| Chlorinated Herbicides by GC - Westborough Lab Associated sample(s): 01-02 Batch: WG1044654-2 WG1044654-3 |                          |             |                           |             |                             |            |             |                       |               |
| 2,4-D   | 61                       |             | 64                        |             | 30-150                      | 5          |             | 30                    | A             |
| 2,4,5-T   | 61                       |             | 65                        |             | 30-150                      | 6          |             | 30                    | A             |
| 2,4,5-TP (Silvex)   | 57                       |             | 60                        |             | 30-150                      | 5          |             | 30                    | A             |

| <b>Surrogate</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> | <b>Column</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|---------------|
| DCAA             | 79                       |             | 82                        |             | 30-150                         | A             |
| DCAA             | 77                       |             | 80                        |             | 30-150                         | B             |

## METALS

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-01

Date Collected: 09/19/17 09:30

Client ID: MW-3 (18-20')

Date Received: 09/19/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 87%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 1700   |           | mg/kg | 8.88  | 2.40  | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Antimony, Total              | ND     |           | mg/kg | 4.44  | 0.337 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Arsenic, Total               | 0.622  | J         | mg/kg | 0.888 | 0.185 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Barium, Total                | 14.9   |           | mg/kg | 0.888 | 0.154 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Beryllium, Total             | 0.036  | J         | mg/kg | 0.444 | 0.029 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Cadmium, Total               | 0.400  | J         | mg/kg | 0.888 | 0.087 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Calcium, Total               | 47500  |           | mg/kg | 8.88  | 3.11  | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Chromium, Total              | 4.01   |           | mg/kg | 0.888 | 0.085 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Cobalt, Total                | 1.86   |           | mg/kg | 1.78  | 0.147 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Copper, Total                | 5.29   |           | mg/kg | 0.888 | 0.229 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Iron, Total                  | 5440   |           | mg/kg | 4.44  | 0.802 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Lead, Total                  | 6.94   |           | mg/kg | 4.44  | 0.238 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Magnesium, Total             | 21800  |           | mg/kg | 8.88  | 1.37  | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Manganese, Total             | 222    |           | mg/kg | 0.888 | 0.141 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Mercury, Total               | ND     |           | mg/kg | 0.07  | 0.02  | 1               | 09/21/17 08:00 | 09/21/17 17:56 | EPA 7471B   | 1,7471B           | EA      |
| Nickel, Total                | 3.50   |           | mg/kg | 2.22  | 0.215 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Potassium, Total             | 305    |           | mg/kg | 222   | 12.8  | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Selenium, Total              | 0.373  | J         | mg/kg | 1.78  | 0.229 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Silver, Total                | ND     |           | mg/kg | 0.888 | 0.251 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Sodium, Total                | 108    | J         | mg/kg | 178   | 2.80  | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Thallium, Total              | ND     |           | mg/kg | 1.78  | 0.280 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Vanadium, Total              | 7.39   |           | mg/kg | 0.888 | 0.180 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |
| Zinc, Total                  | 56.4   |           | mg/kg | 4.44  | 0.260 | 2               | 09/20/17 19:37 | 09/26/17 01:01 | EPA 3050B   | 1,6010C           | AB      |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**SAMPLE RESULTS**

Lab ID: L1733355-02

Date Collected: 09/19/17 10:00

Client ID: BD

Date Received: 09/19/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Matrix: Soil

Percent Solids: 87%

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 2260   |           | mg/kg | 8.89  | 2.40  | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Antimony, Total              | ND     |           | mg/kg | 4.45  | 0.338 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Arsenic, Total               | 0.969  |           | mg/kg | 0.889 | 0.185 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Barium, Total                | 21.9   |           | mg/kg | 0.889 | 0.155 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Beryllium, Total             | 0.053  | J         | mg/kg | 0.445 | 0.029 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Cadmium, Total               | 0.427  | J         | mg/kg | 0.889 | 0.087 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Calcium, Total               | 47300  |           | mg/kg | 8.89  | 3.11  | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Chromium, Total              | 4.10   |           | mg/kg | 0.889 | 0.085 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Cobalt, Total                | 2.36   |           | mg/kg | 1.78  | 0.148 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Copper, Total                | 7.12   |           | mg/kg | 0.889 | 0.229 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Iron, Total                  | 6300   |           | mg/kg | 4.45  | 0.803 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Lead, Total                  | 6.66   |           | mg/kg | 4.45  | 0.238 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Magnesium, Total             | 20900  |           | mg/kg | 8.89  | 1.37  | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Manganese, Total             | 229    |           | mg/kg | 0.889 | 0.141 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Mercury, Total               | ND     |           | mg/kg | 0.07  | 0.02  | 1               | 09/21/17 08:00 | 09/21/17 17:58 | EPA 7471B   | 1,7471B           | EA      |
| Nickel, Total                | 4.76   |           | mg/kg | 2.22  | 0.215 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Potassium, Total             | 402    |           | mg/kg | 222   | 12.8  | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Selenium, Total              | ND     |           | mg/kg | 1.78  | 0.229 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Silver, Total                | ND     |           | mg/kg | 0.889 | 0.252 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Sodium, Total                | 108    | J         | mg/kg | 178   | 2.80  | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Thallium, Total              | ND     |           | mg/kg | 1.78  | 0.280 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Vanadium, Total              | 7.97   |           | mg/kg | 0.889 | 0.180 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |
| Zinc, Total                  | 50.0   |           | mg/kg | 4.45  | 0.260 | 2               | 09/20/17 19:37 | 09/26/17 01:05 | EPA 3050B   | 1,6010C           | AB      |





Project Name: MAIN &amp; EAST BALCOM STREET SITE

Lab Number: L1733355

Project Number: B0239-016-001-004

Report Date: 09/26/17

## Method Blank Analysis Batch Quality Control

| Parameter  | Result | Qualifier | Units | RL    | MDL   | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|--|--------|-----------|-------|-------|-------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01-02 Batch: WG1043819-1 |        |           |       |       |       |                    |                  |                  |                      |         |
| Aluminum, Total  | ND     |           | mg/kg | 4.00  | 1.08  | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Antimony, Total  | ND     |           | mg/kg | 2.00  | 0.152 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Arsenic, Total   | ND     |           | mg/kg | 0.400 | 0.083 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Barium, Total  | ND     |           | mg/kg | 0.400 | 0.070 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Beryllium, Total   | ND     |           | mg/kg | 0.200 | 0.013 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Cadmium, Total   | ND     |           | mg/kg | 0.400 | 0.039 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Calcium, Total   | ND     |           | mg/kg | 4.00  | 1.40  | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Chromium, Total  | ND     |           | mg/kg | 0.400 | 0.038 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Cobalt, Total  | ND     |           | mg/kg | 0.800 | 0.066 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Copper, Total  | ND     |           | mg/kg | 0.400 | 0.103 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Iron, Total  | ND     |           | mg/kg | 2.00  | 0.361 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Lead, Total  | ND     |           | mg/kg | 2.00  | 0.107 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Magnesium, Total   | ND     |           | mg/kg | 4.00  | 0.616 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Manganese, Total   | ND     |           | mg/kg | 0.400 | 0.064 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Nickel, Total  | ND     |           | mg/kg | 1.00  | 0.097 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Potassium, Total   | ND     |           | mg/kg | 100   | 5.76  | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Selenium, Total  | ND     |           | mg/kg | 0.800 | 0.103 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Silver, Total  | ND     |           | mg/kg | 0.400 | 0.113 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Sodium, Total  | ND     |           | mg/kg | 80.0  | 1.26  | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Thallium, Total  | ND     |           | mg/kg | 0.800 | 0.126 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Vanadium, Total  | ND     |           | mg/kg | 0.400 | 0.081 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |
| Zinc, Total  | ND     |           | mg/kg | 2.00  | 0.117 | 1                  | 09/20/17 19:37   | 09/25/17 19:50   | 1,6010C              | AB      |

### Prep Information

Digestion Method: EPA 3050B

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|--|--------|-----------|-------|------|------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01-02 Batch: WG1043939-1 |        |           |       |      |      |                    |                  |                  |                      |         |
| Mercury, Total   | ND     |           | mg/kg | 0.08 | 0.02 | 1                  | 09/21/17 08:00   | 09/21/17 17:27   | 1,7471B              | EA      |



**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1733355

**Project Number:** B0239-016-001-004

**Report Date:** 09/26/17

## **Method Blank Analysis Batch Quality Control**

### **Prep Information**

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Digestion Method: EPA 7471B

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Project Number:** B0239-016-001-004

**Lab Number:** L1733355

**Report Date:** 09/26/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1043819-2 SRM Lot Number: D093-540 |                  |      |                   |      |                     |     |      |            |
| Aluminum, Total  | 63               |      | -                 |      | 55-146              | -   |      |            |
| Antimony, Total  | 126              |      | -                 |      | 2-204               | -   |      |            |
| Arsenic, Total   | 89               |      | -                 |      | 70-130              | -   |      |            |
| Barium, Total  | 87               |      | -                 |      | 83-117              | -   |      |            |
| Beryllium, Total   | 92               |      | -                 |      | 83-117              | -   |      |            |
| Cadmium, Total   | 93               |      | -                 |      | 83-117              | -   |      |            |
| Calcium, Total   | 84               |      | -                 |      | 83-117              | -   |      |            |
| Chromium, Total  | 85               |      | -                 |      | 80-120              | -   |      |            |
| Cobalt, Total  | 88               |      | -                 |      | 84-116              | -   |      |            |
| Copper, Total  | 89               |      | -                 |      | 82-118              | -   |      |            |
| Iron, Total  | 77               |      | -                 |      | 47-153              | -   |      |            |
| Lead, Total  | 84               |      | -                 |      | 82-117              | -   |      |            |
| Magnesium, Total   | 77               |      | -                 |      | 77-124              | -   |      |            |
| Manganese, Total   | 81               |      | -                 |      | 81-119              | -   |      |            |
| Nickel, Total  | 88               |      | -                 |      | 83-117              | -   |      |            |
| Potassium, Total   | 77               |      | -                 |      | 71-129              | -   |      |            |
| Selenium, Total  | 90               |      | -                 |      | 78-122              | -   |      |            |
| Silver, Total  | 90               |      | -                 |      | 76-124              | -   |      |            |
| Sodium, Total  | 95               |      | -                 |      | 72-128              | -   |      |            |
| Thallium, Total  | 93               |      | -                 |      | 79-121              | -   |      |            |
| Vanadium, Total  | 84               |      | -                 |      | 78-122              | -   |      |            |

**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & EAST BALCOM STREET SITE**Project Number:** B0239-016-001-004**Lab Number:** L1733355**Report Date:** 09/26/17

| Parameter  | LCS<br>%Recovery | LCSD<br>%Recovery | %Recovery<br>Limits | RPD | RPD Limits |
|--|------------------|-------------------|---------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1043819-2 SRM Lot Number: D093-540 |                  |                   |                     |     |            |
| Zinc, Total  | 85               | -                 | 83-117              | -   |            |
| Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1043939-2 SRM Lot Number: D093-540 |                  |                   |                     |     |            |
| Mercury, Total   | 94               | -                 | 72-128              | -   |            |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

| Parameter  | Native Sample | MS Added | MS Found                 | MS %Recovery | Qual | MSD Found              | MSD %Recovery | Qual | Recovery Limits      | RPD | Qual | RPD Limits |
|--|---------------|----------|--------------------------|--------------|------|------------------------|---------------|------|----------------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 |               |          | QC Batch ID: WG1043819-3 |              |      | QC Sample: L1733304-01 |               |      | Client ID: MS Sample |     |      |            |
| Aluminum, Total  | 6900          | 189      | 8750                     | 980          | Q    | -                      | -             |      | 75-125               | -   |      | 20         |
| Antimony, Total  | ND            | 47.2     | 32.1                     | 68           | Q    | -                      | -             |      | 75-125               | -   |      | 20         |
| Arsenic, Total   | 3.91          | 11.3     | 14.8                     | 96           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Barium, Total  | 12.5          | 189      | 182                      | 90           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Beryllium, Total   | 0.197J        | 4.72     | 4.46                     | 94           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Cadmium, Total   | 0.487J        | 4.81     | 4.80                     | 100          |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Calcium, Total   | 177.          | 944      | 1030                     | 90           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Chromium, Total  | 10.3          | 18.9     | 27.6                     | 92           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Cobalt, Total  | 3.60          | 47.2     | 42.3                     | 82           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Copper, Total  | 6.63          | 23.6     | 28.3                     | 92           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Iron, Total  | 12400         | 94.4     | 14500                    | 2220         | Q    | -                      | -             |      | 75-125               | -   |      | 20         |
| Lead, Total  | 6.77          | 48.1     | 48.3                     | 86           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Magnesium, Total   | 1460          | 944      | 2500                     | 110          |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Manganese, Total   | 56.0          | 47.2     | 104                      | 102          |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Nickel, Total  | 7.84          | 47.2     | 47.1                     | 83           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Potassium, Total   | 235.          | 944      | 1160                     | 98           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Selenium, Total  | ND            | 11.3     | 7.95                     | 70           | Q    | -                      | -             |      | 75-125               | -   |      | 20         |
| Silver, Total  | ND            | 28.3     | 26.5                     | 94           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Sodium, Total  | 94.1J         | 944      | 974                      | 103          |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Thallium, Total  | ND            | 11.3     | 9.53                     | 84           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Vanadium, Total  | 12.8          | 47.2     | 58.7                     | 97           |      | -                      | -             |      | 75-125               | -   |      | 20         |

# **Matrix Spike Analysis** Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

| Parameter  | Native Sample | MS Added | MS Found                 | MS %Recovery | MSD Found              | MSD %Recovery | Recovery Limits      | RPD | RPD Limits |
|--|---------------|----------|--------------------------|--------------|------------------------|---------------|----------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 |               |          | QC Batch ID: WG1043819-3 |              | QC Sample: L1733304-01 |               | Client ID: MS Sample |     |            |
| Zinc, Total  | 22.1          | 47.2     | 65.5                     | 92           | -                      | -             | 75-125               | -   | 20         |
| Total Metals - Mansfield Lab Associated sample(s): 01-02 |               |          | QC Batch ID: WG1043939-3 |              | QC Sample: L1733239-01 |               | Client ID: MS Sample |     |            |
| Mercury, Total   | 0.02J         | 0.161    | 0.18                     | 112          | -                      | -             | 80-120               | -   | 20         |

# **Lab Duplicate Analysis** Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Project Number:** B0239-016-001-00

**Lab Number:** L1733355

**Report Date:** 09/26/17

| Parameter  | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|--|---------------|------------------|-------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 QC Batch ID: WG1043819-4 QC Sample: L1733304-01 Client ID: DUP Sample |               |                  |       |     |      |            |
| Aluminum, Total  | 6900          | 6750             | mg/kg | 2   |      | 20         |
| Antimony, Total  | ND            | ND               | mg/kg | NC  |      | 20         |
| Arsenic, Total   | 3.91          | 4.32             | mg/kg | 10  |      | 20         |
| Barium, Total  | 12.5          | 13.8             | mg/kg | 10  |      | 20         |
| Beryllium, Total   | 0.197J        | 0.223J           | mg/kg | NC  |      | 20         |
| Cadmium, Total   | 0.487J        | 0.538J           | mg/kg | NC  |      | 20         |
| Calcium, Total   | 177.          | 173              | mg/kg | 2   |      | 20         |
| Chromium, Total  | 10.3          | 12.4             | mg/kg | 19  |      | 20         |
| Cobalt, Total  | 3.60          | 3.79             | mg/kg | 5   |      | 20         |
| Copper, Total  | 6.63          | 7.38             | mg/kg | 11  |      | 20         |
| Iron, Total  | 12400         | 13100            | mg/kg | 5   |      | 20         |
| Lead, Total  | 6.77          | 6.88             | mg/kg | 2   |      | 20         |
| Magnesium, Total   | 1460          | 1410             | mg/kg | 3   |      | 20         |
| Manganese, Total   | 56.0          | 53.8             | mg/kg | 4   |      | 20         |
| Nickel, Total  | 7.84          | 8.51             | mg/kg | 8   |      | 20         |
| Potassium, Total   | 235.          | 241              | mg/kg | 3   |      | 20         |
| Selenium, Total  | ND            | ND               | mg/kg | NC  |      | 20         |
| Silver, Total  | ND            | ND               | mg/kg | NC  |      | 20         |
| Sodium, Total  | 94.1J         | 85.3J            | mg/kg | NC  |      | 20         |

Project Name: MAIN &amp; EAST BALCOM STREET SITE

Project Number: B0239-016-001-00

# Lab Duplicate Analysis

Batch Quality Control

Lab Number: L1733355

Report Date: 09/26/17

| Parameter  | Native Sample | Duplicate Sample | Units | RPD | RPD Limits |
|--|---------------|------------------|-------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 QC Batch ID: WG1043819-4 QC Sample: L1733304-01 Client ID: DUP Sample |               |                  |       |     |            |
| Thallium, Total  | ND            | ND               | mg/kg | NC  | 20         |
| Vanadium, Total  | 12.8          | 14.9             | mg/kg | 15  | 20         |
| Zinc, Total  | 22.1          | 22.7             | mg/kg | 3   | 20         |
| Total Metals - Mansfield Lab Associated sample(s): 01-02 QC Batch ID: WG1043939-4 QC Sample: L1733239-01 Client ID: DUP Sample |               |                  |       |     |            |
| Mercury, Total   | 0.02J         | 0.02J            | mg/kg | NC  | 20         |



# **INORGANICS & MISCELLANEOUS**

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

**SAMPLE RESULTS**

**Lab ID:** L1733355-01  
**Client ID:** MW-3 (18-20')  
**Sample Location:** BUFFALO, NY  
**Matrix:** Soil

**Date Collected:** 09/19/17 09:30  
**Date Received:** 09/19/17  
**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 86.7   |           | %     | 0.100 | NA  | 1                  | -                | 09/20/17 18:03   | 121,2540G            | RI      |



**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

**SAMPLE RESULTS**

**Lab ID:** L1733355-02  
**Client ID:** BD  
**Sample Location:** BUFFALO, NY  
**Matrix:** Soil

**Date Collected:** 09/19/17 10:00  
**Date Received:** 09/19/17  
**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 87.3   |           | %     | 0.100 | NA  | 1                  | -                | 09/20/17 18:03   | 121,2540G            | RI      |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Project Number:** B0239-016-001-00**Lab Duplicate Analysis****Batch Quality Control****Lab Number:** L1733355**Report Date:** 09/26/17

| Parameter   | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|---|---------------|------------------|-------|-----|------|------------|
| General Chemistry - Westborough Lab Associated sample(s): 01-02 QC Batch ID: WG1043762-1 QC Sample: L1733306-02 Client ID: DUP Sample |               |                  |       |     |      |            |
| Solids, Total   | 78.4          | 77.3             | %     | 1   |      | 20         |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information**

|               |                     |
|---------------|---------------------|
| <b>Cooler</b> | <b>Custody Seal</b> |
| A             | Absent              |

**Container Information**

| Container ID | Container Type                         | Cooler | Initial pH | Final pH | Temp deg C | Pres | Seal   | Frozen Date/Time | Analysis(*)  |
|--------------|--|--------|------------|----------|------------|------|--------|------------------|--|
| L1733355-01A | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW(14)  |
| L1733355-01B | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW(14)  |
| L1733355-01C | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW(14)  |
| L1733355-01D | Plastic 2oz unpreserved for TS         | A      | NA         |          | 5.5        | Y    | Absent |                  | TS(7)  |
| L1733355-01E | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |
| L1733355-01F | Glass 60mL/2oz unpreserved             | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),HERB-APA(14),NYTCL-8081(14),NYTCL-8082(14)  |
| L1733355-01G | Glass 120ml/4oz unpreserved            | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),HERB-APA(14),NYTCL-8081(14),NYTCL-8082(14)  |
| L1733355-01H | Glass 250ml/8oz unpreserved            | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),HERB-APA(14),NYTCL-8081(14),NYTCL-8082(14)  |
| L1733355-01X | Vial MeOH preserved split              | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW(14)  |
| L1733355-01Y | Vial Water preserved split             | A      | NA         |          | 5.5        | Y    | Absent | 20-SEP-17 10:25  | NYTCL-8260HLW(14)  |
| L1733355-01Z | Vial Water preserved split             | A      | NA         |          | 5.5        | Y    | Absent | 20-SEP-17 10:25  | NYTCL-8260HLW(14)  |
| L1733355-02A | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW(14)  |
| L1733355-02B | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW(14)  |
| L1733355-02C | 5 gram Encore Sampler                  | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8260HLW(14)  |
| L1733355-02D | Plastic 2oz unpreserved for TS         | A      | NA         |          | 5.5        | Y    | Absent |                  | TS(7)  |
| L1733355-02E | Metals Only-Glass 60mL/2oz unpreserved | A      | NA         |          | 5.5        | Y    | Absent |                  | BE-Ti(180),AS-Ti(180),BA-Ti(180),AG-Ti(180),AL-Ti(180),CR-Ti(180),NI-Ti(180),TL-Ti(180),CU-Ti(180),PB-Ti(180),SB-Ti(180),SE-Ti(180),ZN-Ti(180),CO-Ti(180),V-Ti(180),FE-Ti(180),HG-T(28),MG-Ti(180),MN-Ti(180),CA-Ti(180),CD-Ti(180),K-Ti(180),NA-Ti(180) |
| L1733355-02F | Glass 60mL/2oz unpreserved             | A      | NA         |          | 5.5        | Y    | Absent |                  | NYTCL-8270(14),HERB-APA(14),NYTCL-8081(14),NYTCL-8082(14)  |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1733355**Project Number:** B0239-016-001-004**Report Date:** 09/26/17**Container Information**

| <b>Container ID</b> | <b>Container Type</b>       | <b>Cooler</b> | <b>Initial pH</b> | <b>Final pH</b> | <b>Temp deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen Date/Time</b> | <b>Analysis(*)</b>  |
|---------------------|-----------------------------|---------------|-------------------|-----------------|-------------------|-------------|-------------|-------------------------|---|
| L1733355-02G        | Glass 120ml/4oz unpreserved | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8270(14),HERB-APA(14),NYTCL-8081(14),NYTCL-8082(14) |
| L1733355-02H        | Glass 250ml/8oz unpreserved | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8270(14),HERB-APA(14),NYTCL-8081(14),NYTCL-8082(14) |
| L1733355-02X        | Vial MeOH preserved split   | A             | NA                |                 | 5.5               | Y           | Absent      |                         | NYTCL-8260HLW(14)   |
| L1733355-02Y        | Vial Water preserved split  | A             | NA                |                 | 5.5               | Y           | Absent      | 20-SEP-17 10:25         | NYTCL-8260HLW(14)   |
| L1733355-02Z        | Vial Water preserved split  | A             | NA                |                 | 5.5               | Y           | Absent      | 20-SEP-17 10:25         | NYTCL-8260HLW(14)   |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers



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#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers





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## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



**Alpha Analytical, Inc.**

ID No.:17873

Facility: **Company-wide**

Revision 10

Department: **Quality Assurance**

Published Date: 1/16/2017 11:00:05 AM

Title: **Certificate/Approval Program Summary**

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## Certification Information

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The following analytes are not included in our Primary NELAP Scope of Accreditation:

**Westborough Facility****EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** NPW and SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**EPA 9012B:** NPW: Total Cyanide**EPA 9050A:** NPW: Specific Conductance**SM3500:** NPW: Ferrous Iron**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.**SM5310C:** DW: Dissolved Organic Carbon**Mansfield Facility****SM 2540D:** TSS**EPA 3005A** NPW**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.**Biological Tissue Matrix:** EPA 3050B


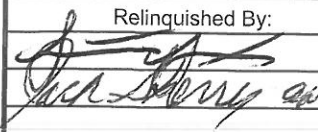
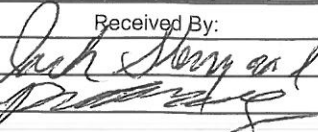
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The following analytes are included in our Massachusetts DEP Scope of Accreditation

**Westborough Facility:****Drinking Water****EPA 300.0:** Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE, EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH, EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E.****Mansfield Facility:****Drinking Water****EPA 200.7:** Ba, Be, Cd, Cr, Cu, Ni, Na, Ca. **EPA 200.8:** Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Ni, Se, TL. **EPA 245.1 Hg.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**


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For a complete listing of analytes and methods, please contact your Alpha Project Manager.

| <br><b>NEW YORK CHAIN OF CUSTODY</b>   |               | <b>Service Centers</b><br>Mahwah, NJ 07430: 35 Whitney Rd, Suite 4<br>Albany, NY 12205: 14 Walker Way<br>Tonawanda, NY 14150: 275 Cooper Ave, Suite 105  |           | Page<br><div style="border: 1px solid black; padding: 2px; display: inline-block;">1 of 1</div>  |     | Date Rec'd in Lab<br><div style="font-size: 1.5em; margin-left: 100px;">9/20/17</div>   |                    | ALPHA Job #<br><div style="font-size: 1.5em; margin-left: 100px;">L 1733355</div>  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
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|  |               | <b>Westborough, MA 01581</b><br>8 Walkup Dr.<br>TEL: 508-898-9220<br>FAX: 508-898-9193   |           | <b>Mansfield, MA 02048</b><br>320 Forbes Blvd<br>TEL: 508-822-9300<br>FAX: 508-822-3288  |     |   |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| <b>Client Information</b><br>Client: <u>TU/NO3 ENV Restoration</u><br>Address: <u>2558 Hambury Trce</u><br><u>Buffalo, NY, 14214</u><br>Phone: <u>716-713-3937</u><br>Fax:<br>Email: <u>Nmuniey@Tu-no3.com</u>   |               | <b>Project Information</b><br>Project Name: <u>MAIN: East Balloum Street SNE</u><br>Project Location: <u>Buffalo, NY</u><br>Project # <u>B0339-016-001-004-002</u><br>(Use Project name as Project #) <input type="checkbox"/> |           | <b>Deliverables</b><br><input type="checkbox"/> ASP-A <input checked="" type="checkbox"/> ASP-B<br><input type="checkbox"/> EQUIS (1 File) <input type="checkbox"/> EQUIS (4 File)<br><input type="checkbox"/> Other   |     | <b>Billing Information</b><br><input type="checkbox"/> Same as Client Info<br>PO #  |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |               | Project Manager: <u>Nate Muniey</u><br>ALPHAQuote #:<br>Turn-Around Time<br>Standard <input checked="" type="checkbox"/> Due Date:<br>Rush (only if pre approved) <input type="checkbox"/> # of Days:                          |           | <b>Regulatory Requirement</b><br><input type="checkbox"/> NY TOGS <input type="checkbox"/> NY Part 375<br><input type="checkbox"/> AWQ Standards <input type="checkbox"/> NY CP-51<br><input type="checkbox"/> NY Restricted Use <input type="checkbox"/> Other<br><input type="checkbox"/> NY Unrestricted Use<br><input type="checkbox"/> NYC Sewer Discharge  |     | <b>Disposal Site Information</b><br>Please identify below location of applicable disposal facilities.<br>Disposal Facility:<br><input type="checkbox"/> NJ <input type="checkbox"/> NY<br><input type="checkbox"/> Other: |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| These samples have been previously analyzed by Alpha <input type="checkbox"/><br>Other project specific requirements/comments:<br><div style="font-size: 1.5em; margin-top: 10px;">Category B</div> Please specify Metals or TAL.  |               |  |           | <b>ANALYSIS</b><br><div style="display: flex; justify-content: space-between;"> <div style="writing-mode: vertical-rl; transform: rotate(180deg);">IC/CS/IS/IS</div> <div style="writing-mode: vertical-rl; transform: rotate(180deg);">TU/SU/CS</div> <div style="writing-mode: vertical-rl; transform: rotate(180deg);">TAL Metals</div> <div style="writing-mode: vertical-rl; transform: rotate(180deg);">PCB's</div> <div style="writing-mode: vertical-rl; transform: rotate(180deg);">Herb</div> <div style="writing-mode: vertical-rl; transform: rotate(180deg);">Pest</div> </div> |     | <b>Sample Filtration</b><br><input type="checkbox"/> Done<br><input type="checkbox"/> Lab to do<br><b>Preservation</b><br><input type="checkbox"/> Lab to do<br>(Please Specify below)                                    |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| <table border="1" style="width:100%; border-collapse: collapse;"> <thead> <tr> <th rowspan="2">ALPHA Lab ID<br/>(Lab Use Only)</th> <th rowspan="2">Sample ID</th> <th colspan="2">Collection</th> <th rowspan="2">Sample Matrix</th> <th rowspan="2">Sampler's Initials</th> <th colspan="6"></th> <th rowspan="2">Sample Specific Comments</th> <th rowspan="2">Total Bottle</th> </tr> <tr> <th>Date</th> <th>Time</th> <th colspan="6"></th> </tr> </thead> <tbody> <tr> <td>3355-01</td> <td>MW-3 (16-20')</td> <td>9/19/17</td> <td>9:30</td> <td>Soil</td> <td>NAS</td> <td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td>X</td> <td></td> <td>9</td> </tr> <tr> <td>02</td> <td>BD</td> <td>9/19/17</td> <td>10:00</td> <td>Soil</td> <td>NAS</td> <td>X</td><td>X</td><td>X</td><td>X</td><td>X</td><td>X</td> <td></td> <td>9</td> </tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> </tbody> </table> |               | ALPHA Lab ID<br>(Lab Use Only)   | Sample ID | Collection   |     | Sample Matrix   | Sampler's Initials |  |                    |   |   |  |   | Sample Specific Comments | Total Bottle | Date                     | Time         |  |  |  |  |  |  | 3355-01 | MW-3 (16-20') | 9/19/17 | 9:30 | Soil | NAS | X | X | X | X | X | X |  | 9 | 02 | BD | 9/19/17 | 10:00 | Soil | NAS | X | X | X | X | X | X |  | 9 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| ALPHA Lab ID<br>(Lab Use Only)   | Sample ID     |  |           | Collection   |     |   |                    | Sample Matrix  | Sampler's Initials |   |   |  |   |                          |              | Sample Specific Comments | Total Bottle |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |               | Date   | Time      |  |     |   |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 3355-01  | MW-3 (16-20') | 9/19/17  | 9:30      | Soil   | NAS | X   | X                  | X  | X                  | X | X |  | 9 |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 02   | BD            | 9/19/17  | 10:00     | Soil   | NAS | X   | X                  | X  | X                  | X | X |  | 9 |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
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|  |               |  |           |  |     |   |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
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|  |               |  |           |  |     |   |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |               |  |           |  |     |   |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |               |  |           |  |     |   |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |               |  |           |  |     |   |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |               |  |           |  |     |   |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |               |  |           |  |     |   |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |               |  |           |  |     |   |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |               |  |           |  |     |   |                    |  |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Preservative Code:<br>A = None<br>B = HCl<br>C = HNO <sub>3</sub><br>D = H <sub>2</sub> SO <sub>4</sub><br>E = NaOH<br>F = MeOH<br>G = NaHSO <sub>4</sub><br>H = Na <sub>2</sub> S <sub>2</sub> O <sub>3</sub><br>K/E = Zn Ac/NaOH<br>O = Other  |               | Container Code<br>P = Plastic<br>A = Amber Glass<br>V = Vial<br>G = Glass<br>B = Bacteria Cup<br>C = Cube<br>O = Other<br>E = Encore<br>D = BOD Bottle   |           | Westboro: Certification No: MA935<br>Mansfield: Certification No: MA015  |     | Container Type<br><div style="font-size: 1.5em;">E A A A A A</div>  |                    | Preservative<br><div style="font-size: 1.5em;">O O O O O O</div>   |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Relinquished By:<br>  |               | Date/Time<br><div style="font-size: 1.2em;">9/19/17 10:00</div>  |           | Received By:<br>  |     | Date/Time<br><div style="font-size: 1.2em;">9/19/17 16:52</div>   |                    | Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.) |                    |   |   |  |   |                          |              |                          |              |  |  |  |  |  |  |         |               |         |      |      |     |   |   |   |   |   |   |  |   |    |    |         |       |      |     |   |   |   |   |   |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |



## ANALYTICAL REPORT

|                 |   |
|-----------------|---|
| Lab Number:     | L1738416  |
| Client:         | Turnkey Environmental Restoration, LLC<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley   |
| Phone:          | (716) 856-0599  |
| Project Name:   | MAIN & E. BALCOM  |
| Project Number: | T0234-016-001   |
| Report Date:    | 10/30/17  |

The original project report/data package is held by Alpha Analytical. This report/data package is paginated and should be reproduced only in its entirety. Alpha Analytical holds no responsibility for results and/or data that are not consistent with the original.

Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1738416-01                | MW-1             | WATER         | BUFFALO, NY                | 10/23/17 12:30                  | 10/23/17            |
| L1738416-02                | MW-2             | WATER         | BUFFALO, NY                | 10/23/17 13:30                  | 10/23/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

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**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

**Case Narrative (continued)**

Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:



Kara Soroko

Title: Technical Director/Representative

Date: 10/30/17

# ORGANICS



# **VOLATILES**

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS**

Lab ID: L1738416-01  
 Client ID: MW-1  
 Sample Location: BUFFALO, NY

Date Collected: 10/23/17 12:30  
 Date Received: 10/23/17  
 Field Prep: Not Specified

Matrix: Water  
 Analytical Method: 1,8260C  
 Analytical Date: 10/26/17 11:34  
 Analyst: PD

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethane                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloroform                                   | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Carbon tetrachloride                         | ND     |           | ug/l  | 0.50 | 0.13 | 1               |
| 1,2-Dichloropropane                          | ND     |           | ug/l  | 1.0  | 0.14 | 1               |
| Dibromochloromethane                         | ND     |           | ug/l  | 0.50 | 0.15 | 1               |
| 1,1,2-Trichloroethane                        | ND     |           | ug/l  | 1.5  | 0.50 | 1               |
| Tetrachloroethene                            | ND     |           | ug/l  | 0.50 | 0.18 | 1               |
| Chlorobenzene                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichlorofluoromethane                       | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,2-Dichloroethane                           | ND     |           | ug/l  | 0.50 | 0.13 | 1               |
| 1,1,1-Trichloroethane                        | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromodichloromethane                         | ND     |           | ug/l  | 0.50 | 0.19 | 1               |
| trans-1,3-Dichloropropene                    | ND     |           | ug/l  | 0.50 | 0.16 | 1               |
| cis-1,3-Dichloropropene                      | ND     |           | ug/l  | 0.50 | 0.14 | 1               |
| Bromoform                                    | ND     |           | ug/l  | 2.0  | 0.65 | 1               |
| 1,1,2,2-Tetrachloroethane                    | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| Benzene                                      | ND     |           | ug/l  | 0.50 | 0.16 | 1               |
| Toluene                                      | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Ethylbenzene                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloromethane                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromomethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Vinyl chloride                               | ND     |           | ug/l  | 1.0  | 0.07 | 1               |
| Chloroethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethene                           | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| trans-1,2-Dichloroethene                     | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichloroethene                              | ND     |           | ug/l  | 0.50 | 0.18 | 1               |
| 1,2-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,3-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,4-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS****Lab ID:** L1738416-01**Date Collected:** 10/23/17 12:30**Client ID:** MW-1**Date Received:** 10/23/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Methyl tert butyl ether                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p/m-Xylene                                   | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| o-Xylene                                     | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| cis-1,2-Dichloroethene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Styrene                                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Dichlorodifluoromethane                      | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Acetone                                      | 5.2    |           | ug/l  | 5.0 | 1.5  | 1               |
| Carbon disulfide                             | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Butanone                                   | ND     |           | ug/l  | 5.0 | 1.9  | 1               |
| 4-Methyl-2-pentanone                         | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Hexanone                                   | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Bromochloromethane                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromoethane                            | ND     |           | ug/l  | 2.0 | 0.65 | 1               |
| n-Butylbenzene                               | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromo-3-chloropropane                  | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Isopropylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| n-Propylbenzene                              | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,3-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl Acetate                               | ND     |           | ug/l  | 2.0 | 0.23 | 1               |
| Cyclohexane                                  | ND     |           | ug/l  | 10  | 0.27 | 1               |
| 1,4-Dioxane                                  | ND     |           | ug/l  | 250 | 61.  | 1               |
| Freon-113                                    | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl cyclohexane                           | ND     |           | ug/l  | 10  | 0.40 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 115        |           | 70-130              |
| Toluene-d8            | 98         |           | 70-130              |
| 4-Bromofluorobenzene  | 97         |           | 70-130              |
| Dibromofluoromethane  | 101        |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

## SAMPLE RESULTS

Lab ID: L1738416-02  
 Client ID: MW-2  
 Sample Location: BUFFALO, NY

Date Collected: 10/23/17 13:30  
 Date Received: 10/23/17  
 Field Prep: Not Specified

Matrix: Water  
 Analytical Method: 1,8260C  
 Analytical Date: 10/26/17 12:03  
 Analyst: PD

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethane                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloroform                                   | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Carbon tetrachloride                         | ND     |           | ug/l  | 0.50 | 0.13 | 1               |
| 1,2-Dichloropropane                          | ND     |           | ug/l  | 1.0  | 0.14 | 1               |
| Dibromochloromethane                         | ND     |           | ug/l  | 0.50 | 0.15 | 1               |
| 1,1,2-Trichloroethane                        | ND     |           | ug/l  | 1.5  | 0.50 | 1               |
| Tetrachloroethene                            | ND     |           | ug/l  | 0.50 | 0.18 | 1               |
| Chlorobenzene                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichlorofluoromethane                       | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,2-Dichloroethane                           | 0.14   | J         | ug/l  | 0.50 | 0.13 | 1               |
| 1,1,1-Trichloroethane                        | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromodichloromethane                         | ND     |           | ug/l  | 0.50 | 0.19 | 1               |
| trans-1,3-Dichloropropene                    | ND     |           | ug/l  | 0.50 | 0.16 | 1               |
| cis-1,3-Dichloropropene                      | ND     |           | ug/l  | 0.50 | 0.14 | 1               |
| Bromoform                                    | ND     |           | ug/l  | 2.0  | 0.65 | 1               |
| 1,1,2,2-Tetrachloroethane                    | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| Benzene                                      | 0.53   |           | ug/l  | 0.50 | 0.16 | 1               |
| Toluene                                      | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Ethylbenzene                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloromethane                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromomethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Vinyl chloride                               | ND     |           | ug/l  | 1.0  | 0.07 | 1               |
| Chloroethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethene                           | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| trans-1,2-Dichloroethene                     | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichloroethene                              | ND     |           | ug/l  | 0.50 | 0.18 | 1               |
| 1,2-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,3-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,4-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

## SAMPLE RESULTS

Lab ID: L1738416-02

Date Collected: 10/23/17 13:30

Client ID: MW-2

Date Received: 10/23/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Methyl tert butyl ether                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p/m-Xylene                                   | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| o-Xylene                                     | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| cis-1,2-Dichloroethene                       | 0.88   | J         | ug/l  | 2.5 | 0.70 | 1               |
| Styrene                                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Dichlorodifluoromethane                      | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Acetone                                      | 2.0    | J         | ug/l  | 5.0 | 1.5  | 1               |
| Carbon disulfide                             | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Butanone                                   | ND     |           | ug/l  | 5.0 | 1.9  | 1               |
| 4-Methyl-2-pentanone                         | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Hexanone                                   | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Bromochloromethane                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromoethane                            | ND     |           | ug/l  | 2.0 | 0.65 | 1               |
| n-Butylbenzene                               | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromo-3-chloropropane                  | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Isopropylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| n-Propylbenzene                              | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,3-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl Acetate                               | ND     |           | ug/l  | 2.0 | 0.23 | 1               |
| Cyclohexane                                  | ND     |           | ug/l  | 10  | 0.27 | 1               |
| 1,4-Dioxane                                  | ND     |           | ug/l  | 250 | 61.  | 1               |
| Freon-113                                    | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl cyclohexane                           | ND     |           | ug/l  | 10  | 0.40 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 113        |           | 70-130              |
| Toluene-d8            | 98         |           | 70-130              |
| 4-Bromofluorobenzene  | 97         |           | 70-130              |
| Dibromofluoromethane  | 100        |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C

Analytical Date: 10/26/17 08:16

Analyst: PD

| Parameter  | Result | Qualifier | Units | RL   | MDL  |
|--|--------|-----------|-------|------|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1056605-5 |        |           |       |      |      |
| Methylene chloride   | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,1-Dichloroethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| Chloroform   | ND     |           | ug/l  | 2.5  | 0.70 |
| Carbon tetrachloride   | ND     |           | ug/l  | 0.50 | 0.13 |
| 1,2-Dichloropropane  | ND     |           | ug/l  | 1.0  | 0.14 |
| Dibromochloromethane   | ND     |           | ug/l  | 0.50 | 0.15 |
| 1,1,2-Trichloroethane  | ND     |           | ug/l  | 1.5  | 0.50 |
| Tetrachloroethene  | ND     |           | ug/l  | 0.50 | 0.18 |
| Chlorobenzene  | ND     |           | ug/l  | 2.5  | 0.70 |
| Trichlorofluoromethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,2-Dichloroethane   | ND     |           | ug/l  | 0.50 | 0.13 |
| 1,1,1-Trichloroethane  | ND     |           | ug/l  | 2.5  | 0.70 |
| Bromodichloromethane   | ND     |           | ug/l  | 0.50 | 0.19 |
| trans-1,3-Dichloropropene  | ND     |           | ug/l  | 0.50 | 0.16 |
| cis-1,3-Dichloropropene  | ND     |           | ug/l  | 0.50 | 0.14 |
| Bromoform  | ND     |           | ug/l  | 2.0  | 0.65 |
| 1,1,2,2-Tetrachloroethane  | ND     |           | ug/l  | 0.50 | 0.17 |
| Benzene  | ND     |           | ug/l  | 0.50 | 0.16 |
| Toluene  | ND     |           | ug/l  | 2.5  | 0.70 |
| Ethylbenzene   | ND     |           | ug/l  | 2.5  | 0.70 |
| Chloromethane  | ND     |           | ug/l  | 2.5  | 0.70 |
| Bromomethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| Vinyl chloride   | ND     |           | ug/l  | 1.0  | 0.07 |
| Chloroethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,1-Dichloroethene   | ND     |           | ug/l  | 0.50 | 0.17 |
| trans-1,2-Dichloroethene   | ND     |           | ug/l  | 2.5  | 0.70 |
| Trichloroethene  | ND     |           | ug/l  | 0.50 | 0.18 |
| 1,2-Dichlorobenzene  | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,3-Dichlorobenzene  | ND     |           | ug/l  | 2.5  | 0.70 |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C

Analytical Date: 10/26/17 08:16

Analyst: PD

| Parameter  | Result | Qualifier | Units | RL  | MDL  |
|--|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1056605-5 |        |           |       |     |      |
| 1,4-Dichlorobenzene  | ND     |           | ug/l  | 2.5 | 0.70 |
| Methyl tert butyl ether  | ND     |           | ug/l  | 2.5 | 0.70 |
| p/m-Xylene   | ND     |           | ug/l  | 2.5 | 0.70 |
| o-Xylene   | ND     |           | ug/l  | 2.5 | 0.70 |
| cis-1,2-Dichloroethene   | ND     |           | ug/l  | 2.5 | 0.70 |
| Styrene  | ND     |           | ug/l  | 2.5 | 0.70 |
| Dichlorodifluoromethane  | ND     |           | ug/l  | 5.0 | 1.0  |
| Acetone  | ND     |           | ug/l  | 5.0 | 1.5  |
| Carbon disulfide   | ND     |           | ug/l  | 5.0 | 1.0  |
| 2-Butanone   | ND     |           | ug/l  | 5.0 | 1.9  |
| 4-Methyl-2-pentanone   | ND     |           | ug/l  | 5.0 | 1.0  |
| 2-Hexanone   | ND     |           | ug/l  | 5.0 | 1.0  |
| Bromochloromethane   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2-Dibromoethane  | ND     |           | ug/l  | 2.0 | 0.65 |
| n-Butylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| sec-Butylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2-Dibromo-3-chloropropane  | ND     |           | ug/l  | 2.5 | 0.70 |
| Isopropylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| p-Isopropyltoluene   | ND     |           | ug/l  | 2.5 | 0.70 |
| n-Propylbenzene  | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2,3-Trichlorobenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2,4-Trichlorobenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,3,5-Trimethylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2,4-Trimethylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| Methyl Acetate   | ND     |           | ug/l  | 2.0 | 0.23 |
| Cyclohexane  | ND     |           | ug/l  | 10  | 0.27 |
| 1,4-Dioxane  | ND     |           | ug/l  | 250 | 61.  |
| Freon-113  | ND     |           | ug/l  | 2.5 | 0.70 |
| Methyl cyclohexane   | ND     |           | ug/l  | 10  | 0.40 |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**Method Blank Analysis**  
**Batch Quality Control**

Analytical Method: 1,8260C

Analytical Date: 10/26/17 08:16

Analyst: PD

| Parameter  | Result | Qualifier | Units | RL | MDL |
|--|--------|-----------|-------|----|-----|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1056605-5 |        |           |       |    |     |

| Surrogate             | %Recovery | Qualifier | Acceptance<br>Criteria |
|-----------------------|-----------|-----------|------------------------|
| 1,2-Dichloroethane-d4 | 109       |           | 70-130                 |
| Toluene-d8            | 99        |           | 70-130                 |
| 4-Bromofluorobenzene  | 99        |           | 70-130                 |
| Dibromofluoromethane  | 99        |           | 70-130                 |



# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1738416

**Project Number:** T0234-016-001

**Report Date:** 10/30/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1056605-3 WG1056605-4 |                  |      |                   |      |                     |     |      |               |
| Methylene chloride  | 95               |      | 86                |      | 70-130              | 10  |      | 20            |
| 1,1-Dichloroethane  | 100              |      | 92                |      | 70-130              | 8   |      | 20            |
| Chloroform  | 100              |      | 93                |      | 70-130              | 7   |      | 20            |
| Carbon tetrachloride  | 94               |      | 87                |      | 63-132              | 8   |      | 20            |
| 1,2-Dichloropropane   | 110              |      | 97                |      | 70-130              | 13  |      | 20            |
| Dibromochloromethane  | 98               |      | 88                |      | 63-130              | 11  |      | 20            |
| 1,1,2-Trichloroethane   | 100              |      | 95                |      | 70-130              | 5   |      | 20            |
| Tetrachloroethene   | 97               |      | 88                |      | 70-130              | 10  |      | 20            |
| Chlorobenzene   | 100              |      | 92                |      | 75-130              | 8   |      | 20            |
| Trichlorofluoromethane  | 89               |      | 84                |      | 62-150              | 6   |      | 20            |
| 1,2-Dichloroethane  | 120              |      | 100               |      | 70-130              | 18  |      | 20            |
| 1,1,1-Trichloroethane   | 98               |      | 90                |      | 67-130              | 9   |      | 20            |
| Bromodichloromethane  | 100              |      | 95                |      | 67-130              | 5   |      | 20            |
| trans-1,3-Dichloropropene   | 100              |      | 88                |      | 70-130              | 13  |      | 20            |
| cis-1,3-Dichloropropene   | 100              |      | 94                |      | 70-130              | 6   |      | 20            |
| Bromoform   | 97               |      | 89                |      | 54-136              | 9   |      | 20            |
| 1,1,2,2-Tetrachloroethane   | 100              |      | 94                |      | 67-130              | 6   |      | 20            |
| Benzene   | 98               |      | 90                |      | 70-130              | 9   |      | 20            |
| Toluene   | 99               |      | 88                |      | 70-130              | 12  |      | 20            |
| Ethylbenzene  | 100              |      | 93                |      | 70-130              | 7   |      | 20            |
| Chloromethane   | 78               |      | 72                |      | 64-130              | 8   |      | 20            |
| Bromomethane  | 75               |      | 70                |      | 39-139              | 7   |      | 20            |
| Vinyl chloride  | 80               |      | 74                |      | 55-140              | 8   |      | 20            |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1738416

**Project Number:** T0234-016-001

**Report Date:** 10/30/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1056605-3 WG1056605-4 |                  |      |                   |      |                     |     |      |               |
| Chloroethane  | 97               |      | 90                |      | 55-138              | 7   |      | 20            |
| 1,1-Dichloroethene  | 88               |      | 83                |      | 61-145              | 6   |      | 20            |
| trans-1,2-Dichloroethene  | 93               |      | 86                |      | 70-130              | 8   |      | 20            |
| Trichloroethene   | 100              |      | 91                |      | 70-130              | 9   |      | 20            |
| 1,2-Dichlorobenzene   | 100              |      | 92                |      | 70-130              | 8   |      | 20            |
| 1,3-Dichlorobenzene   | 100              |      | 93                |      | 70-130              | 7   |      | 20            |
| 1,4-Dichlorobenzene   | 100              |      | 92                |      | 70-130              | 8   |      | 20            |
| Methyl tert butyl ether   | 100              |      | 92                |      | 63-130              | 8   |      | 20            |
| p/m-Xylene  | 105              |      | 95                |      | 70-130              | 10  |      | 20            |
| o-Xylene  | 110              |      | 95                |      | 70-130              | 15  |      | 20            |
| cis-1,2-Dichloroethene  | 96               |      | 88                |      | 70-130              | 9   |      | 20            |
| Styrene   | 105              |      | 95                |      | 70-130              | 10  |      | 20            |
| Dichlorodifluoromethane   | 67               |      | 62                |      | 36-147              | 8   |      | 20            |
| Acetone   | 100              |      | 89                |      | 58-148              | 12  |      | 20            |
| Carbon disulfide  | 80               |      | 74                |      | 51-130              | 8   |      | 20            |
| 2-Butanone  | 95               |      | 94                |      | 63-138              | 1   |      | 20            |
| 4-Methyl-2-pentanone  | 110              |      | 96                |      | 59-130              | 14  |      | 20            |
| 2-Hexanone  | 110              |      | 98                |      | 57-130              | 12  |      | 20            |
| Bromochloromethane  | 100              |      | 94                |      | 70-130              | 6   |      | 20            |
| 1,2-Dibromoethane   | 100              |      | 91                |      | 70-130              | 9   |      | 20            |
| n-Butylbenzene  | 110              |      | 97                |      | 53-136              | 13  |      | 20            |
| sec-Butylbenzene  | 100              |      | 94                |      | 70-130              | 6   |      | 20            |
| 1,2-Dibromo-3-chloropropane   | 94               |      | 84                |      | 41-144              | 11  |      | 20            |

## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1056605-3 WG1056605-4 |                  |      |                   |      |                     |     |      |               |
| Isopropylbenzene  | 100              |      | 92                |      | 70-130              | 8   |      | 20            |
| p-Isopropyltoluene  | 100              |      | 95                |      | 70-130              | 5   |      | 20            |
| n-Propylbenzene   | 110              |      | 96                |      | 69-130              | 14  |      | 20            |
| 1,2,3-Trichlorobenzene  | 110              |      | 100               |      | 70-130              | 10  |      | 20            |
| 1,2,4-Trichlorobenzene  | 100              |      | 94                |      | 70-130              | 6   |      | 20            |
| 1,3,5-Trimethylbenzene  | 100              |      | 92                |      | 64-130              | 8   |      | 20            |
| 1,2,4-Trimethylbenzene  | 100              |      | 93                |      | 70-130              | 7   |      | 20            |
| Methyl Acetate  | 110              |      | 99                |      | 70-130              | 11  |      | 20            |
| Cyclohexane   | 100              |      | 95                |      | 70-130              | 5   |      | 20            |
| 1,4-Dioxane   | 92               |      | 100               |      | 56-162              | 8   |      | 20            |
| Freon-113   | 92               |      | 85                |      | 70-130              | 8   |      | 20            |
| Methyl cyclohexane  | 100              |      | 93                |      | 70-130              | 7   |      | 20            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 110              |      | 116               |      | 70-130                 |
| Toluene-d8            | 99               |      | 99                |      | 70-130                 |
| 4-Bromofluorobenzene  | 97               |      | 98                |      | 70-130                 |
| Dibromofluoromethane  | 100              |      | 102               |      | 70-130                 |

# SEMIVOLATILES

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS**

Lab ID: L1738416-01  
 Client ID: MW-1  
 Sample Location: BUFFALO, NY

Date Collected: 10/23/17 12:30  
 Date Received: 10/23/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 10/26/17 00:56

Matrix: Water  
 Analytical Method: 1,8270D  
 Analytical Date: 10/28/17 22:45  
 Analyst: RC

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/l  | 2.0 | 0.67 | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/l  | 5.0 | 1.4  | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/l  | 5.0 | 0.84 | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/l  | 2.0 | 0.62 | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/l  | 2.0 | 0.73 | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/l  | 2.0 | 0.70 | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/l  | 20  | 7.8  | 1               |
| Isophorone                                       | ND     |           | ug/l  | 5.0 | 0.60 | 1               |
| Nitrobenzene                                     | ND     |           | ug/l  | 2.0 | 0.75 | 1               |
| NDPA/DPA   | ND     |           | ug/l  | 2.0 | 0.64 | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/l  | 5.0 | 0.70 | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/l  | 3.0 | 0.91 | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/l  | 5.0 | 1.3  | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/l  | 5.0 | 0.69 | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| Diethyl phthalate                                | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| Dimethyl phthalate                               | ND     |           | ug/l  | 5.0 | 0.65 | 1               |
| Biphenyl   | ND     |           | ug/l  | 2.0 | 0.76 | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.2  | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.3  | 1               |
| Dibenzofuran                                     | ND     |           | ug/l  | 2.0 | 0.66 | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/l  | 10  | 0.67 | 1               |
| Acetophenone                                     | ND     |           | ug/l  | 5.0 | 0.85 | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/l  | 5.0 | 0.68 | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/l  | 2.0 | 0.62 | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/l  | 2.0 | 0.63 | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS****Lab ID:** L1738416-01**Date Collected:** 10/23/17 12:30**Client ID:** MW-1**Date Received:** 10/23/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| 2,4-Dichlorophenol                               | ND     |           | ug/l  | 5.0 | 0.77 | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/l  | 5.0 | 1.6  | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/l  | 10  | 1.5  | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/l  | 10  | 1.8  | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/l  | 20  | 5.5  | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/l  | 10  | 2.1  | 1               |
| Phenol   | ND     |           | ug/l  | 5.0 | 1.9  | 1               |
| 3-Methylphenol/4-Methylphenol                    | 2.9    | J         | ug/l  | 5.0 | 1.1  | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/l  | 5.0 | 0.72 | 1               |
| Carbazole  | ND     |           | ug/l  | 2.0 | 0.63 | 1               |
| Atrazine   | ND     |           | ug/l  | 10  | 1.8  | 1               |
| Benzaldehyde                                     | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| Caprolactam                                      | ND     |           | ug/l  | 10  | 3.6  | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/l  | 5.0 | 0.93 | 1               |

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 56         |           | 21-120              |
| Phenol-d6            | 41         |           | 10-120              |
| Nitrobenzene-d5      | 75         |           | 23-120              |
| 2-Fluorobiphenyl     | 75         |           | 15-120              |
| 2,4,6-Tribromophenol | 83         |           | 10-120              |
| 4-Terphenyl-d14      | 80         |           | 41-149              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS**

Lab ID: L1738416-01  
 Client ID: MW-1  
 Sample Location: BUFFALO, NY

Date Collected: 10/23/17 12:30  
 Date Received: 10/23/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 10/29/17 16:56

Matrix: Water  
 Analytical Method: 1,8270D-SIM  
 Analytical Date: 10/30/17 12:15  
 Analyst: KL

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab |        |           |       |      |      |                 |
| Acenaphthene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| 2-Chloronaphthalene                                  | ND     |           | ug/l  | 0.20 | 0.04 | 1               |
| Fluoranthene   | 0.07   | J         | ug/l  | 0.10 | 0.04 | 1               |
| Hexachlorobutadiene                                  | ND     |           | ug/l  | 0.50 | 0.04 | 1               |
| Naphthalene  | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(a)anthracene                                   | ND     |           | ug/l  | 0.10 | 0.02 | 1               |
| Benzo(a)pyrene                                       | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(b)fluoranthene                                 | ND     |           | ug/l  | 0.10 | 0.02 | 1               |
| Benzo(k)fluoranthene                                 | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Chrysene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Acenaphthylene                                       | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Anthracene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(ghi)perylene                                   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Fluorene   | 0.05   | J         | ug/l  | 0.10 | 0.04 | 1               |
| Phenanthrene   | 0.12   |           | ug/l  | 0.10 | 0.02 | 1               |
| Dibenzo(a,h)anthracene                               | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Indeno(1,2,3-cd)pyrene                               | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Pyrene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| 2-Methylnaphthalene                                  | ND     |           | ug/l  | 0.10 | 0.05 | 1               |
| Pentachlorophenol                                    | ND     |           | ug/l  | 0.80 | 0.22 | 1               |
| Hexachlorobenzene                                    | ND     |           | ug/l  | 0.80 | 0.03 | 1               |
| Hexachloroethane                                     | ND     |           | ug/l  | 0.80 | 0.03 | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS**

Lab ID: L1738416-01

Date Collected: 10/23/17 12:30

Client ID: MW-1

Date Received: 10/23/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS-SIM - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 42         |           | 21-120              |
| Phenol-d6            | 34         |           | 10-120              |
| Nitrobenzene-d5      | 75         |           | 23-120              |
| 2-Fluorobiphenyl     | 68         |           | 15-120              |
| 2,4,6-Tribromophenol | 107        |           | 10-120              |
| 4-Terphenyl-d14      | 82         |           | 41-149              |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS**

Lab ID: L1738416-02  
 Client ID: MW-2  
 Sample Location: BUFFALO, NY

Date Collected: 10/23/17 13:30  
 Date Received: 10/23/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 10/26/17 03:47

Matrix: Water  
 Analytical Method: 1,8270D  
 Analytical Date: 10/28/17 23:11  
 Analyst: RC

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/l  | 2.0 | 0.67 | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/l  | 5.0 | 1.4  | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/l  | 5.0 | 0.84 | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/l  | 2.0 | 0.62 | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/l  | 2.0 | 0.73 | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/l  | 2.0 | 0.70 | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/l  | 20  | 7.8  | 1               |
| Isophorone                                       | ND     |           | ug/l  | 5.0 | 0.60 | 1               |
| Nitrobenzene                                     | ND     |           | ug/l  | 2.0 | 0.75 | 1               |
| NDPA/DPA   | ND     |           | ug/l  | 2.0 | 0.64 | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/l  | 5.0 | 0.70 | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/l  | 3.0 | 0.91 | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/l  | 5.0 | 1.3  | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/l  | 5.0 | 0.69 | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| Diethyl phthalate                                | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| Dimethyl phthalate                               | ND     |           | ug/l  | 5.0 | 0.65 | 1               |
| Biphenyl   | ND     |           | ug/l  | 2.0 | 0.76 | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.2  | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.3  | 1               |
| Dibenzofuran                                     | ND     |           | ug/l  | 2.0 | 0.66 | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/l  | 10  | 0.67 | 1               |
| Acetophenone                                     | ND     |           | ug/l  | 5.0 | 0.85 | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/l  | 5.0 | 0.68 | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/l  | 2.0 | 0.62 | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/l  | 2.0 | 0.63 | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS****Lab ID:** L1738416-02**Date Collected:** 10/23/17 13:30**Client ID:** MW-2**Date Received:** 10/23/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| 2,4-Dichlorophenol                               | ND     |           | ug/l  | 5.0 | 0.77 | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/l  | 5.0 | 1.6  | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/l  | 10  | 1.5  | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/l  | 10  | 1.8  | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/l  | 20  | 5.5  | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/l  | 10  | 2.1  | 1               |
| Phenol   | ND     |           | ug/l  | 5.0 | 1.9  | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/l  | 5.0 | 0.72 | 1               |
| Carbazole  | ND     |           | ug/l  | 2.0 | 0.63 | 1               |
| Atrazine   | ND     |           | ug/l  | 10  | 1.8  | 1               |
| Benzaldehyde                                     | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| Caprolactam                                      | ND     |           | ug/l  | 10  | 3.6  | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/l  | 5.0 | 0.93 | 1               |

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 49         |           | 21-120              |
| Phenol-d6            | 36         |           | 10-120              |
| Nitrobenzene-d5      | 90         |           | 23-120              |
| 2-Fluorobiphenyl     | 89         |           | 15-120              |
| 2,4,6-Tribromophenol | 100        |           | 10-120              |
| 4-Terphenyl-d14      | 90         |           | 41-149              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS**

Lab ID: L1738416-02  
 Client ID: MW-2  
 Sample Location: BUFFALO, NY

Date Collected: 10/23/17 13:30  
 Date Received: 10/23/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 10/29/17 16:56

Matrix: Water  
 Analytical Method: 1,8270D-SIM  
 Analytical Date: 10/30/17 12:42  
 Analyst: KL

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab |        |           |       |      |      |                 |
| Acenaphthene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| 2-Chloronaphthalene                                  | ND     |           | ug/l  | 0.20 | 0.04 | 1               |
| Fluoranthene   | 0.06   | J         | ug/l  | 0.10 | 0.04 | 1               |
| Hexachlorobutadiene                                  | ND     |           | ug/l  | 0.50 | 0.04 | 1               |
| Naphthalene  | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(a)anthracene                                   | ND     |           | ug/l  | 0.10 | 0.02 | 1               |
| Benzo(a)pyrene                                       | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(b)fluoranthene                                 | ND     |           | ug/l  | 0.10 | 0.02 | 1               |
| Benzo(k)fluoranthene                                 | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Chrysene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Acenaphthylene                                       | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Anthracene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(ghi)perylene                                   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Fluorene   | 0.06   | J         | ug/l  | 0.10 | 0.04 | 1               |
| Phenanthrene   | 0.37   |           | ug/l  | 0.10 | 0.02 | 1               |
| Dibenzo(a,h)anthracene                               | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Indeno(1,2,3-cd)pyrene                               | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Pyrene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| 2-Methylnaphthalene                                  | ND     |           | ug/l  | 0.10 | 0.05 | 1               |
| Pentachlorophenol                                    | ND     |           | ug/l  | 0.80 | 0.22 | 1               |
| Hexachlorobenzene                                    | ND     |           | ug/l  | 0.80 | 0.03 | 1               |
| Hexachloroethane                                     | ND     |           | ug/l  | 0.80 | 0.03 | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS**

Lab ID: L1738416-02

Date Collected: 10/23/17 13:30

Client ID: MW-2

Date Received: 10/23/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS-SIM - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 48         |           | 21-120              |
| Phenol-d6            | 36         |           | 10-120              |
| Nitrobenzene-d5      | 80         |           | 23-120              |
| 2-Fluorobiphenyl     | 67         |           | 15-120              |
| 2,4,6-Tribromophenol | 95         |           | 10-120              |
| 4-Terphenyl-d14      | 71         |           | 41-149              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 10/28/17 21:00  
 Analyst: EK

Extraction Method: EPA 3510C  
 Extraction Date: 10/25/17 22:54

| Parameter  | Result | Qualifier | Units | RL  | MDL  |
|--|--------|-----------|-------|-----|------|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1056361-1 |        |           |       |     |      |
| Bis(2-chloroethyl)ether  | ND     |           | ug/l  | 2.0 | 0.67 |
| 3,3'-Dichlorobenzidine   | ND     |           | ug/l  | 5.0 | 1.4  |
| 2,4-Dinitrotoluene   | ND     |           | ug/l  | 5.0 | 0.84 |
| 2,6-Dinitrotoluene   | ND     |           | ug/l  | 5.0 | 1.1  |
| 4-Chlorophenyl phenyl ether  | ND     |           | ug/l  | 2.0 | 0.62 |
| 4-Bromophenyl phenyl ether   | ND     |           | ug/l  | 2.0 | 0.73 |
| Bis(2-chloroisopropyl)ether  | ND     |           | ug/l  | 2.0 | 0.70 |
| Bis(2-chloroethoxy)methane   | ND     |           | ug/l  | 5.0 | 0.63 |
| Hexachlorocyclopentadiene  | ND     |           | ug/l  | 20  | 7.8  |
| Isophorone   | ND     |           | ug/l  | 5.0 | 0.60 |
| Nitrobenzene   | ND     |           | ug/l  | 2.0 | 0.75 |
| NDPA/DPA   | ND     |           | ug/l  | 2.0 | 0.64 |
| n-Nitrosodi-n-propylamine  | ND     |           | ug/l  | 5.0 | 0.70 |
| Bis(2-ethylhexyl)phthalate   | ND     |           | ug/l  | 3.0 | 0.91 |
| Butyl benzyl phthalate   | ND     |           | ug/l  | 5.0 | 1.3  |
| Di-n-butylphthalate  | ND     |           | ug/l  | 5.0 | 0.69 |
| Di-n-octylphthalate  | ND     |           | ug/l  | 5.0 | 1.1  |
| Diethyl phthalate  | ND     |           | ug/l  | 5.0 | 0.63 |
| Dimethyl phthalate   | ND     |           | ug/l  | 5.0 | 0.65 |
| Biphenyl   | ND     |           | ug/l  | 2.0 | 0.76 |
| 4-Chloroaniline  | ND     |           | ug/l  | 5.0 | 0.63 |
| 2-Nitroaniline   | ND     |           | ug/l  | 5.0 | 1.1  |
| 3-Nitroaniline   | ND     |           | ug/l  | 5.0 | 1.2  |
| 4-Nitroaniline   | ND     |           | ug/l  | 5.0 | 1.3  |
| Dibenzofuran   | ND     |           | ug/l  | 2.0 | 0.66 |
| 1,2,4,5-Tetrachlorobenzene   | ND     |           | ug/l  | 10  | 0.67 |
| Acetophenone   | ND     |           | ug/l  | 5.0 | 0.85 |
| 2,4,6-Trichlorophenol  | ND     |           | ug/l  | 5.0 | 0.68 |
| p-Chloro-m-cresol  | ND     |           | ug/l  | 2.0 | 0.62 |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 10/28/17 21:00  
 Analyst: EK

Extraction Method: EPA 3510C  
 Extraction Date: 10/25/17 22:54

| Parameter  | Result | Qualifier | Units | RL  | MDL  |
|--|--------|-----------|-------|-----|------|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1056361-1 |        |           |       |     |      |
| 2-Chlorophenol   | ND     |           | ug/l  | 2.0 | 0.63 |
| 2,4-Dichlorophenol   | ND     |           | ug/l  | 5.0 | 0.77 |
| 2,4-Dimethylphenol   | ND     |           | ug/l  | 5.0 | 1.6  |
| 2-Nitrophenol  | ND     |           | ug/l  | 10  | 1.5  |
| 4-Nitrophenol  | ND     |           | ug/l  | 10  | 1.8  |
| 2,4-Dinitrophenol  | ND     |           | ug/l  | 20  | 5.5  |
| 4,6-Dinitro-o-cresol   | ND     |           | ug/l  | 10  | 2.1  |
| Phenol   | ND     |           | ug/l  | 5.0 | 1.9  |
| 3-Methylphenol/4-Methylphenol  | ND     |           | ug/l  | 5.0 | 1.1  |
| 2,4,5-Trichlorophenol  | ND     |           | ug/l  | 5.0 | 0.72 |
| Carbazole  | ND     |           | ug/l  | 2.0 | 0.63 |
| Atrazine   | ND     |           | ug/l  | 10  | 1.8  |
| Benzaldehyde   | ND     |           | ug/l  | 5.0 | 1.1  |
| Caprolactam  | ND     |           | ug/l  | 10  | 3.6  |
| 2,3,4,6-Tetrachlorophenol  | ND     |           | ug/l  | 5.0 | 0.93 |

#### Tentatively Identified Compounds

|                     |      |   |      |
|---------------------|------|---|------|
| Total TIC Compounds | 4.76 | J | ug/l |
| Unknown             | 4.76 | J | ug/l |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**Method Blank Analysis**  
**Batch Quality Control**Analytical Method: 1,8270D  
Analytical Date: 10/28/17 21:00  
Analyst: EKExtraction Method: EPA 3510C  
Extraction Date: 10/25/17 22:54

| Parameter  | Result | Qualifier | Units | RL | MDL |
|--|--------|-----------|-------|----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-02 Batch: WG1056361-1 |        |           |       |    |     |

| Surrogate            | %Recovery | Qualifier | Acceptance<br>Criteria |
|----------------------|-----------|-----------|------------------------|
| 2-Fluorophenol       | 36        |           | 21-120                 |
| Phenol-d6            | 26        |           | 10-120                 |
| Nitrobenzene-d5      | 62        |           | 23-120                 |
| 2-Fluorobiphenyl     | 60        |           | 15-120                 |
| 2,4,6-Tribromophenol | 69        |           | 10-120                 |
| 4-Terphenyl-d14      | 83        |           | 41-149                 |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D-SIM  
 Analytical Date: 10/30/17 08:17  
 Analyst: KL

Extraction Method: EPA 3510C  
 Extraction Date: 10/29/17 16:56

| Parameter  | Result | Qualifier | Units | RL   | MDL  |
|--|--------|-----------|-------|------|------|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab for sample(s): 01-02 Batch: WG1057504-1 |        |           |       |      |      |
| Acenaphthene   | ND     |           | ug/l  | 0.10 | 0.04 |
| 2-Chloronaphthalene  | ND     |           | ug/l  | 0.20 | 0.04 |
| Fluoranthene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Hexachlorobutadiene  | ND     |           | ug/l  | 0.50 | 0.04 |
| Naphthalene  | ND     |           | ug/l  | 0.10 | 0.04 |
| Benzo(a)anthracene   | 0.02   | J         | ug/l  | 0.10 | 0.02 |
| Benzo(a)pyrene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Benzo(b)fluoranthene   | ND     |           | ug/l  | 0.10 | 0.02 |
| Benzo(k)fluoranthene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Chrysene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Acenaphthylene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Anthracene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Benzo(ghi)perylene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Fluorene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Phenanthrene   | 0.02   | J         | ug/l  | 0.10 | 0.02 |
| Dibenzo(a,h)anthracene   | 0.06   | J         | ug/l  | 0.10 | 0.04 |
| Indeno(1,2,3-cd)pyrene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Pyrene   | ND     |           | ug/l  | 0.10 | 0.04 |
| 2-Methylnaphthalene  | 0.05   | J         | ug/l  | 0.10 | 0.05 |
| Pentachlorophenol  | ND     |           | ug/l  | 0.80 | 0.22 |
| Hexachlorobenzene  | ND     |           | ug/l  | 0.80 | 0.03 |
| Hexachloroethane   | ND     |           | ug/l  | 0.80 | 0.03 |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**Method Blank Analysis**  
**Batch Quality Control**Analytical Method: 1,8270D-SIM  
Analytical Date: 10/30/17 08:17  
Analyst: KLExtraction Method: EPA 3510C  
Extraction Date: 10/29/17 16:56

| Parameter  | Result | Qualifier | Units | RL | MDL |
|--|--------|-----------|-------|----|-----|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab for sample(s): 01-02 Batch: WG1057504-1 |        |           |       |    |     |

| Surrogate            | %Recovery | Qualifier | Acceptance<br>Criteria |
|----------------------|-----------|-----------|------------------------|
| 2-Fluorophenol       | 55        |           | 21-120                 |
| Phenol-d6            | 39        |           | 10-120                 |
| Nitrobenzene-d5      | 93        |           | 23-120                 |
| 2-Fluorobiphenyl     | 78        |           | 15-120                 |
| 2,4,6-Tribromophenol | 113       |           | 10-120                 |
| 4-Terphenyl-d14      | 100       |           | 41-149                 |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1738416

**Project Number:** T0234-016-001

**Report Date:** 10/30/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1056361-2 WG1056361-3 |                  |      |                   |      |                     |     |      |               |
| Bis(2-chloroethyl)ether   | 92               |      | 83                |      | 40-140              | 10  |      | 30            |
| 3,3'-Dichlorobenzidine  | 75               |      | 72                |      | 40-140              | 4   |      | 30            |
| 2,4-Dinitrotoluene  | 114              |      | 107               |      | 48-143              | 6   |      | 30            |
| 2,6-Dinitrotoluene  | 113              |      | 107               |      | 40-140              | 5   |      | 30            |
| 4-Chlorophenyl phenyl ether   | 101              |      | 94                |      | 40-140              | 7   |      | 30            |
| 4-Bromophenyl phenyl ether  | 98               |      | 93                |      | 40-140              | 5   |      | 30            |
| Bis(2-chloroisopropyl)ether   | 99               |      | 91                |      | 40-140              | 8   |      | 30            |
| Bis(2-chloroethoxy)methane  | 104              |      | 96                |      | 40-140              | 8   |      | 30            |
| Hexachlorocyclopentadiene   | 68               |      | 58                |      | 40-140              | 16  |      | 30            |
| Isophorone  | 106              |      | 98                |      | 40-140              | 8   |      | 30            |
| Nitrobenzene  | 97               |      | 91                |      | 40-140              | 6   |      | 30            |
| NDPA/DPA  | 105              |      | 97                |      | 40-140              | 8   |      | 30            |
| n-Nitrosodi-n-propylamine   | 107              |      | 100               |      | 29-132              | 7   |      | 30            |
| Bis(2-ethylhexyl)phthalate  | 123              |      | 117               |      | 40-140              | 5   |      | 30            |
| Butyl benzyl phthalate  | 122              |      | 116               |      | 40-140              | 5   |      | 30            |
| Di-n-butylphthalate   | 118              |      | 111               |      | 40-140              | 6   |      | 30            |
| Di-n-octylphthalate   | 124              |      | 115               |      | 40-140              | 8   |      | 30            |
| Diethyl phthalate   | 108              |      | 100               |      | 40-140              | 8   |      | 30            |
| Dimethyl phthalate  | 107              |      | 100               |      | 40-140              | 7   |      | 30            |
| Biphenyl  | 83               |      | 75                |      | 40-140              | 10  |      | 30            |
| 4-Chloroaniline   | 82               |      | 80                |      | 40-140              | 2   |      | 30            |
| 2-Nitroaniline  | 117              |      | 113               |      | 52-143              | 3   |      | 30            |
| 3-Nitroaniline  | 91               |      | 93                |      | 25-145              | 2   |      | 30            |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1738416

**Project Number:** T0234-016-001

**Report Date:** 10/30/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1056361-2 WG1056361-3 |                  |      |                   |      |                     |     |      |               |
| 4-Nitroaniline  | 100              |      | 94                |      | 51-143              | 6   |      | 30            |
| Dibenzofuran  | 101              |      | 93                |      | 40-140              | 8   |      | 30            |
| 1,2,4,5-Tetrachlorobenzene  | 78               |      | 71                |      | 2-134               | 9   |      | 30            |
| Acetophenone  | 82               |      | 77                |      | 39-129              | 6   |      | 30            |
| 2,4,6-Trichlorophenol   | 107              |      | 98                |      | 30-130              | 9   |      | 30            |
| p-Chloro-m-cresol   | 108              | Q    | 101               | Q    | 23-97               | 7   |      | 30            |
| 2-Chlorophenol  | 93               |      | 86                |      | 27-123              | 8   |      | 30            |
| 2,4-Dichlorophenol  | 104              |      | 98                |      | 30-130              | 6   |      | 30            |
| 2,4-Dimethylphenol  | 89               |      | 91                |      | 30-130              | 2   |      | 30            |
| 2-Nitrophenol   | 102              |      | 96                |      | 30-130              | 6   |      | 30            |
| 4-Nitrophenol   | 63               |      | 59                |      | 10-80               | 7   |      | 30            |
| 2,4-Dinitrophenol   | 103              |      | 92                |      | 20-130              | 11  |      | 30            |
| 4,6-Dinitro-o-cresol  | 108              |      | 102               |      | 20-164              | 6   |      | 30            |
| Phenol  | 52               |      | 50                |      | 12-110              | 4   |      | 30            |
| 3-Methylphenol/4-Methylphenol   | 82               |      | 78                |      | 30-130              | 5   |      | 30            |
| 2,4,5-Trichlorophenol   | 106              |      | 100               |      | 30-130              | 6   |      | 30            |
| Carbazole   | 107              |      | 101               |      | 55-144              | 6   |      | 30            |
| Atrazine  | 97               |      | 92                |      | 40-140              | 5   |      | 30            |
| Benzaldehyde  | 104              |      | 98                |      | 40-140              | 6   |      | 30            |
| Caprolactam   | 34               |      | 32                |      | 10-130              | 6   |      | 30            |
| 2,3,4,6-Tetrachlorophenol   | 105              |      | 98                |      | 40-140              | 7   |      | 30            |

**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17

| <b>Parameter</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|

Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-02 Batch: WG1056361-2 WG1056361-3

| <b>Surrogate</b>     | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> |
|----------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|
| 2-Fluorophenol       | 49                       |             | 45                        |             | 21-120                         |
| Phenol-d6            | 36                       |             | 34                        |             | 10-120                         |
| Nitrobenzene-d5      | 79                       |             | 72                        |             | 23-120                         |
| 2-Fluorobiphenyl     | 74                       |             | 68                        |             | 15-120                         |
| 2,4,6-Tribromophenol | 84                       |             | 75                        |             | 10-120                         |
| 4-Terphenyl-d14      | 76                       |             | 73                        |             | 41-149                         |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1738416

**Project Number:** T0234-016-001

**Report Date:** 10/30/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab Associated sample(s): 01-02 Batch: WG1057504-2 WG1057504-3 |                  |      |                   |      |                     |     |      |               |
| Acenaphthene  | 98               |      | 106               |      | 37-111              | 8   |      | 40            |
| 2-Chloronaphthalene   | 102              |      | 112               |      | 40-140              | 9   |      | 40            |
| Fluoranthene  | 120              |      | 131               |      | 40-140              | 9   |      | 40            |
| Hexachlorobutadiene   | 89               |      | 95                |      | 40-140              | 7   |      | 40            |
| Naphthalene   | 98               |      | 105               |      | 40-140              | 7   |      | 40            |
| Benzo(a)anthracene  | 120              |      | 129               |      | 40-140              | 7   |      | 40            |
| Benzo(a)pyrene  | 106              |      | 114               |      | 40-140              | 7   |      | 40            |
| Benzo(b)fluoranthene  | 114              |      | 123               |      | 40-140              | 8   |      | 40            |
| Benzo(k)fluoranthene  | 112              |      | 119               |      | 40-140              | 6   |      | 40            |
| Chrysene  | 104              |      | 111               |      | 40-140              | 7   |      | 40            |
| Acenaphthylene  | 115              |      | 127               |      | 40-140              | 10  |      | 40            |
| Anthracene  | 117              |      | 126               |      | 40-140              | 7   |      | 40            |
| Benzo(ghi)perylene  | 117              |      | 121               |      | 40-140              | 3   |      | 40            |
| Fluorene  | 107              |      | 116               |      | 40-140              | 8   |      | 40            |
| Phenanthrene  | 101              |      | 108               |      | 40-140              | 7   |      | 40            |
| Dibenzo(a,h)anthracene  | 112              |      | 117               |      | 40-140              | 4   |      | 40            |
| Indeno(1,2,3-cd)pyrene  | 111              |      | 117               |      | 40-140              | 5   |      | 40            |
| Pyrene  | 117              |      | 127               |      | 26-127              | 8   |      | 40            |
| 2-Methylnaphthalene   | 102              |      | 111               |      | 40-140              | 8   |      | 40            |
| Pentachlorophenol   | 118              | Q    | 130               | Q    | 9-103               | 10  |      | 40            |
| Hexachlorobenzene   | 103              |      | 111               |      | 40-140              | 7   |      | 40            |
| Hexachloroethane  | 96               |      | 102               |      | 40-140              | 6   |      | 40            |

**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17

| <b>Parameter</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|

Semivolatile Organics by GC/MS-SIM - Westborough Lab Associated sample(s): 01-02 Batch: WG1057504-2 WG1057504-3

| <b>Surrogate</b>     | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> |
|----------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|
| 2-Fluorophenol       | 52                       |             | 54                        |             | 21-120                         |
| Phenol-d6            | 38                       |             | 40                        |             | 10-120                         |
| Nitrobenzene-d5      | 87                       |             | 93                        |             | 23-120                         |
| 2-Fluorobiphenyl     | 70                       |             | 76                        |             | 15-120                         |
| 2,4,6-Tribromophenol | 99                       |             | 108                       |             | 10-120                         |
| 4-Terphenyl-d14      | 85                       |             | 92                        |             | 41-149                         |

# PCBS

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

**SAMPLE RESULTS**

**Lab ID:** L1738416-01  
**Client ID:** MW-1  
**Sample Location:** BUFFALO, NY

**Matrix:** Water  
**Analytical Method:** 1,8082A  
**Analytical Date:** 10/29/17 22:56  
**Analyst:** HT

**Date Collected:** 10/23/17 12:30  
**Date Received:** 10/23/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3510C  
**Extraction Date:** 10/26/17 02:17  
**Cleanup Method:** EPA 3665A  
**Cleanup Date:** 10/28/17  
**Cleanup Method:** EPA 3660B  
**Cleanup Date:** 10/28/17

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Aroclor 1016                                      | ND     |           | ug/l  | 0.083 | 0.020 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/l  | 0.083 | 0.032 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/l  | 0.083 | 0.027 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/l  | 0.083 | 0.030 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/l  | 0.083 | 0.023 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/l  | 0.083 | 0.035 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/l  | 0.083 | 0.020 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/l  | 0.083 | 0.017 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/l  | 0.083 | 0.027 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/l  | 0.083 | 0.017 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 87         |           | 30-150              | A      |
| Decachlorobiphenyl           | 41         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 81         |           | 30-150              | B      |
| Decachlorobiphenyl           | 58         |           | 30-150              | B      |



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

**SAMPLE RESULTS**

**Lab ID:** L1738416-02  
**Client ID:** MW-2  
**Sample Location:** BUFFALO, NY

**Matrix:** Water  
**Analytical Method:** 1,8082A  
**Analytical Date:** 10/29/17 23:11  
**Analyst:** HT

**Date Collected:** 10/23/17 13:30  
**Date Received:** 10/23/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3510C  
**Extraction Date:** 10/26/17 02:17  
**Cleanup Method:** EPA 3665A  
**Cleanup Date:** 10/28/17  
**Cleanup Method:** EPA 3660B  
**Cleanup Date:** 10/28/17

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Aroclor 1016                                      | ND     |           | ug/l  | 0.083 | 0.020 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/l  | 0.083 | 0.032 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/l  | 0.083 | 0.027 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/l  | 0.083 | 0.030 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/l  | 0.083 | 0.023 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/l  | 0.083 | 0.035 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/l  | 0.083 | 0.020 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/l  | 0.083 | 0.017 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/l  | 0.083 | 0.027 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/l  | 0.083 | 0.017 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 85         |           | 30-150              | A      |
| Decachlorobiphenyl           | 49         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 78         |           | 30-150              | B      |
| Decachlorobiphenyl           | 66         |           | 30-150              | B      |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8082A  
 Analytical Date: 10/27/17 09:39  
 Analyst: WR

Extraction Method: EPA 3510C  
 Extraction Date: 10/26/17 02:17  
 Cleanup Method: EPA 3665A  
 Cleanup Date: 10/26/17  
 Cleanup Method: EPA 3660B  
 Cleanup Date: 10/27/17

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Column |
|---|--------|-----------|-------|-------|-------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab for sample(s): 01-02 Batch: WG1056405-1 |        |           |       |       |       |        |
| Aroclor 1016  | ND     |           | ug/l  | 0.083 | 0.020 | A      |
| Aroclor 1221  | ND     |           | ug/l  | 0.083 | 0.032 | A      |
| Aroclor 1232  | ND     |           | ug/l  | 0.083 | 0.027 | A      |
| Aroclor 1242  | ND     |           | ug/l  | 0.083 | 0.030 | A      |
| Aroclor 1248  | ND     |           | ug/l  | 0.083 | 0.023 | A      |
| Aroclor 1254  | ND     |           | ug/l  | 0.083 | 0.035 | A      |
| Aroclor 1260  | ND     |           | ug/l  | 0.083 | 0.020 | A      |
| Aroclor 1262  | ND     |           | ug/l  | 0.083 | 0.017 | A      |
| Aroclor 1268  | ND     |           | ug/l  | 0.083 | 0.027 | A      |
| PCBs, Total   | ND     |           | ug/l  | 0.083 | 0.017 | A      |

| Surrogate                    | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|------------------------------|-----------|-----------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 70        |           | 30-150                 | A      |
| Decachlorobiphenyl           | 77        |           | 30-150                 | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 75        |           | 30-150                 | B      |
| Decachlorobiphenyl           | 81        |           | 30-150                 | B      |

# Lab Control Sample Analysis

## Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: T0234-016-001

Lab Number: L1738416

Report Date: 10/30/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits | Column |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 01-02 Batch: WG1056405-2 WG1056405-3 |                  |      |                   |      |                     |     |      |               |        |
| Aroclor 1016   | 87               |      | 86                |      | 40-140              | 1   |      | 50            | A      |
| Aroclor 1260   | 96               |      | 95                |      | 40-140              | 1   |      | 50            | A      |

| Surrogate                    | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria | Column |
|------------------------------|------------------|------|-------------------|------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 66               |      | 64                |      | 30-150                 | A      |
| Decachlorobiphenyl           | 69               |      | 66                |      | 30-150                 | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 72               |      | 70                |      | 30-150                 | B      |
| Decachlorobiphenyl           | 74               |      | 69                |      | 30-150                 | B      |

# PESTICIDES

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS**

Lab ID: L1738416-01  
 Client ID: MW-1  
 Sample Location: BUFFALO, NY

Date Collected: 10/23/17 12:30  
 Date Received: 10/23/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 10/26/17 07:44

Matrix: Water  
 Analytical Method: 1,8081B  
 Analytical Date: 10/29/17 01:13  
 Analyst: KEG

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Delta-BHC   | ND     |           | ug/l  | 0.020 | 0.005 | 1               | A      |
| Lindane   | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Alpha-BHC   | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Beta-BHC  | ND     |           | ug/l  | 0.020 | 0.006 | 1               | A      |
| Heptachlor  | 0.047  |           | ug/l  | 0.020 | 0.003 | 1               | B      |
| Aldrin  | ND     |           | ug/l  | 0.020 | 0.002 | 1               | A      |
| Heptachlor epoxide                                | 0.024  | PI        | ug/l  | 0.020 | 0.004 | 1               | A      |
| Endrin  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| Endrin aldehyde                                   | ND     |           | ug/l  | 0.040 | 0.008 | 1               | A      |
| Endrin ketone                                     | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Dieldrin  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| 4,4'-DDE  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| 4,4'-DDD  | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| 4,4'-DDT  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| Endosulfan I                                      | ND     |           | ug/l  | 0.020 | 0.003 | 1               | A      |
| Endosulfan II                                     | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Endosulfan sulfate                                | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Methoxychlor                                      | ND     |           | ug/l  | 0.200 | 0.007 | 1               | A      |
| Toxaphene   | ND     |           | ug/l  | 0.200 | 0.063 | 1               | A      |
| cis-Chlordane                                     | 0.015  | JPI       | ug/l  | 0.020 | 0.007 | 1               | B      |
| trans-Chlordane                                   | ND     |           | ug/l  | 0.020 | 0.006 | 1               | A      |
| Chlordane   | ND     |           | ug/l  | 0.200 | 0.046 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 98         |           | 30-150              | A      |
| Decachlorobiphenyl           | 51         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 81         |           | 30-150              | B      |
| Decachlorobiphenyl           | 48         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

**SAMPLE RESULTS**

**Lab ID:** L1738416-01  
**Client ID:** MW-1  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/23/17 12:30  
**Date Received:** 10/23/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 8151A  
**Extraction Date:** 10/25/17 17:09

**Matrix:** Water  
**Analytical Method:** 1,8151A  
**Analytical Date:** 10/27/17 20:36  
**Analyst:** SL

**Methylation Date:** 10/26/17 16:00

| Parameter                                      | Result | Qualifier | Units | RL   | MDL   | Dilution Factor | Column |
|--|--------|-----------|-------|------|-------|-----------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab |        |           |       |      |       |                 |        |
| 2,4-D  | ND     |           | ug/l  | 10.0 | 0.498 | 1               | A      |
| 2,4,5-T  | ND     |           | ug/l  | 2.00 | 0.531 | 1               | A      |
| 2,4,5-TP (Silvex)                              | ND     |           | ug/l  | 2.00 | 0.539 | 1               | A      |

| Surrogate | % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|------------|-----------|---------------------|--------|
| DCAA      | 83         |           | 30-150              | A      |
| DCAA      | 85         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**SAMPLE RESULTS**

Lab ID: L1738416-02  
 Client ID: MW-2  
 Sample Location: BUFFALO, NY

Date Collected: 10/23/17 13:30  
 Date Received: 10/23/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 10/26/17 07:44

Matrix: Water  
 Analytical Method: 1,8081B  
 Analytical Date: 10/29/17 01:26  
 Analyst: KEG

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Delta-BHC   | ND     |           | ug/l  | 0.020 | 0.005 | 1               | A      |
| Lindane   | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Alpha-BHC   | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Beta-BHC  | ND     |           | ug/l  | 0.020 | 0.006 | 1               | A      |
| Heptachlor  | 0.039  |           | ug/l  | 0.020 | 0.003 | 1               | A      |
| Aldrin  | ND     |           | ug/l  | 0.020 | 0.002 | 1               | A      |
| Heptachlor epoxide                                | 0.013  | JPI       | ug/l  | 0.020 | 0.004 | 1               | A      |
| Endrin  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| Endrin aldehyde                                   | ND     |           | ug/l  | 0.040 | 0.008 | 1               | A      |
| Endrin ketone                                     | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Dieldrin  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| 4,4'-DDE  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| 4,4'-DDD  | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| 4,4'-DDT  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| Endosulfan I                                      | ND     |           | ug/l  | 0.020 | 0.003 | 1               | A      |
| Endosulfan II                                     | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Endosulfan sulfate                                | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Methoxychlor                                      | ND     |           | ug/l  | 0.200 | 0.007 | 1               | A      |
| Toxaphene   | ND     |           | ug/l  | 0.200 | 0.063 | 1               | A      |
| cis-Chlordane                                     | 0.014  | JPI       | ug/l  | 0.020 | 0.007 | 1               | B      |
| trans-Chlordane                                   | ND     |           | ug/l  | 0.020 | 0.006 | 1               | A      |
| Chlordane   | ND     |           | ug/l  | 0.200 | 0.046 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 87         |           | 30-150              | A      |
| Decachlorobiphenyl           | 68         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 70         |           | 30-150              | B      |
| Decachlorobiphenyl           | 61         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

**SAMPLE RESULTS**

**Lab ID:** L1738416-02  
**Client ID:** MW-2  
**Sample Location:** BUFFALO, NY

**Date Collected:** 10/23/17 13:30  
**Date Received:** 10/23/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 8151A  
**Extraction Date:** 10/25/17 17:09

**Matrix:** Water  
**Analytical Method:** 1,8151A  
**Analytical Date:** 10/27/17 20:55  
**Analyst:** SL

**Methylation Date:** 10/26/17 16:00

| Parameter                                      | Result | Qualifier | Units | RL   | MDL   | Dilution Factor | Column |
|--|--------|-----------|-------|------|-------|-----------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab |        |           |       |      |       |                 |        |
| 2,4-D  | ND     |           | ug/l  | 10.0 | 0.498 | 1               | A      |
| 2,4,5-T  | ND     |           | ug/l  | 2.00 | 0.531 | 1               | A      |
| 2,4,5-TP (Silvex)                              | ND     |           | ug/l  | 2.00 | 0.539 | 1               | A      |

| Surrogate | % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|------------|-----------|---------------------|--------|
| DCAA      | 83         |           | 30-150              | A      |
| DCAA      | 81         |           | 30-150              | B      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8151A  
 Analytical Date: 10/27/17 18:20  
 Analyst: SL

Extraction Method: EPA 8151A  
 Extraction Date: 10/25/17 17:09

Methylation Date: 10/26/17 16:00

| Parameter  | Result | Qualifier | Units | RL   | MDL   | Column |
|--|--------|-----------|-------|------|-------|--------|
| Chlorinated Herbicides by GC - Westborough Lab for sample(s): 01-02 Batch: WG1056285-1 |        |           |       |      |       |        |
| 2,4-D  | ND     |           | ug/l  | 10.0 | 0.498 | A      |
| 2,4,5-T  | ND     |           | ug/l  | 2.00 | 0.531 | A      |
| 2,4,5-TP (Silvex)  | ND     |           | ug/l  | 2.00 | 0.539 | A      |

| Surrogate | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|-----------|-----------|-----------|------------------------|--------|
| DCAA      | 73        |           | 30-150                 | A      |
| DCAA      | 78        |           | 30-150                 | B      |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8081B  
 Analytical Date: 10/29/17 00:22  
 Analyst: KEG

Extraction Method: EPA 3510C  
 Extraction Date: 10/26/17 07:44

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Column |
|---|--------|-----------|-------|-------|-------|--------|
| Organochlorine Pesticides by GC - Westborough Lab for sample(s): 01-02 Batch: WG1056475-1 |        |           |       |       |       |        |
| Delta-BHC   | ND     |           | ug/l  | 0.020 | 0.005 | A      |
| Lindane   | ND     |           | ug/l  | 0.020 | 0.004 | A      |
| Alpha-BHC   | ND     |           | ug/l  | 0.020 | 0.004 | A      |
| Beta-BHC  | ND     |           | ug/l  | 0.020 | 0.006 | A      |
| Heptachlor  | ND     |           | ug/l  | 0.020 | 0.003 | A      |
| Aldrin  | ND     |           | ug/l  | 0.020 | 0.002 | A      |
| Heptachlor epoxide  | ND     |           | ug/l  | 0.020 | 0.004 | A      |
| Endrin  | ND     |           | ug/l  | 0.040 | 0.004 | A      |
| Endrin aldehyde   | ND     |           | ug/l  | 0.040 | 0.008 | A      |
| Endrin ketone   | ND     |           | ug/l  | 0.040 | 0.005 | A      |
| Dieldrin  | ND     |           | ug/l  | 0.040 | 0.004 | A      |
| 4,4'-DDE  | ND     |           | ug/l  | 0.040 | 0.004 | A      |
| 4,4'-DDD  | ND     |           | ug/l  | 0.040 | 0.005 | A      |
| 4,4'-DDT  | ND     |           | ug/l  | 0.040 | 0.004 | A      |
| Endosulfan I  | ND     |           | ug/l  | 0.020 | 0.003 | A      |
| Endosulfan II   | ND     |           | ug/l  | 0.040 | 0.005 | A      |
| Endosulfan sulfate  | ND     |           | ug/l  | 0.040 | 0.005 | A      |
| Methoxychlor  | ND     |           | ug/l  | 0.200 | 0.007 | A      |
| Toxaphene   | ND     |           | ug/l  | 0.200 | 0.063 | A      |
| cis-Chlordane   | ND     |           | ug/l  | 0.020 | 0.007 | A      |
| trans-Chlordane   | ND     |           | ug/l  | 0.020 | 0.006 | A      |
| Chlordane   | ND     |           | ug/l  | 0.200 | 0.046 | A      |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**Method Blank Analysis**  
**Batch Quality Control**Analytical Method: 1,8081B  
Analytical Date: 10/29/17 00:22  
Analyst: KEGExtraction Method: EPA 3510C  
Extraction Date: 10/26/17 07:44

| Parameter   | Result | Qualifier | Units | RL | MDL | Column |
|---|--------|-----------|-------|----|-----|--------|
| Organochlorine Pesticides by GC - Westborough Lab for sample(s): 01-02 Batch: WG1056475-1 |        |           |       |    |     |        |

| Surrogate                    | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|------------------------------|-----------|-----------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 63        |           | 30-150                 | A      |
| Decachlorobiphenyl           | 87        |           | 30-150                 | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 54        |           | 30-150                 | B      |
| Decachlorobiphenyl           | 73        |           | 30-150                 | B      |

**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17

| <b>Parameter</b>  | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> | <b>Column</b> |
|---|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|---------------|
| Chlorinated Herbicides by GC - Westborough Lab Associated sample(s): 01-02 Batch: WG1056285-2 WG1056285-3 |                          |             |                           |             |                             |            |             |                       |               |
| 2,4-D   | 77                       |             | 78                        |             | 30-150                      | 1          |             | 25                    | A             |
| 2,4,5-T   | 81                       |             | 80                        |             | 30-150                      | 1          |             | 25                    | A             |
| 2,4,5-TP (Silvex)   | 76                       |             | 76                        |             | 30-150                      | 0          |             | 25                    | A             |

| <b>Surrogate</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> | <b>Column</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|---------------|
| DCAA             | 81                       |             | 81                        |             | 30-150                         | A             |
| DCAA             | 91                       |             | 90                        |             | 30-150                         | B             |

## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits | Column |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01-02 Batch: WG1056475-2 WG1056475-3 |                  |      |                   |      |                     |     |      |               |        |
| Delta-BHC  | 102              |      | 107               |      | 30-150              | 5   |      | 20            | A      |
| Lindane  | 97               |      | 107               |      | 30-150              | 9   |      | 20            | A      |
| Alpha-BHC  | 110              |      | 124               |      | 30-150              | 12  |      | 20            | A      |
| Beta-BHC   | 91               |      | 101               |      | 30-150              | 10  |      | 20            | A      |
| Heptachlor   | 75               |      | 76                |      | 30-150              | 1   |      | 20            | A      |
| Aldrin   | 75               |      | 74                |      | 30-150              | 2   |      | 20            | A      |
| Heptachlor epoxide   | 95               |      | 103               |      | 30-150              | 8   |      | 20            | A      |
| Endrin   | 96               |      | 104               |      | 30-150              | 8   |      | 20            | A      |
| Endrin aldehyde  | 83               |      | 87                |      | 30-150              | 4   |      | 20            | A      |
| Endrin ketone  | 94               |      | 102               |      | 30-150              | 8   |      | 20            | A      |
| Dieldrin   | 108              |      | 116               |      | 30-150              | 7   |      | 20            | A      |
| 4,4'-DDE   | 101              |      | 108               |      | 30-150              | 7   |      | 20            | A      |
| 4,4'-DDD   | 98               |      | 106               |      | 30-150              | 8   |      | 20            | A      |
| 4,4'-DDT   | 100              |      | 105               |      | 30-150              | 5   |      | 20            | A      |
| Endosulfan I   | 101              |      | 108               |      | 30-150              | 7   |      | 20            | A      |
| Endosulfan II  | 96               |      | 104               |      | 30-150              | 8   |      | 20            | A      |
| Endosulfan sulfate   | 98               |      | 104               |      | 30-150              | 6   |      | 20            | A      |
| Methoxychlor   | 93               |      | 99                |      | 30-150              | 6   |      | 20            | A      |
| cis-Chlordane  | 92               |      | 96                |      | 30-150              | 4   |      | 20            | A      |
| trans-Chlordane  | 92               |      | 94                |      | 30-150              | 2   |      | 20            | A      |

## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

| Parameter | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|-----------|------------------|------|-------------------|------|---------------------|-----|------|---------------|
|-----------|------------------|------|-------------------|------|---------------------|-----|------|---------------|

Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01-02 Batch: WG1056475-2 WG1056475-3

| Surrogate                    | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria | Column |
|------------------------------|------------------|------|-------------------|------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 63               |      | 73                |      | 30-150                 | A      |
| Decachlorobiphenyl           | 93               |      | 97                |      | 30-150                 | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 55               |      | 63                |      | 30-150                 | B      |
| Decachlorobiphenyl           | 78               |      | 84                |      | 30-150                 | B      |

## METALS

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

## SAMPLE RESULTS

Lab ID: L1738416-01

Date Collected: 10/23/17 12:30

Client ID: MW-1

Date Received: 10/23/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Matrix: Water

| Parameter                    | Result  | Qualifier | Units | RL      | MDL     | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|---------|-----------|-------|---------|---------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |         |           |       |         |         |                 |                |                |             |                   |         |
| Aluminum, Total              | 2.26    |           | mg/l  | 0.0100  | 0.00327 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Antimony, Total              | ND      |           | mg/l  | 0.00400 | 0.00042 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Arsenic, Total               | 0.00649 |           | mg/l  | 0.00050 | 0.00016 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Barium, Total                | 0.05918 |           | mg/l  | 0.00050 | 0.00017 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Beryllium, Total             | 0.00012 | J         | mg/l  | 0.00050 | 0.00010 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Cadmium, Total               | 0.00011 | J         | mg/l  | 0.00020 | 0.00005 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Calcium, Total               | 237.    |           | mg/l  | 0.100   | 0.0394  | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Chromium, Total              | 0.00324 |           | mg/l  | 0.00100 | 0.00017 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Cobalt, Total                | 0.00267 |           | mg/l  | 0.00050 | 0.00016 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Copper, Total                | 0.00561 |           | mg/l  | 0.00100 | 0.00038 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Iron, Total                  | 4.62    |           | mg/l  | 0.0500  | 0.0191  | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Lead, Total                  | 0.00462 |           | mg/l  | 0.00100 | 0.00034 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Magnesium, Total             | 126.    |           | mg/l  | 0.0700  | 0.0242  | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Manganese, Total             | 0.1588  |           | mg/l  | 0.00100 | 0.00044 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Mercury, Total               | ND      |           | mg/l  | 0.00020 | 0.00006 | 1               | 10/26/17 11:43 | 10/28/17 17:06 | EPA 7470A   | 1,7470A           | MG      |
| Nickel, Total                | 0.00622 |           | mg/l  | 0.00200 | 0.00055 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Potassium, Total             | 6.31    |           | mg/l  | 0.100   | 0.0309  | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Selenium, Total              | 0.00231 | J         | mg/l  | 0.00500 | 0.00173 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Silver, Total                | ND      |           | mg/l  | 0.00040 | 0.00016 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Sodium, Total                | 1000    |           | mg/l  | 2.00    | 0.586   | 20              | 10/25/17 16:30 | 10/26/17 11:22 | EPA 3005A   | 1,6020A           | AM      |
| Thallium, Total              | ND      |           | mg/l  | 0.00050 | 0.00014 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Vanadium, Total              | 0.00416 | J         | mg/l  | 0.00500 | 0.00157 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |
| Zinc, Total                  | 0.02023 |           | mg/l  | 0.01000 | 0.00341 | 1               | 10/25/17 16:30 | 10/26/17 10:36 | EPA 3005A   | 1,6020A           | AM      |





Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

## SAMPLE RESULTS

Lab ID: L1738416-02

Date Collected: 10/23/17 13:30

Client ID: MW-2

Date Received: 10/23/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Matrix: Water

| Parameter                    | Result  | Qualifier | Units | RL      | MDL     | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|---------|-----------|-------|---------|---------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |         |           |       |         |         |                 |                |                |             |                   |         |
| Aluminum, Total              | 2.36    |           | mg/l  | 0.0100  | 0.00327 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Antimony, Total              | ND      |           | mg/l  | 0.00400 | 0.00042 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Arsenic, Total               | 0.00934 |           | mg/l  | 0.00050 | 0.00016 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Barium, Total                | 0.06270 |           | mg/l  | 0.00050 | 0.00017 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Beryllium, Total             | 0.00013 | J         | mg/l  | 0.00050 | 0.00010 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Cadmium, Total               | 0.00006 | J         | mg/l  | 0.00020 | 0.00005 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Calcium, Total               | 109.    |           | mg/l  | 0.100   | 0.0394  | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Chromium, Total              | 0.00381 |           | mg/l  | 0.00100 | 0.00017 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Cobalt, Total                | 0.00248 |           | mg/l  | 0.00050 | 0.00016 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Copper, Total                | 0.00618 |           | mg/l  | 0.00100 | 0.00038 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Iron, Total                  | 4.91    |           | mg/l  | 0.0500  | 0.0191  | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Lead, Total                  | 0.00779 |           | mg/l  | 0.00100 | 0.00034 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Magnesium, Total             | 51.0    |           | mg/l  | 0.0700  | 0.0242  | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Manganese, Total             | 0.1487  |           | mg/l  | 0.00100 | 0.00044 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Mercury, Total               | ND      |           | mg/l  | 0.00020 | 0.00006 | 1               | 10/26/17 11:43 | 10/28/17 17:08 | EPA 7470A   | 1,7470A           | MG      |
| Nickel, Total                | 0.00600 |           | mg/l  | 0.00200 | 0.00055 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Potassium, Total             | 6.44    |           | mg/l  | 0.100   | 0.0309  | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Selenium, Total              | 0.00245 | J         | mg/l  | 0.00500 | 0.00173 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Silver, Total                | ND      |           | mg/l  | 0.00040 | 0.00016 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Sodium, Total                | 399.    |           | mg/l  | 0.100   | 0.0293  | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Thallium, Total              | ND      |           | mg/l  | 0.00050 | 0.00014 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Vanadium, Total              | 0.00475 | J         | mg/l  | 0.00500 | 0.00157 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |
| Zinc, Total                  | 0.01889 |           | mg/l  | 0.01000 | 0.00341 | 1               | 10/25/17 16:30 | 10/26/17 11:18 | EPA 3005A   | 1,6020A           | AM      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1738416

Project Number: T0234-016-001

Report Date: 10/30/17

## Method Blank Analysis Batch Quality Control

| Parameter  | Result | Qualifier | Units | RL      | MDL     | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|--|--------|-----------|-------|---------|---------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01-02 Batch: WG1056238-1 |        |           |       |         |         |                    |                  |                  |                      |         |
| Aluminum, Total  | ND     |           | mg/l  | 0.0100  | 0.00327 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Antimony, Total  | ND     |           | mg/l  | 0.00400 | 0.00042 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Arsenic, Total   | ND     |           | mg/l  | 0.00050 | 0.00016 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Barium, Total  | ND     |           | mg/l  | 0.00050 | 0.00017 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Beryllium, Total   | ND     |           | mg/l  | 0.00050 | 0.00010 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Cadmium, Total   | ND     |           | mg/l  | 0.00020 | 0.00005 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Calcium, Total   | ND     |           | mg/l  | 0.100   | 0.0394  | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Chromium, Total  | ND     |           | mg/l  | 0.00100 | 0.00017 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Cobalt, Total  | ND     |           | mg/l  | 0.00050 | 0.00016 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Copper, Total  | ND     |           | mg/l  | 0.00100 | 0.00038 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Iron, Total  | ND     |           | mg/l  | 0.0500  | 0.0191  | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Lead, Total  | ND     |           | mg/l  | 0.00100 | 0.00034 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Magnesium, Total   | ND     |           | mg/l  | 0.0700  | 0.0242  | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Manganese, Total   | ND     |           | mg/l  | 0.00100 | 0.00044 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Nickel, Total  | ND     |           | mg/l  | 0.00200 | 0.00055 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Potassium, Total   | ND     |           | mg/l  | 0.100   | 0.0309  | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Selenium, Total  | ND     |           | mg/l  | 0.00500 | 0.00173 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Silver, Total  | ND     |           | mg/l  | 0.00040 | 0.00016 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Sodium, Total  | ND     |           | mg/l  | 0.100   | 0.0293  | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Thallium, Total  | ND     |           | mg/l  | 0.00050 | 0.00014 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Vanadium, Total  | ND     |           | mg/l  | 0.00500 | 0.00157 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |
| Zinc, Total  | ND     |           | mg/l  | 0.01000 | 0.00341 | 1                  | 10/25/17 16:30   | 10/26/17 10:54   | 1,6020A              | AM      |

### Prep Information

Digestion Method: EPA 3005A

| Parameter  | Result | Qualifier | Units | RL      | MDL     | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|--|--------|-----------|-------|---------|---------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01-02 Batch: WG1056591-1 |        |           |       |         |         |                    |                  |                  |                      |         |
| Mercury, Total   | ND     |           | mg/l  | 0.00020 | 0.00006 | 1                  | 10/26/17 11:43   | 10/28/17 16:46   | 1,7470A              | MG      |



**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1738416

**Project Number:** T0234-016-001

**Report Date:** 10/30/17

## **Method Blank Analysis Batch Quality Control**

### **Prep Information**

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Digestion Method: EPA 7470A

# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1738416

**Project Number:** T0234-016-001

**Report Date:** 10/30/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1056238-2 |                  |      |                   |      |                     |     |      |            |
| Aluminum, Total   | 109              |      | -                 |      | 80-120              | -   |      |            |
| Antimony, Total   | 92               |      | -                 |      | 80-120              | -   |      |            |
| Arsenic, Total  | 98               |      | -                 |      | 80-120              | -   |      |            |
| Barium, Total   | 98               |      | -                 |      | 80-120              | -   |      |            |
| Beryllium, Total  | 100              |      | -                 |      | 80-120              | -   |      |            |
| Cadmium, Total  | 105              |      | -                 |      | 80-120              | -   |      |            |
| Calcium, Total  | 105              |      | -                 |      | 80-120              | -   |      |            |
| Chromium, Total   | 97               |      | -                 |      | 80-120              | -   |      |            |
| Cobalt, Total   | 97               |      | -                 |      | 80-120              | -   |      |            |
| Copper, Total   | 97               |      | -                 |      | 80-120              | -   |      |            |
| Iron, Total   | 103              |      | -                 |      | 80-120              | -   |      |            |
| Lead, Total   | 98               |      | -                 |      | 80-120              | -   |      |            |
| Magnesium, Total  | 104              |      | -                 |      | 80-120              | -   |      |            |
| Manganese, Total  | 103              |      | -                 |      | 80-120              | -   |      |            |
| Nickel, Total   | 98               |      | -                 |      | 80-120              | -   |      |            |
| Potassium, Total  | 104              |      | -                 |      | 80-120              | -   |      |            |
| Selenium, Total   | 101              |      | -                 |      | 80-120              | -   |      |            |
| Silver, Total   | 95               |      | -                 |      | 80-120              | -   |      |            |
| Sodium, Total   | 100              |      | -                 |      | 80-120              | -   |      |            |
| Thallium, Total   | 91               |      | -                 |      | 80-120              | -   |      |            |
| Vanadium, Total   | 98               |      | -                 |      | 80-120              | -   |      |            |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0234-016-001

**Lab Number:** L1738416

**Report Date:** 10/30/17

| Parameter   | LCS<br>%Recovery | LCSD<br>%Recovery | %Recovery<br>Limits | RPD | RPD Limits |
|---|------------------|-------------------|---------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1056238-2 |                  |                   |                     |     |            |
| Zinc, Total   | 95               | -                 | 80-120              | -   |            |
| Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1056591-2 |                  |                   |                     |     |            |
| Mercury, Total  | 100              | -                 | 80-120              | -   |            |

# **Matrix Spike Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

| Parameter  | Native Sample | MS Added | MS Found                 | MS %Recovery | Qual | MSD Found              | MSD %Recovery | Qual | Recovery Limits      | RPD | Qual | RPD Limits |
|--|---------------|----------|--------------------------|--------------|------|------------------------|---------------|------|----------------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 |               |          | QC Batch ID: WG1056238-3 |              |      | QC Sample: L1738407-01 |               |      | Client ID: MS Sample |     |      |            |
| Aluminum, Total  | 0.0120        | 2        | 2.15                     | 107          |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Antimony, Total  | ND            | 0.5      | 0.4831                   | 97           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Arsenic, Total   | 0.00080       | 0.12     | 0.1180                   | 98           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Barium, Total  | 0.03179       | 2        | 1.943                    | 96           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Beryllium, Total   | ND            | 0.05     | 0.04591                  | 92           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Cadmium, Total   | 0.00008J      | 0.051    | 0.05155                  | 101          |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Calcium, Total   | 114.          | 10       | 119                      | 50           | Q    | -                      | -             |      | 75-125               | -   |      | 20         |
| Chromium, Total  | 0.00026J      | 0.2      | 0.1913                   | 96           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Cobalt, Total  | 0.00158       | 0.5      | 0.4680                   | 93           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Copper, Total  | 0.00221       | 0.25     | 0.2393                   | 95           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Iron, Total  | 0.0260J       | 1        | 1.03                     | 103          |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Lead, Total  | ND            | 0.51     | 0.4753                   | 93           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Magnesium, Total   | 17.5          | 10       | 27.1                     | 96           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Manganese, Total   | 0.8722        | 0.5      | 1.320                    | 90           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Nickel, Total  | 0.00406       | 0.5      | 0.4809                   | 95           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Potassium, Total   | 1.87          | 10       | 12.0                     | 101          |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Selenium, Total  | ND            | 0.12     | 0.119                    | 99           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Silver, Total  | ND            | 0.05     | 0.04573                  | 91           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Sodium, Total  | 29.7          | 10       | 37.4                     | 77           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Thallium, Total  | ND            | 0.12     | 0.1051                   | 88           |      | -                      | -             |      | 75-125               | -   |      | 20         |
| Vanadium, Total  | ND            | 0.5      | 0.4789                   | 96           |      | -                      | -             |      | 75-125               | -   |      | 20         |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

| Parameter  | Native Sample | MS Added | MS Found                 | MS %Recovery | MSD Found                          | MSD %Recovery | Recovery Limits      | RPD | RPD Limits |
|--|---------------|----------|--------------------------|--------------|------------------------------------|---------------|----------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 |               |          | QC Batch ID: WG1056238-3 |              | QC Sample: L1738407-01             |               | Client ID: MS Sample |     |            |
| Zinc, Total  | ND            | 0.5      | 0.4674                   | 93           | -                                  | -             | 75-125               | -   | 20         |
| Total Metals - Mansfield Lab Associated sample(s): 01-02 |               |          | QC Batch ID: WG1056591-3 |              | WG1056591-4 QC Sample: L1738611-04 |               | Client ID: MS Sample |     |            |
| Mercury, Total   | ND            | 0.005    | 0.00490                  | 98           | 0.00491                            | 98            | 75-125               | 0   | 20         |
| Total Metals - Mansfield Lab Associated sample(s): 01-02 |               |          | QC Batch ID: WG1056591-5 |              | WG1056591-6 QC Sample: L1738611-05 |               | Client ID: MS Sample |     |            |
| Mercury, Total   | ND            | 0.005    | 0.00493                  | 99           | 0.00506                            | 101           | 75-125               | 3   | 20         |

# **Lab Duplicate Analysis** Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0234-016-001

**Lab Number:** L1738416

**Report Date:** 10/30/17

| Parameter  | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|--|---------------|------------------|-------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 QC Batch ID: WG1056238-4 QC Sample: L1738407-01 Client ID: DUP Sample |               |                  |       |     |      |            |
| Aluminum, Total  | 0.0120        | 0.0128           | mg/l  | 6   |      | 20         |
| Antimony, Total  | ND            | 0.00082J         | mg/l  | NC  |      | 20         |
| Arsenic, Total   | 0.00080       | 0.00082          | mg/l  | 3   |      | 20         |
| Barium, Total  | 0.03179       | 0.02993          | mg/l  | 6   |      | 20         |
| Beryllium, Total   | ND            | ND               | mg/l  | NC  |      | 20         |
| Cadmium, Total   | 0.00008J      | 0.00008J         | mg/l  | NC  |      | 20         |
| Calcium, Total   | 114.          | 110              | mg/l  | 4   |      | 20         |
| Chromium, Total  | 0.00026J      | 0.00024J         | mg/l  | NC  |      | 20         |
| Cobalt, Total  | 0.00158       | 0.00145          | mg/l  | 8   |      | 20         |
| Copper, Total  | 0.00221       | 0.00210          | mg/l  | 5   |      | 20         |
| Iron, Total  | 0.0260J       | 0.0244J          | mg/l  | NC  |      | 20         |
| Lead, Total  | ND            | ND               | mg/l  | NC  |      | 20         |
| Magnesium, Total   | 17.5          | 17.0             | mg/l  | 3   |      | 20         |
| Manganese, Total   | 0.8722        | 0.8323           | mg/l  | 5   |      | 20         |
| Nickel, Total  | 0.00406       | 0.00337          | mg/l  | 19  |      | 20         |
| Potassium, Total   | 1.87          | 1.81             | mg/l  | 3   |      | 20         |
| Selenium, Total  | ND            | ND               | mg/l  | NC  |      | 20         |
| Silver, Total  | ND            | ND               | mg/l  | NC  |      | 20         |
| Sodium, Total  | 29.7          | 28.5             | mg/l  | 4   |      | 20         |



# Lab Duplicate Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0234-016-001

**Lab Number:** L1738416

**Report Date:** 10/30/17

| Parameter  | Native Sample | Duplicate Sample | Units | RPD | RPD Limits |
|--|---------------|------------------|-------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-02 QC Batch ID: WG1056238-4 QC Sample: L1738407-01 Client ID: DUP Sample |               |                  |       |     |            |
| Thallium, Total  | ND            | ND               | mg/l  | NC  | 20         |
| Vanadium, Total  | ND            | ND               | mg/l  | NC  | 20         |
| Zinc, Total  | ND            | ND               | mg/l  | NC  | 20         |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information**

| Cooler | Custody Seal |
|--------|--------------|
| B      | Absent       |
| C      | Absent       |

**Container Information**

| Container ID | Container Type               | Cooler | Initial pH | Final pH | Temp deg C | Pres | Seal   | Frozen Date/Time | Analysis(*)  |
|--------------|------------------------------|--------|------------|----------|------------|------|--------|------------------|--|
| L1738416-01A | Vial HCl preserved           | B      | NA         |          | 2.6        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1738416-01B | Vial HCl preserved           | B      | NA         |          | 2.6        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1738416-01C | Vial HCl preserved           | B      | NA         |          | 2.6        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1738416-01D | Plastic 250ml HNO3 preserved | B      | <2         | <2       | 2.6        | Y    | Absent |                  | BA-6020T(180),FE-6020T(180),SE-6020T(180),TL-6020T(180),CA-6020T(180),CR-6020T(180),K-6020T(180),NI-6020T(180),CU-6020T(180),NA-6020T(180),ZN-6020T(180),PB-6020T(180),BE-6020T(180),MN-6020T(180),AS-6020T(180),SB-6020T(180),V-6020T(180),AG-6020T(180),AL-6020T(180),CD-6020T(180),HG-T(28),MG-6020T(180),CO-6020T(180) |
| L1738416-01E | Amber 500ml unpreserved      | B      | 7          | 7        | 2.6        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1738416-01F | Amber 500ml unpreserved      | B      | 7          | 7        | 2.6        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1738416-01G | Amber 1000ml unpreserved     | B      | 7          | 7        | 2.6        | Y    | Absent |                  | HERB-APA(7)  |
| L1738416-01H | Amber 1000ml unpreserved     | B      | 7          | 7        | 2.6        | Y    | Absent |                  | HERB-APA(7)  |
| L1738416-01I | Amber 1000ml unpreserved     | B      | 7          | 7        | 2.6        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1738416-01J | Amber 1000ml unpreserved     | B      | 7          | 7        | 2.6        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1738416-01K | Amber 1000ml unpreserved     | B      | 7          | 7        | 2.6        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |
| L1738416-01L | Amber 1000ml unpreserved     | B      | 7          | 7        | 2.6        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |
| L1738416-02A | Vial HCl preserved           | C      | NA         |          | 2.1        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1738416-02B | Vial HCl preserved           | C      | NA         |          | 2.1        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1738416-02C | Vial HCl preserved           | C      | NA         |          | 2.1        | Y    | Absent |                  | NYTCL-8260-R2(14)  |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Serial\_No:** 10301716:07  
**Lab Number:** L1738416  
**Report Date:** 10/30/17

**Container Information**

| Container ID | Container Type               | Cooler | Initial pH | Final pH | Temp deg C | Pres | Seal   | Frozen Date/Time | Analysis(*)  |
|--------------|------------------------------|--------|------------|----------|------------|------|--------|------------------|--|
| L1738416-02D | Plastic 250ml HNO3 preserved | C      | <2         | <2       | 2.1        | Y    | Absent |                  | BA-6020T(180),FE-6020T(180),SE-6020T(180),TL-6020T(180),CA-6020T(180),CR-6020T(180),K-6020T(180),NI-6020T(180),CU-6020T(180),NA-6020T(180),ZN-6020T(180),PB-6020T(180),BE-6020T(180),MN-6020T(180),AS-6020T(180),SB-6020T(180),V-6020T(180),AG-6020T(180),AL-6020T(180),CD-6020T(180),HG-T(28),MG-6020T(180),CO-6020T(180) |
| L1738416-02E | Amber 500ml unpreserved      | C      | 7          | 7        | 2.1        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1738416-02F | Amber 500ml unpreserved      | C      | 7          | 7        | 2.1        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1738416-02G | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.1        | Y    | Absent |                  | HERB-APA(7)  |
| L1738416-02H | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.1        | Y    | Absent |                  | HERB-APA(7)  |
| L1738416-02I | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.1        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1738416-02J | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.1        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1738416-02K | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.1        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |
| L1738416-02L | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.1        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1738416**Project Number:** T0234-016-001**Report Date:** 10/30/17

## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



**Alpha Analytical, Inc.**

ID No.:17873

Facility: **Company-wide**

Revision 10

Department: **Quality Assurance**

Published Date: 1/16/2017 11:00:05 AM

Title: **Certificate/Approval Program Summary**

Page 1 of 1

**Certification Information**

The following analytes are not included in our Primary NELAP Scope of Accreditation:

**Westborough Facility****EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** NPW and SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**EPA 9012B:** NPW: Total Cyanide**EPA 9050A:** NPW: Specific Conductance**SM3500:** NPW: Ferrous Iron**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.**SM5310C:** DW: Dissolved Organic Carbon**Mansfield Facility****SM 2540D:** TSS**EPA 3005A** NPW**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene,

3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.

**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

**Westborough Facility:****Drinking Water****EPA 300.0:** Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE, EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH, EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E.****Mansfield Facility:****Drinking Water****EPA 200.7:** Ba, Be, Cd, Cr, Cu, Ni, Na, Ca. **EPA 200.8:** Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Ni, Se, TL. **EPA 245.1 Hg.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.



10124117

L738416

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)





## ANALYTICAL REPORT

|                 |   |
|-----------------|---|
| Lab Number:     | L1741813  |
| Client:         | Turnkey Environmental Restoration, LLC<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley   |
| Phone:          | (716) 856-0599  |
| Project Name:   | MAIN & E. BALCOM  |
| Project Number: | B0234-016-001-0040  |
| Report Date:    | 11/21/17  |

The original project report/data package is held by Alpha Analytical. This report/data package is paginated and should be reproduced only in its entirety. Alpha Analytical holds no responsibility for results and/or data that are not consistent with the original.

Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)



**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1741813-01                | MW-4 (8-10')     | SOIL          | BUFFALO, NY                | 11/13/17 14:00                  | 11/14/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

---

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

### Case Narrative (continued)

#### Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

#### Sample Receipt

L1741813-01: The sample was received in inappropriate containers for the TCL Volatiles - EPA 8260C analysis.

#### Volatile Organics

Any reported concentrations that are below 200 ug/kg may be biased low due to the sample not being collected according to 5035-L/5035A-L low-level specifications.

#### Total Metals

L1741813-01: The sample has elevated detection limits for all elements, with the exception of mercury, due to the dilution required by matrix interferences encountered during analysis.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:



Kara Soroko

Title: Technical Director/Representative

Date: 11/21/17

# ORGANICS

# **VOLATILES**

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

**SAMPLE RESULTS**

**Lab ID:** L1741813-01  
**Client ID:** MW-4 (8-10')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 11/13/17 14:00  
**Date Received:** 11/14/17  
**Field Prep:** Not Specified

**Matrix:** Soil  
**Analytical Method:** 1,8260C  
**Analytical Date:** 11/20/17 10:31  
**Analyst:** MV  
**Percent Solids:** 87%

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                           | ND     |           | ug/kg | 9.4  | 1.5  | 1               |
| 1,1-Dichloroethane                           | ND     |           | ug/kg | 1.4  | 0.25 | 1               |
| Chloroform                                   | ND     |           | ug/kg | 1.4  | 0.35 | 1               |
| Carbon tetrachloride                         | ND     |           | ug/kg | 0.94 | 0.32 | 1               |
| 1,2-Dichloropropane                          | ND     |           | ug/kg | 3.3  | 0.21 | 1               |
| Dibromochloromethane                         | ND     |           | ug/kg | 0.94 | 0.16 | 1               |
| 1,1,2-Trichloroethane                        | ND     |           | ug/kg | 1.4  | 0.29 | 1               |
| Tetrachloroethene                            | ND     |           | ug/kg | 0.94 | 0.28 | 1               |
| Chlorobenzene                                | ND     |           | ug/kg | 0.94 | 0.33 | 1               |
| Trichlorofluoromethane                       | ND     |           | ug/kg | 4.7  | 0.39 | 1               |
| 1,2-Dichloroethane                           | ND     |           | ug/kg | 0.94 | 0.23 | 1               |
| 1,1,1-Trichloroethane                        | ND     |           | ug/kg | 0.94 | 0.33 | 1               |
| Bromodichloromethane                         | ND     |           | ug/kg | 0.94 | 0.29 | 1               |
| trans-1,3-Dichloropropene                    | ND     |           | ug/kg | 0.94 | 0.20 | 1               |
| cis-1,3-Dichloropropene                      | ND     |           | ug/kg | 0.94 | 0.22 | 1               |
| Bromoform                                    | ND     |           | ug/kg | 3.8  | 0.22 | 1               |
| 1,1,2,2-Tetrachloroethane                    | ND     |           | ug/kg | 0.94 | 0.28 | 1               |
| Benzene                                      | 0.35   | J         | ug/kg | 0.94 | 0.18 | 1               |
| Toluene                                      | ND     |           | ug/kg | 1.4  | 0.18 | 1               |
| Ethylbenzene                                 | ND     |           | ug/kg | 0.94 | 0.16 | 1               |
| Chloromethane                                | ND     |           | ug/kg | 4.7  | 0.41 | 1               |
| Bromomethane                                 | ND     |           | ug/kg | 1.9  | 0.32 | 1               |
| Vinyl chloride                               | ND     |           | ug/kg | 1.9  | 0.30 | 1               |
| Chloroethane                                 | ND     |           | ug/kg | 1.9  | 0.30 | 1               |
| 1,1-Dichloroethene                           | ND     |           | ug/kg | 0.94 | 0.35 | 1               |
| trans-1,2-Dichloroethene                     | 0.32   | J         | ug/kg | 1.4  | 0.23 | 1               |
| Trichloroethene                              | 2.4    |           | ug/kg | 0.94 | 0.28 | 1               |
| 1,2-Dichlorobenzene                          | ND     |           | ug/kg | 4.7  | 0.17 | 1               |
| 1,3-Dichlorobenzene                          | ND     |           | ug/kg | 4.7  | 0.20 | 1               |
| 1,4-Dichlorobenzene                          | ND     |           | ug/kg | 4.7  | 0.17 | 1               |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

**SAMPLE RESULTS**

**Lab ID:** L1741813-01  
**Client ID:** MW-4 (8-10')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 11/13/17 14:00  
**Date Received:** 11/14/17  
**Field Prep:** Not Specified

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 1.9  | 0.14 | 1               |
| p/m-Xylene                                   | ND     |           | ug/kg | 1.9  | 0.33 | 1               |
| o-Xylene                                     | ND     |           | ug/kg | 1.9  | 0.32 | 1               |
| cis-1,2-Dichloroethene                       | ND     |           | ug/kg | 0.94 | 0.32 | 1               |
| Styrene                                      | ND     |           | ug/kg | 1.9  | 0.38 | 1               |
| Dichlorodifluoromethane                      | ND     |           | ug/kg | 9.4  | 0.47 | 1               |
| Acetone                                      | 4.8    | J         | ug/kg | 9.4  | 2.2  | 1               |
| Carbon disulfide                             | ND     |           | ug/kg | 9.4  | 1.0  | 1               |
| 2-Butanone                                   | ND     |           | ug/kg | 9.4  | 0.65 | 1               |
| 4-Methyl-2-pentanone                         | ND     |           | ug/kg | 9.4  | 0.23 | 1               |
| 2-Hexanone                                   | ND     |           | ug/kg | 9.4  | 0.62 | 1               |
| Bromochloromethane                           | ND     |           | ug/kg | 4.7  | 0.34 | 1               |
| 1,2-Dibromoethane                            | ND     |           | ug/kg | 3.8  | 0.19 | 1               |
| 1,2-Dibromo-3-chloropropane                  | ND     |           | ug/kg | 4.7  | 0.37 | 1               |
| Isopropylbenzene                             | ND     |           | ug/kg | 0.94 | 0.18 | 1               |
| 1,2,3-Trichlorobenzene                       | ND     |           | ug/kg | 4.7  | 0.24 | 1               |
| 1,2,4-Trichlorobenzene                       | ND     |           | ug/kg | 4.7  | 0.20 | 1               |
| Methyl Acetate                               | ND     |           | ug/kg | 19   | 0.43 | 1               |
| Cyclohexane                                  | ND     |           | ug/kg | 19   | 0.41 | 1               |
| 1,4-Dioxane                                  | ND     |           | ug/kg | 38   | 14.  | 1               |
| Freon-113                                    | ND     |           | ug/kg | 19   | 0.48 | 1               |
| Methyl cyclohexane                           | ND     |           | ug/kg | 3.8  | 0.22 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 106        |           | 70-130              |
| Toluene-d8            | 102        |           | 70-130              |
| 4-Bromofluorobenzene  | 107        |           | 70-130              |
| Dibromofluoromethane  | 100        |           | 70-130              |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1741813

Project Number: B0234-016-001-0040

Report Date: 11/21/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 11/20/17 08:42  
 Analyst: MV

| Parameter   | Result | Qualifier | Units | RL  | MDL  |
|---|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1064789-5 |        |           |       |     |      |
| Methylene chloride  | ND     |           | ug/kg | 10  | 1.6  |
| 1,1-Dichloroethane  | ND     |           | ug/kg | 1.5 | 0.27 |
| Chloroform  | ND     |           | ug/kg | 1.5 | 0.37 |
| Carbon tetrachloride  | ND     |           | ug/kg | 1.0 | 0.34 |
| 1,2-Dichloropropane   | ND     |           | ug/kg | 3.5 | 0.23 |
| Dibromochloromethane  | ND     |           | ug/kg | 1.0 | 0.18 |
| 1,1,2-Trichloroethane   | ND     |           | ug/kg | 1.5 | 0.31 |
| Tetrachloroethene   | ND     |           | ug/kg | 1.0 | 0.30 |
| Chlorobenzene   | ND     |           | ug/kg | 1.0 | 0.35 |
| Trichlorofluoromethane  | ND     |           | ug/kg | 5.0 | 0.42 |
| 1,2-Dichloroethane  | ND     |           | ug/kg | 1.0 | 0.25 |
| 1,1,1-Trichloroethane   | ND     |           | ug/kg | 1.0 | 0.35 |
| Bromodichloromethane  | ND     |           | ug/kg | 1.0 | 0.31 |
| trans-1,3-Dichloropropene   | ND     |           | ug/kg | 1.0 | 0.21 |
| cis-1,3-Dichloropropene   | ND     |           | ug/kg | 1.0 | 0.23 |
| Bromoform   | ND     |           | ug/kg | 4.0 | 0.24 |
| 1,1,2,2-Tetrachloroethane   | ND     |           | ug/kg | 1.0 | 0.30 |
| Benzene   | ND     |           | ug/kg | 1.0 | 0.19 |
| Toluene   | ND     |           | ug/kg | 1.5 | 0.20 |
| Ethylbenzene  | ND     |           | ug/kg | 1.0 | 0.17 |
| Chloromethane   | ND     |           | ug/kg | 5.0 | 0.44 |
| Bromomethane  | ND     |           | ug/kg | 2.0 | 0.34 |
| Vinyl chloride  | ND     |           | ug/kg | 2.0 | 0.32 |
| Chloroethane  | ND     |           | ug/kg | 2.0 | 0.32 |
| 1,1-Dichloroethene  | ND     |           | ug/kg | 1.0 | 0.37 |
| trans-1,2-Dichloroethene  | ND     |           | ug/kg | 1.5 | 0.24 |
| Trichloroethene   | ND     |           | ug/kg | 1.0 | 0.30 |
| 1,2-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.18 |
| 1,3-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.22 |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1741813

Project Number: B0234-016-001-0040

Report Date: 11/21/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 11/20/17 08:42  
 Analyst: MV

| Parameter   | Result | Qualifier | Units | RL  | MDL  |
|---|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1064789-5 |        |           |       |     |      |
| 1,4-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.18 |
| Methyl tert butyl ether   | ND     |           | ug/kg | 2.0 | 0.15 |
| p/m-Xylene  | ND     |           | ug/kg | 2.0 | 0.35 |
| o-Xylene  | ND     |           | ug/kg | 2.0 | 0.34 |
| cis-1,2-Dichloroethene  | ND     |           | ug/kg | 1.0 | 0.34 |
| Styrene   | ND     |           | ug/kg | 2.0 | 0.40 |
| Dichlorodifluoromethane   | ND     |           | ug/kg | 10  | 0.50 |
| Acetone   | ND     |           | ug/kg | 10  | 2.3  |
| Carbon disulfide  | ND     |           | ug/kg | 10  | 1.1  |
| 2-Butanone  | ND     |           | ug/kg | 10  | 0.69 |
| 4-Methyl-2-pentanone  | ND     |           | ug/kg | 10  | 0.24 |
| 2-Hexanone  | ND     |           | ug/kg | 10  | 0.67 |
| Bromochloromethane  | ND     |           | ug/kg | 5.0 | 0.36 |
| 1,2-Dibromoethane   | ND     |           | ug/kg | 4.0 | 0.20 |
| 1,2-Dibromo-3-chloropropane   | ND     |           | ug/kg | 5.0 | 0.40 |
| Isopropylbenzene  | ND     |           | ug/kg | 1.0 | 0.19 |
| 1,2,3-Trichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.25 |
| 1,2,4-Trichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.22 |
| Methyl Acetate  | ND     |           | ug/kg | 20  | 0.46 |
| Cyclohexane   | ND     |           | ug/kg | 20  | 0.43 |
| 1,4-Dioxane   | ND     |           | ug/kg | 40  | 14.  |
| Freon-113   | ND     |           | ug/kg | 20  | 0.51 |
| Methyl cyclohexane  | ND     |           | ug/kg | 4.0 | 0.24 |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1741813**Project Number:** B0234-016-001-0040**Report Date:** 11/21/17**Method Blank Analysis**  
**Batch Quality Control**

Analytical Method: 1,8260C

Analytical Date: 11/20/17 08:42

Analyst: MV

| Parameter   | Result | Qualifier | Units | RL | MDL |
|---|--------|-----------|-------|----|-----|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1064789-5 |        |           |       |    |     |

| Surrogate             | %Recovery | Qualifier | Acceptance<br>Criteria |
|-----------------------|-----------|-----------|------------------------|
| 1,2-Dichloroethane-d4 | 110       |           | 70-130                 |
| Toluene-d8            | 102       |           | 70-130                 |
| 4-Bromofluorobenzene  | 104       |           | 70-130                 |
| Dibromofluoromethane  | 101       |           | 70-130                 |

# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1064789-3 WG1064789-4 |                  |      |                   |      |                     |     |      |               |
| Methylene chloride   | 99               |      | 100               |      | 70-130              | 1   |      | 30            |
| 1,1-Dichloroethane   | 103              |      | 105               |      | 70-130              | 2   |      | 30            |
| Chloroform   | 100              |      | 100               |      | 70-130              | 0   |      | 30            |
| Carbon tetrachloride   | 92               |      | 93                |      | 70-130              | 1   |      | 30            |
| 1,2-Dichloropropane  | 108              |      | 108               |      | 70-130              | 0   |      | 30            |
| Dibromochloromethane   | 91               |      | 94                |      | 70-130              | 3   |      | 30            |
| 1,1,2-Trichloroethane  | 108              |      | 110               |      | 70-130              | 2   |      | 30            |
| Tetrachloroethene  | 93               |      | 93                |      | 70-130              | 0   |      | 30            |
| Chlorobenzene  | 98               |      | 98                |      | 70-130              | 0   |      | 30            |
| Trichlorofluoromethane   | 121              |      | 120               |      | 70-139              | 1   |      | 30            |
| 1,2-Dichloroethane   | 108              |      | 110               |      | 70-130              | 2   |      | 30            |
| 1,1,1-Trichloroethane  | 101              |      | 102               |      | 70-130              | 1   |      | 30            |
| Bromodichloromethane   | 105              |      | 106               |      | 70-130              | 1   |      | 30            |
| trans-1,3-Dichloropropene  | 98               |      | 98                |      | 70-130              | 0   |      | 30            |
| cis-1,3-Dichloropropene  | 102              |      | 105               |      | 70-130              | 3   |      | 30            |
| Bromoform  | 91               |      | 95                |      | 70-130              | 4   |      | 30            |
| 1,1,2,2-Tetrachloroethane  | 118              |      | 120               |      | 70-130              | 2   |      | 30            |
| Benzene  | 102              |      | 102               |      | 70-130              | 0   |      | 30            |
| Toluene  | 100              |      | 100               |      | 70-130              | 0   |      | 30            |
| Ethylbenzene   | 102              |      | 102               |      | 70-130              | 0   |      | 30            |
| Chloromethane  | 106              |      | 105               |      | 52-130              | 1   |      | 30            |
| Bromomethane   | 98               |      | 102               |      | 57-147              | 4   |      | 30            |
| Vinyl chloride   | 125              |      | 126               |      | 67-130              | 1   |      | 30            |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1064789-3 WG1064789-4 |                  |      |                   |      |                     |     |      |               |
| Chloroethane   | 122              |      | 118               |      | 50-151              | 3   |      | 30            |
| 1,1-Dichloroethene   | 118              |      | 117               |      | 65-135              | 1   |      | 30            |
| trans-1,2-Dichloroethene   | 98               |      | 98                |      | 70-130              | 0   |      | 30            |
| Trichloroethene  | 100              |      | 101               |      | 70-130              | 1   |      | 30            |
| 1,2-Dichlorobenzene  | 96               |      | 96                |      | 70-130              | 0   |      | 30            |
| 1,3-Dichlorobenzene  | 95               |      | 94                |      | 70-130              | 1   |      | 30            |
| 1,4-Dichlorobenzene  | 97               |      | 95                |      | 70-130              | 2   |      | 30            |
| Methyl tert butyl ether  | 104              |      | 104               |      | 66-130              | 0   |      | 30            |
| p/m-Xylene   | 96               |      | 96                |      | 70-130              | 0   |      | 30            |
| o-Xylene   | 95               |      | 96                |      | 70-130              | 1   |      | 30            |
| cis-1,2-Dichloroethene   | 98               |      | 100               |      | 70-130              | 2   |      | 30            |
| Styrene  | 96               |      | 97                |      | 70-130              | 1   |      | 30            |
| Dichlorodifluoromethane  | 104              |      | 104               |      | 30-146              | 0   |      | 30            |
| Acetone  | 132              |      | 132               |      | 54-140              | 0   |      | 30            |
| Carbon disulfide   | 119              |      | 120               |      | 59-130              | 1   |      | 30            |
| 2-Butanone   | 143              | Q    | 137               | Q    | 70-130              | 4   |      | 30            |
| 4-Methyl-2-pentanone   | 130              |      | 131               | Q    | 70-130              | 1   |      | 30            |
| 2-Hexanone   | 128              |      | 130               |      | 70-130              | 2   |      | 30            |
| Bromochloromethane   | 99               |      | 100               |      | 70-130              | 1   |      | 30            |
| 1,2-Dibromoethane  | 106              |      | 107               |      | 70-130              | 1   |      | 30            |
| 1,2-Dibromo-3-chloropropane  | 105              |      | 108               |      | 68-130              | 3   |      | 30            |
| Isopropylbenzene   | 100              |      | 100               |      | 70-130              | 0   |      | 30            |
| 1,2,3-Trichlorobenzene   | 93               |      | 93                |      | 70-130              | 0   |      | 30            |

# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| <b>Parameter</b>   | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|--|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1064789-3 WG1064789-4 |                          |             |                           |             |                             |            |             |                       |
| 1,2,4-Trichlorobenzene   | 92                       |             | 91                        |             | 70-130                      | 1          |             | 30                    |
| Methyl Acetate   | 125                      |             | 128                       |             | 51-146                      | 2          |             | 30                    |
| Cyclohexane  | 114                      |             | 114                       |             | 59-142                      | 0          |             | 30                    |
| 1,4-Dioxane  | 124                      |             | 123                       |             | 65-136                      | 1          |             | 30                    |
| Freon-113  | 120                      |             | 120                       |             | 50-139                      | 0          |             | 30                    |
| Methyl cyclohexane   | 109                      |             | 108                       |             | 70-130                      | 1          |             | 30                    |

| <b>Surrogate</b>      | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> |
|-----------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|
| 1,2-Dichloroethane-d4 | 110                      |             | 111                       |             | 70-130                         |
| Toluene-d8            | 98                       |             | 100                       |             | 70-130                         |
| 4-Bromofluorobenzene  | 102                      |             | 101                       |             | 70-130                         |
| Dibromofluoromethane  | 100                      |             | 102                       |             | 70-130                         |

# SEMIVOLATILES

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

**SAMPLE RESULTS**

**Lab ID:** L1741813-01  
**Client ID:** MW-4 (8-10')  
**Sample Location:** BUFFALO, NY

**Date Collected:** 11/13/17 14:00  
**Date Received:** 11/14/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3546  
**Extraction Date:** 11/18/17 16:05

**Matrix:** Soil  
**Analytical Method:** 1,8270D  
**Analytical Date:** 11/20/17 16:42  
**Analyst:** CB  
**Percent Solids:** 87%

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Acenaphthene                                     | ND     |           | ug/kg | 150 | 19. | 1               |
| Hexachlorobenzene                                | ND     |           | ug/kg | 110 | 21. | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/kg | 170 | 25. | 1               |
| 2-Chloronaphthalene                              | ND     |           | ug/kg | 190 | 18. | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/kg | 190 | 50. | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 37. | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/kg | 190 | 32. | 1               |
| Fluoranthene                                     | ND     |           | ug/kg | 110 | 21. | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/kg | 190 | 20. | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/kg | 190 | 28. | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/kg | 220 | 32. | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/kg | 200 | 19. | 1               |
| Hexachlorobutadiene                              | ND     |           | ug/kg | 190 | 27. | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/kg | 530 | 170 | 1               |
| Hexachloroethane                                 | ND     |           | ug/kg | 150 | 30. | 1               |
| Isophorone                                       | ND     |           | ug/kg | 170 | 24. | 1               |
| Naphthalene                                      | ND     |           | ug/kg | 190 | 23. | 1               |
| Nitrobenzene                                     | ND     |           | ug/kg | 170 | 28. | 1               |
| NDPA/DPA   | ND     |           | ug/kg | 150 | 21. | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/kg | 190 | 29. | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/kg | 190 | 64. | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/kg | 190 | 47. | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/kg | 190 | 35. | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/kg | 190 | 63. | 1               |
| Diethyl phthalate                                | ND     |           | ug/kg | 190 | 17. | 1               |
| Dimethyl phthalate                               | ND     |           | ug/kg | 190 | 39. | 1               |
| Benzo(a)anthracene                               | ND     |           | ug/kg | 110 | 21. | 1               |
| Benzo(a)pyrene                                   | ND     |           | ug/kg | 150 | 45. | 1               |
| Benzo(b)fluoranthene                             | ND     |           | ug/kg | 110 | 31. | 1               |
| Benzo(k)fluoranthene                             | ND     |           | ug/kg | 110 | 30. | 1               |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1741813

Project Number: B0234-016-001-0040

Report Date: 11/21/17

## SAMPLE RESULTS

Lab ID: L1741813-01

Date Collected: 11/13/17 14:00

Client ID: MW-4 (8-10')

Date Received: 11/14/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL | Dilution Factor |
|--|--------|-----------|-------|-----|-----|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |     |                 |
| Chrysene   | ND     |           | ug/kg | 110 | 19. | 1               |
| Acenaphthylene                                   | ND     |           | ug/kg | 150 | 29. | 1               |
| Anthracene                                       | ND     |           | ug/kg | 110 | 36. | 1               |
| Benzo(ghi)perylene                               | ND     |           | ug/kg | 150 | 22. | 1               |
| Fluorene   | ND     |           | ug/kg | 190 | 18. | 1               |
| Phenanthrene                                     | ND     |           | ug/kg | 110 | 23. | 1               |
| Dibenzo(a,h)anthracene                           | ND     |           | ug/kg | 110 | 22. | 1               |
| Indeno(1,2,3-cd)pyrene                           | ND     |           | ug/kg | 150 | 26. | 1               |
| Pyrene   | ND     |           | ug/kg | 110 | 18. | 1               |
| Biphenyl   | ND     |           | ug/kg | 420 | 43. | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/kg | 190 | 34. | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/kg | 190 | 36. | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/kg | 190 | 35. | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/kg | 190 | 77. | 1               |
| Dibenzofuran                                     | ND     |           | ug/kg | 190 | 18. | 1               |
| 2-Methylnaphthalene                              | ND     |           | ug/kg | 220 | 22. | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/kg | 190 | 19. | 1               |
| Acetophenone                                     | ND     |           | ug/kg | 190 | 23. | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/kg | 110 | 35. | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/kg | 190 | 28. | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/kg | 190 | 22. | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/kg | 170 | 30. | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/kg | 190 | 61. | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/kg | 400 | 70. | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/kg | 260 | 76. | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/kg | 890 | 87. | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/kg | 480 | 89. | 1               |
| Pentachlorophenol                                | ND     |           | ug/kg | 150 | 41. | 1               |
| Phenol   | ND     |           | ug/kg | 190 | 28. | 1               |
| 2-Methylphenol                                   | ND     |           | ug/kg | 190 | 29. | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/kg | 270 | 29. | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/kg | 190 | 36. | 1               |
| Carbazole  | ND     |           | ug/kg | 190 | 18. | 1               |
| Atrazine   | ND     |           | ug/kg | 150 | 65. | 1               |
| Benzaldehyde                                     | ND     |           | ug/kg | 240 | 50. | 1               |
| Caprolactam                                      | ND     |           | ug/kg | 190 | 57. | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/kg | 190 | 38. | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1741813**Project Number:** B0234-016-001-0040**Report Date:** 11/21/17**SAMPLE RESULTS**

Lab ID: L1741813-01

Date Collected: 11/13/17 14:00

Client ID: MW-4 (8-10')

Date Received: 11/14/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 86         |           | 25-120              |
| Phenol-d6            | 92         |           | 10-120              |
| Nitrobenzene-d5      | 80         |           | 23-120              |
| 2-Fluorobiphenyl     | 76         |           | 30-120              |
| 2,4,6-Tribromophenol | 62         |           | 10-136              |
| 4-Terphenyl-d14      | 54         |           | 18-120              |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

**Method Blank Analysis**  
**Batch Quality Control**

**Analytical Method:** 1,8270D  
**Analytical Date:** 11/20/17 15:48  
**Analyst:** EK

**Extraction Method:** EPA 3546  
**Extraction Date:** 11/18/17 16:05

| Parameter   | Result | Qualifier | Units | RL  | MDL |
|---|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1064564-1 |        |           |       |     |     |
| Acenaphthene  | ND     |           | ug/kg | 130 | 17. |
| Hexachlorobenzene   | ND     |           | ug/kg | 98  | 18. |
| Bis(2-chloroethyl)ether   | ND     |           | ug/kg | 150 | 22. |
| 2-Chloronaphthalene   | ND     |           | ug/kg | 160 | 16. |
| 3,3'-Dichlorobenzidine  | ND     |           | ug/kg | 160 | 44. |
| 2,4-Dinitrotoluene  | ND     |           | ug/kg | 160 | 33. |
| 2,6-Dinitrotoluene  | ND     |           | ug/kg | 160 | 28. |
| Fluoranthene  | ND     |           | ug/kg | 98  | 19. |
| 4-Chlorophenyl phenyl ether   | ND     |           | ug/kg | 160 | 18. |
| 4-Bromophenyl phenyl ether  | ND     |           | ug/kg | 160 | 25. |
| Bis(2-chloroisopropyl)ether   | ND     |           | ug/kg | 200 | 28. |
| Bis(2-chloroethoxy)methane  | ND     |           | ug/kg | 180 | 16. |
| Hexachlorobutadiene   | ND     |           | ug/kg | 160 | 24. |
| Hexachlorocyclopentadiene   | ND     |           | ug/kg | 470 | 150 |
| Hexachloroethane  | ND     |           | ug/kg | 130 | 26. |
| Isophorone  | ND     |           | ug/kg | 150 | 21. |
| Naphthalene   | ND     |           | ug/kg | 160 | 20. |
| Nitrobenzene  | ND     |           | ug/kg | 150 | 24. |
| NDPA/DPA  | ND     |           | ug/kg | 130 | 19. |
| n-Nitrosodi-n-propylamine   | ND     |           | ug/kg | 160 | 25. |
| Bis(2-ethylhexyl)phthalate  | ND     |           | ug/kg | 160 | 57. |
| Butyl benzyl phthalate  | ND     |           | ug/kg | 160 | 41. |
| Di-n-butylphthalate   | ND     |           | ug/kg | 160 | 31. |
| Di-n-octylphthalate   | ND     |           | ug/kg | 160 | 56. |
| Diethyl phthalate   | ND     |           | ug/kg | 160 | 15. |
| Dimethyl phthalate  | ND     |           | ug/kg | 160 | 34. |
| Benzo(a)anthracene  | ND     |           | ug/kg | 98  | 18. |
| Benzo(a)pyrene  | ND     |           | ug/kg | 130 | 40. |
| Benzo(b)fluoranthene  | ND     |           | ug/kg | 98  | 28. |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

**Method Blank Analysis**  
**Batch Quality Control**

**Analytical Method:** 1,8270D  
**Analytical Date:** 11/20/17 15:48  
**Analyst:** EK

**Extraction Method:** EPA 3546  
**Extraction Date:** 11/18/17 16:05

| Parameter   | Result | Qualifier | Units | RL  | MDL |
|---|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1064564-1 |        |           |       |     |     |
| Benzo(k)fluoranthene  | ND     |           | ug/kg | 98  | 26. |
| Chrysene  | ND     |           | ug/kg | 98  | 17. |
| Acenaphthylene  | ND     |           | ug/kg | 130 | 25. |
| Anthracene  | ND     |           | ug/kg | 98  | 32. |
| Benzo(ghi)perylene  | ND     |           | ug/kg | 130 | 19. |
| Fluorene  | ND     |           | ug/kg | 160 | 16. |
| Phenanthrene  | ND     |           | ug/kg | 98  | 20. |
| Dibenzo(a,h)anthracene  | ND     |           | ug/kg | 98  | 19. |
| Indeno(1,2,3-cd)pyrene  | ND     |           | ug/kg | 130 | 23. |
| Pyrene  | ND     |           | ug/kg | 98  | 16. |
| Biphenyl  | ND     |           | ug/kg | 370 | 38. |
| 4-Chloroaniline   | ND     |           | ug/kg | 160 | 30. |
| 2-Nitroaniline  | ND     |           | ug/kg | 160 | 32. |
| 3-Nitroaniline  | ND     |           | ug/kg | 160 | 31. |
| 4-Nitroaniline  | ND     |           | ug/kg | 160 | 68. |
| Dibenzofuran  | ND     |           | ug/kg | 160 | 15. |
| 2-Methylnaphthalene   | ND     |           | ug/kg | 200 | 20. |
| 1,2,4,5-Tetrachlorobenzene  | ND     |           | ug/kg | 160 | 17. |
| Acetophenone  | ND     |           | ug/kg | 160 | 20. |
| 2,4,6-Trichlorophenol   | ND     |           | ug/kg | 98  | 31. |
| p-Chloro-m-cresol   | ND     |           | ug/kg | 160 | 24. |
| 2-Chlorophenol  | ND     |           | ug/kg | 160 | 19. |
| 2,4-Dichlorophenol  | ND     |           | ug/kg | 150 | 26. |
| 2,4-Dimethylphenol  | ND     |           | ug/kg | 160 | 54. |
| 2-Nitrophenol   | ND     |           | ug/kg | 350 | 62. |
| 4-Nitrophenol   | ND     |           | ug/kg | 230 | 67. |
| 2,4-Dinitrophenol   | ND     |           | ug/kg | 790 | 76. |
| 4,6-Dinitro-o-cresol  | ND     |           | ug/kg | 420 | 79. |
| Pentachlorophenol   | ND     |           | ug/kg | 130 | 36. |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

**Method Blank Analysis  
Batch Quality Control**

**Analytical Method:** 1,8270D  
**Analytical Date:** 11/20/17 15:48  
**Analyst:** EK

**Extraction Method:** EPA 3546  
**Extraction Date:** 11/18/17 16:05

| Parameter   | Result | Qualifier | Units | RL  | MDL |
|---|--------|-----------|-------|-----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1064564-1 |        |           |       |     |     |
| Phenol  | ND     |           | ug/kg | 160 | 25. |
| 2-Methylphenol  | ND     |           | ug/kg | 160 | 25. |
| 3-Methylphenol/4-Methylphenol   | ND     |           | ug/kg | 240 | 26. |
| 2,4,5-Trichlorophenol   | ND     |           | ug/kg | 160 | 31. |
| Carbazole   | ND     |           | ug/kg | 160 | 16. |
| Atrazine  | ND     |           | ug/kg | 130 | 57. |
| Benzaldehyde  | ND     |           | ug/kg | 220 | 44. |
| Caprolactam   | ND     |           | ug/kg | 160 | 50. |
| 2,3,4,6-Tetrachlorophenol   | ND     |           | ug/kg | 160 | 33. |

**Tentatively Identified Compounds**

No Tentatively Identified Compounds      ND      ug/kg

| Surrogate            | %Recovery | Qualifier | Acceptance Criteria |
|----------------------|-----------|-----------|---------------------|
| 2-Fluorophenol       | 87        |           | 25-120              |
| Phenol-d6            | 90        |           | 10-120              |
| Nitrobenzene-d5      | 81        |           | 23-120              |
| 2-Fluorobiphenyl     | 79        |           | 30-120              |
| 2,4,6-Tribromophenol | 90        |           | 10-136              |
| 4-Terphenyl-d14      | 81        |           | 18-120              |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1064564-2 WG1064564-3 |                  |      |                   |      |                     |     |      |               |
| Acenaphthene   | 80               |      | 78                |      | 31-137              | 3   |      | 50            |
| Hexachlorobenzene  | 90               |      | 86                |      | 40-140              | 5   |      | 50            |
| Bis(2-chloroethyl)ether  | 82               |      | 78                |      | 40-140              | 5   |      | 50            |
| 2-Chloronaphthalene  | 86               |      | 83                |      | 40-140              | 4   |      | 50            |
| 3,3'-Dichlorobenzidine   | 100              |      | 97                |      | 40-140              | 3   |      | 50            |
| 2,4-Dinitrotoluene   | 99               |      | 93                |      | 40-132              | 6   |      | 50            |
| 2,6-Dinitrotoluene   | 91               |      | 88                |      | 40-140              | 3   |      | 50            |
| Fluoranthene   | 94               |      | 91                |      | 40-140              | 3   |      | 50            |
| 4-Chlorophenyl phenyl ether  | 86               |      | 82                |      | 40-140              | 5   |      | 50            |
| 4-Bromophenyl phenyl ether   | 87               |      | 84                |      | 40-140              | 4   |      | 50            |
| Bis(2-chloroisopropyl)ether  | 89               |      | 86                |      | 40-140              | 3   |      | 50            |
| Bis(2-chloroethoxy)methane   | 83               |      | 80                |      | 40-117              | 4   |      | 50            |
| Hexachlorobutadiene  | 86               |      | 82                |      | 40-140              | 5   |      | 50            |
| Hexachlorocyclopentadiene  | 26               | Q    | 25                | Q    | 40-140              | 4   |      | 50            |
| Hexachloroethane   | 83               |      | 78                |      | 40-140              | 6   |      | 50            |
| Isophorone   | 85               |      | 82                |      | 40-140              | 4   |      | 50            |
| Naphthalene  | 82               |      | 79                |      | 40-140              | 4   |      | 50            |
| Nitrobenzene   | 87               |      | 84                |      | 40-140              | 4   |      | 50            |
| NDPA/DPA   | 89               |      | 85                |      | 36-157              | 5   |      | 50            |
| n-Nitrosodi-n-propylamine  | 90               |      | 87                |      | 32-121              | 3   |      | 50            |
| Bis(2-ethylhexyl)phthalate   | 106              |      | 105               |      | 40-140              | 1   |      | 50            |
| Butyl benzyl phthalate   | 116              |      | 110               |      | 40-140              | 5   |      | 50            |
| Di-n-butylphthalate  | 99               |      | 95                |      | 40-140              | 4   |      | 50            |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1064564-2 WG1064564-3 |                  |      |                   |      |                     |     |      |               |
| Di-n-octylphthalate  | 110              |      | 106               |      | 40-140              | 4   |      | 50            |
| Diethyl phthalate  | 89               |      | 84                |      | 40-140              | 6   |      | 50            |
| Dimethyl phthalate   | 84               |      | 81                |      | 40-140              | 4   |      | 50            |
| Benzo(a)anthracene   | 93               |      | 90                |      | 40-140              | 3   |      | 50            |
| Benzo(a)pyrene   | 96               |      | 95                |      | 40-140              | 1   |      | 50            |
| Benzo(b)fluoranthene   | 96               |      | 95                |      | 40-140              | 1   |      | 50            |
| Benzo(k)fluoranthene   | 89               |      | 86                |      | 40-140              | 3   |      | 50            |
| Chrysene   | 88               |      | 86                |      | 40-140              | 2   |      | 50            |
| Acenaphthylene   | 90               |      | 85                |      | 40-140              | 6   |      | 50            |
| Anthracene   | 91               |      | 88                |      | 40-140              | 3   |      | 50            |
| Benzo(ghi)perylene   | 92               |      | 89                |      | 40-140              | 3   |      | 50            |
| Fluorene   | 88               |      | 82                |      | 40-140              | 7   |      | 50            |
| Phenanthrene   | 87               |      | 85                |      | 40-140              | 2   |      | 50            |
| Dibenzo(a,h)anthracene   | 91               |      | 90                |      | 40-140              | 1   |      | 50            |
| Indeno(1,2,3-cd)pyrene   | 93               |      | 92                |      | 40-140              | 1   |      | 50            |
| Pyrene   | 93               |      | 89                |      | 35-142              | 4   |      | 50            |
| Biphenyl   | 86               |      | 83                |      | 54-104              | 4   |      | 50            |
| 4-Chloroaniline  | 61               |      | 56                |      | 40-140              | 9   |      | 50            |
| 2-Nitroaniline   | 102              |      | 97                |      | 47-134              | 5   |      | 50            |
| 3-Nitroaniline   | 87               |      | 82                |      | 26-129              | 6   |      | 50            |
| 4-Nitroaniline   | 89               |      | 84                |      | 41-125              | 6   |      | 50            |
| Dibenzofuran   | 87               |      | 82                |      | 40-140              | 6   |      | 50            |
| 2-Methylnaphthalene  | 83               |      | 80                |      | 40-140              | 4   |      | 50            |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1064564-2 WG1064564-3 |                  |      |                   |      |                     |     |      |               |
| 1,2,4,5-Tetrachlorobenzene   | 87               |      | 83                |      | 40-117              | 5   |      | 50            |
| Acetophenone   | 91               |      | 88                |      | 14-144              | 3   |      | 50            |
| 2,4,6-Trichlorophenol  | 96               |      | 92                |      | 30-130              | 4   |      | 50            |
| p-Chloro-m-cresol  | 96               |      | 91                |      | 26-103              | 5   |      | 50            |
| 2-Chlorophenol   | 92               |      | 89                |      | 25-102              | 3   |      | 50            |
| 2,4-Dichlorophenol   | 94               |      | 91                |      | 30-130              | 3   |      | 50            |
| 2,4-Dimethylphenol   | 92               |      | 88                |      | 30-130              | 4   |      | 50            |
| 2-Nitrophenol  | 94               |      | 91                |      | 30-130              | 3   |      | 50            |
| 4-Nitrophenol  | 106              |      | 98                |      | 11-114              | 8   |      | 50            |
| 2,4-Dinitrophenol  | 13               |      | 13                |      | 4-130               | 0   |      | 50            |
| 4,6-Dinitro-o-cresol   | 32               |      | 31                |      | 10-130              | 3   |      | 50            |
| Pentachlorophenol  | 87               |      | 76                |      | 17-109              | 13  |      | 50            |
| Phenol   | 93               | Q    | 90                |      | 26-90               | 3   |      | 50            |
| 2-Methylphenol   | 92               |      | 88                |      | 30-130              | 4   |      | 50            |
| 3-Methylphenol/4-Methylphenol  | 93               |      | 90                |      | 30-130              | 3   |      | 50            |
| 2,4,5-Trichlorophenol  | 100              |      | 95                |      | 30-130              | 5   |      | 50            |
| Carbazole  | 94               |      | 92                |      | 54-128              | 2   |      | 50            |
| Atrazine   | 99               |      | 96                |      | 40-140              | 3   |      | 50            |
| Benzaldehyde   | 83               |      | 82                |      | 40-140              | 1   |      | 50            |
| Caprolactam  | 112              |      | 104               |      | 15-130              | 7   |      | 50            |
| 2,3,4,6-Tetrachlorophenol  | 93               |      | 89                |      | 40-140              | 4   |      | 50            |



**Lab Control Sample Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Lab Number:** L1741813**Project Number:** B0234-016-001-0040**Report Date:** 11/21/17

| <b>Parameter</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|

Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1064564-2 WG1064564-3

| <b>Surrogate</b>     | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> |
|----------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|
| 2-Fluorophenol       | 92                       |             | 88                        |             | 25-120                         |
| Phenol-d6            | 92                       |             | 90                        |             | 10-120                         |
| Nitrobenzene-d5      | 88                       |             | 84                        |             | 23-120                         |
| 2-Fluorobiphenyl     | 86                       |             | 81                        |             | 30-120                         |
| 2,4,6-Tribromophenol | 104                      |             | 100                       |             | 10-136                         |
| 4-Terphenyl-d14      | 91                       |             | 87                        |             | 18-120                         |

## METALS

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

**SAMPLE RESULTS**

**Lab ID:** L1741813-01  
**Client ID:** MW-4 (8-10')  
**Sample Location:** BUFFALO, NY  
**Matrix:** Soil  
**Percent Solids:** 87%

**Date Collected:** 11/13/17 14:00  
**Date Received:** 11/14/17  
**Field Prep:** Not Specified

| Parameter                    | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|--------|-----------|-------|-------|-------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |        |           |       |       |       |                 |                |                |             |                   |         |
| Aluminum, Total              | 2740   |           | mg/kg | 8.62  | 2.33  | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Antimony, Total              | 0.448  | J         | mg/kg | 4.31  | 0.328 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Arsenic, Total               | 1.40   |           | mg/kg | 0.862 | 0.179 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Barium, Total                | 30.1   |           | mg/kg | 0.862 | 0.150 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Beryllium, Total             | 0.112  | J         | mg/kg | 0.431 | 0.029 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Cadmium, Total               | 0.293  | J         | mg/kg | 0.862 | 0.085 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Calcium, Total               | 49500  |           | mg/kg | 8.62  | 3.02  | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Chromium, Total              | 7.51   |           | mg/kg | 0.862 | 0.083 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Cobalt, Total                | 2.70   |           | mg/kg | 1.72  | 0.143 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Copper, Total                | 7.77   |           | mg/kg | 0.862 | 0.222 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Iron, Total                  | 7220   |           | mg/kg | 4.31  | 0.779 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Lead, Total                  | 7.67   |           | mg/kg | 4.31  | 0.231 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Magnesium, Total             | 20700  |           | mg/kg | 8.62  | 1.33  | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Manganese, Total             | 260    |           | mg/kg | 0.862 | 0.137 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Mercury, Total               | ND     |           | mg/kg | 0.07  | 0.02  | 1               | 11/16/17 09:00 | 11/20/17 13:03 | EPA 7471B   | 1,7471B           | MG      |
| Nickel, Total                | 5.80   |           | mg/kg | 2.16  | 0.209 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Potassium, Total             | 672    |           | mg/kg | 216   | 12.4  | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Selenium, Total              | ND     |           | mg/kg | 1.72  | 0.222 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Silver, Total                | ND     |           | mg/kg | 0.862 | 0.244 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Sodium, Total                | 184    |           | mg/kg | 172   | 2.72  | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Thallium, Total              | ND     |           | mg/kg | 1.72  | 0.272 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Vanadium, Total              | 9.70   |           | mg/kg | 0.862 | 0.175 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |
| Zinc, Total                  | 61.6   |           | mg/kg | 4.31  | 0.253 | 2               | 11/16/17 07:35 | 11/16/17 11:41 | EPA 3050B   | 1,6010C           | PS      |



**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

## Method Blank Analysis Batch Quality Control

| Parameter   | Result | Qualifier | Units | RL   | MDL  | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|---|--------|-----------|-------|------|------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01 Batch: WG1063548-1 |        |           |       |      |      |                    |                  |                  |                      |         |
| Mercury, Total  | ND     |           | mg/kg | 0.08 | 0.02 | 1                  | 11/16/17 09:00   | 11/20/17 12:43   | 1,7471B              | MG      |

### Prep Information

Digestion Method: EPA 7471B

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|---|--------|-----------|-------|-------|-------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01 Batch: WG1063579-1 |        |           |       |       |       |                    |                  |                  |                      |         |
| Aluminum, Total   | ND     |           | mg/kg | 4.00  | 1.08  | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Antimony, Total   | ND     |           | mg/kg | 2.00  | 0.152 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Arsenic, Total  | ND     |           | mg/kg | 0.400 | 0.083 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Barium, Total   | ND     |           | mg/kg | 0.400 | 0.070 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Beryllium, Total  | ND     |           | mg/kg | 0.200 | 0.013 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Cadmium, Total  | ND     |           | mg/kg | 0.400 | 0.039 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Calcium, Total  | ND     |           | mg/kg | 4.00  | 1.40  | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Chromium, Total   | ND     |           | mg/kg | 0.400 | 0.038 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Cobalt, Total   | ND     |           | mg/kg | 0.800 | 0.066 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Copper, Total   | ND     |           | mg/kg | 0.400 | 0.103 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Iron, Total   | 0.556  | J         | mg/kg | 2.00  | 0.361 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Lead, Total   | ND     |           | mg/kg | 2.00  | 0.107 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Magnesium, Total  | ND     |           | mg/kg | 4.00  | 0.616 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Manganese, Total  | ND     |           | mg/kg | 0.400 | 0.064 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Nickel, Total   | ND     |           | mg/kg | 1.00  | 0.097 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Potassium, Total  | 9.10   | J         | mg/kg | 100   | 5.76  | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Selenium, Total   | ND     |           | mg/kg | 0.800 | 0.103 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Silver, Total   | ND     |           | mg/kg | 0.400 | 0.113 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Sodium, Total   | 9.56   | J         | mg/kg | 80.0  | 1.26  | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Thallium, Total   | ND     |           | mg/kg | 0.800 | 0.126 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Vanadium, Total   | ND     |           | mg/kg | 0.400 | 0.081 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |
| Zinc, Total   | ND     |           | mg/kg | 2.00  | 0.117 | 1                  | 11/16/17 07:35   | 11/16/17 10:29   | 1,6010C              | PS      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

## **Method Blank Analysis Batch Quality Control**

### **Prep Information**

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Digestion Method: EPA 3050B

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01 Batch: WG1063548-2 SRM Lot Number: D098-540 |                  |      |                   |      |                     |     |      |            |
| Mercury, Total  | 94               |      | -                 |      | 50-149              | -   |      |            |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| Parameter   | LCS<br>%Recovery | LCSD<br>%Recovery | %Recovery<br>Limits | RPD | RPD Limits |
|---|------------------|-------------------|---------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01 Batch: WG1063579-2 SRM Lot Number: D098-540 |                  |                   |                     |     |            |
| Aluminum, Total   | 78               | -                 | 47-153              | -   |            |
| Antimony, Total   | 145              | -                 | 6-194               | -   |            |
| Arsenic, Total  | 92               | -                 | 83-117              | -   |            |
| Barium, Total   | 89               | -                 | 82-118              | -   |            |
| Beryllium, Total  | 92               | -                 | 83-117              | -   |            |
| Cadmium, Total  | 90               | -                 | 82-117              | -   |            |
| Calcium, Total  | 85               | -                 | 81-118              | -   |            |
| Chromium, Total   | 94               | -                 | 83-119              | -   |            |
| Cobalt, Total   | 92               | -                 | 84-116              | -   |            |
| Copper, Total   | 94               | -                 | 84-116              | -   |            |
| Iron, Total   | 94               | -                 | 60-140              | -   |            |
| Lead, Total   | 87               | -                 | 82-117              | -   |            |
| Magnesium, Total  | 82               | -                 | 76-124              | -   |            |
| Manganese, Total  | 94               | -                 | 82-118              | -   |            |
| Nickel, Total   | 91               | -                 | 82-117              | -   |            |
| Potassium, Total  | 87               | -                 | 69-131              | -   |            |
| Selenium, Total   | 90               | -                 | 78-121              | -   |            |
| Silver, Total   | 99               | -                 | 80-120              | -   |            |
| Sodium, Total   | 99               | -                 | 74-126              | -   |            |
| Thallium, Total   | 90               | -                 | 80-119              | -   |            |
| Vanadium, Total   | 92               | -                 | 79-121              | -   |            |

**Lab Control Sample Analysis**  
Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| Parameter   | LCS<br>%Recovery | LCSD<br>%Recovery | %Recovery<br>Limits | RPD | RPD Limits |
|---|------------------|-------------------|---------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01 Batch: WG1063579-2 SRM Lot Number: D098-540 |                  |                   |                     |     |            |
| Zinc, Total   | 90               | -                 | 81-119              | -   |            |



# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1063548-3 QC Sample: L1741853-01 Client ID: MS Sample |               |          |          |              |      |           |               |      |                 |     |      |            |
| Mercury, Total   | 0.16          | 0.164    | 0.28     | 73           | Q    | -         | -             |      | 80-120          | -   |      | 20         |

# **Matrix Spike Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | MSD Found | MSD %Recovery | Recovery Limits | RPD | RPD Limits |
|--|---------------|----------|----------|--------------|-----------|---------------|-----------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1063579-3 QC Sample: L1742014-01 Client ID: MS Sample |               |          |          |              |           |               |                 |     |            |
| Aluminum, Total  | 5600          | 221      | 5270     | 0            | Q         | -             | 75-125          | -   | 20         |
| Antimony, Total  | 0.467J        | 55.3     | 53.1     | 96           |           | -             | 75-125          | -   | 20         |
| Arsenic, Total   | 9.69          | 13.3     | 21.8     | 91           |           | -             | 75-125          | -   | 20         |
| Barium, Total  | 15.3          | 221      | 236      | 100          |           | -             | 75-125          | -   | 20         |
| Beryllium, Total   | 0.228J        | 5.53     | 5.48     | 99           |           | -             | 75-125          | -   | 20         |
| Cadmium, Total   | 0.167J        | 5.64     | 5.87     | 104          |           | -             | 75-125          | -   | 20         |
| Calcium, Total   | 299.          | 1110     | 1390     | 98           |           | -             | 75-125          | -   | 20         |
| Chromium, Total  | 5.77          | 22.1     | 26.2     | 92           |           | -             | 75-125          | -   | 20         |
| Cobalt, Total  | 2.16          | 55.3     | 52.4     | 91           |           | -             | 75-125          | -   | 20         |
| Copper, Total  | 5.65          | 27.7     | 32.8     | 98           |           | -             | 75-125          | -   | 20         |
| Iron, Total  | 9280          | 111      | 7910     | 0            | Q         | -             | 75-125          | -   | 20         |
| Lead, Total  | 12.8          | 56.4     | 72.2     | 105          |           | -             | 75-125          | -   | 20         |
| Magnesium, Total   | 1120          | 1110     | 1930     | 73           | Q         | -             | 75-125          | -   | 20         |
| Manganese, Total   | 66.4          | 55.3     | 116      | 90           |           | -             | 75-125          | -   | 20         |
| Nickel, Total  | 4.09          | 55.3     | 53.9     | 90           |           | -             | 75-125          | -   | 20         |
| Potassium, Total   | 1050          | 1110     | 2030     | 88           |           | -             | 75-125          | -   | 20         |
| Selenium, Total  | ND            | 13.3     | 13.5     | 102          |           | -             | 75-125          | -   | 20         |
| Silver, Total  | ND            | 33.2     | 33.0     | 99           |           | -             | 75-125          | -   | 20         |
| Sodium, Total  | 334.          | 1110     | 2000     | 150          | Q         | -             | 75-125          | -   | 20         |
| Thallium, Total  | ND            | 13.3     | 12.0     | 90           |           | -             | 75-125          | -   | 20         |
| Vanadium, Total  | 9.41          | 55.3     | 62.5     | 96           |           | -             | 75-125          | -   | 20         |

# **Matrix Spike Analysis** Batch Quality Control

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | MSD Found | MSD %Recovery | Recovery Limits | RPD | RPD Limits |
|--|---------------|----------|----------|--------------|-----------|---------------|-----------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1063579-3 QC Sample: L1742014-01 Client ID: MS Sample |               |          |          |              |           |               |                 |     |            |
| Zinc, Total  | 18.4          | 55.3     | 68.6     | 91           | -         | -             | 75-125          | -   | 20         |

# Lab Duplicate Analysis

## Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: B0234-016-001-00

Lab Number: L1741813

Report Date: 11/21/17

| Parameter   | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|---|---------------|------------------|-------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1063548-4 QC Sample: L1741853-01 Client ID: DUP Sample |               |                  |       |     |      |            |
| Mercury, Total  | 0.16          | 0.08             | mg/kg | 64  | Q    | 20         |
| Total Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1063579-4 QC Sample: L1742014-01 Client ID: DUP Sample |               |                  |       |     |      |            |
| Arsenic, Total  | 9.69          | 10.3             | mg/kg | 6   |      | 20         |
| Barium, Total   | 15.3          | 17.7             | mg/kg | 15  |      | 20         |
| Cadmium, Total  | 0.167J        | 0.194J           | mg/kg | NC  |      | 20         |
| Chromium, Total   | 5.77          | 6.96             | mg/kg | 19  |      | 20         |
| Lead, Total   | 12.8          | 10.9             | mg/kg | 16  |      | 20         |
| Selenium, Total   | ND            | ND               | mg/kg | NC  |      | 20         |
| Silver, Total   | ND            | ND               | mg/kg | NC  |      | 20         |

# **INORGANICS & MISCELLANEOUS**

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

### SAMPLE RESULTS

**Lab ID:** L1741813-01  
**Client ID:** MW-4 (8-10')  
**Sample Location:** BUFFALO, NY  
**Matrix:** Soil

**Date Collected:** 11/13/17 14:00  
**Date Received:** 11/14/17  
**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 87.3   |           | %     | 0.100 | NA  | 1                  | -                | 11/16/17 17:07   | 121,2540G            | RI      |



**Lab Duplicate Analysis**  
Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: B0234-016-001-00

Lab Number: L1741813

Report Date: 11/21/17

| Parameter  | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|--|---------------|------------------|-------|-----|------|------------|
| General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1063785-1 QC Sample: L1741927-01 Client ID: DUP Sample |               |                  |       |     |      |            |
| Solids, Total  | 89.7          | 88.3             | %     | 2   |      | 20         |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1741813**Project Number:** B0234-016-001-0040**Report Date:** 11/21/17**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information****Cooler**                      **Custody Seal**

A                                  Absent

**Container Information**

| <b>Container ID</b> | <b>Container Type</b>       | <b>Cooler</b> | <b>Initial<br/>pH</b> | <b>Final<br/>pH</b> | <b>Temp<br/>deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen<br/>Date/Time</b> | <b>Analysis(*)</b>   |
|---------------------|-----------------------------|---------------|-----------------------|---------------------|-----------------------|-------------|-------------|-----------------------------|--|
| L1741813-01A        | Glass 120ml/4oz unpreserved | A             | NA                    |                     | 3.6                   | Y           | Absent      |                             | BE-TI(180),AS-TI(180),BA-TI(180),AG-TI(180),AL-TI(180),CR-TI(180),NI-TI(180),TL-TI(180),CU-TI(180),PB-TI(180),SB-TI(180),SE-TI(180),ZN-TI(180),CO-TI(180),V-TI(180),FE-TI(180),HG-T(28),MG-TI(180),MN-TI(180),CA-TI(180),CD-TI(180),K-TI(180),NA-TI(180) |
| L1741813-01B        | Glass 120ml/4oz unpreserved | A             | NA                    |                     | 3.6                   | Y           | Absent      |                             | NYTCL-8270(14),TS(7)   |
| L1741813-01C        | Glass 120ml/4oz unpreserved | A             | NA                    |                     | 3.6                   | Y           | Absent      |                             | NYTCL-8260(14)   |
| L1741813-01X        | Vial MeOH preserved split   | A             | NA                    |                     | 3.6                   | Y           | Absent      |                             | NYTCL-8260(14)   |
| L1741813-01Y        | Vial Water preserved split  | A             | NA                    |                     | 3.6                   | Y           | Absent      | <b>16-NOV-17 00:14</b>      | NYTCL-8260(14)   |
| L1741813-01Z        | Vial Water preserved split  | A             | NA                    |                     | 3.6                   | Y           | Absent      | <b>16-NOV-17 00:14</b>      | NYTCL-8260(14)   |



**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



**Alpha Analytical, Inc.**

ID No.:17873

Facility: **Company-wide**

Revision 10

Department: **Quality Assurance**

Published Date: 1/16/2017 11:00:05 AM

Title: **Certificate/Approval Program Summary**

Page 1 of 1

**Certification Information**

The following analytes are not included in our Primary NELAP Scope of Accreditation:

**Westborough Facility****EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** NPW and SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**EPA 9012B:** NPW: Total Cyanide**EPA 9050A:** NPW: Specific Conductance**SM3500:** NPW: Ferrous Iron**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.**SM5310C:** DW: Dissolved Organic Carbon**Mansfield Facility****SM 2540D:** TSS**EPA 3005A** NPW**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

**Westborough Facility:****Drinking Water****EPA 300.0:** Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE, EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH, EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E.****Mansfield Facility:****Drinking Water****EPA 200.7:** Ba, Be, Cd, Cr, Cu, Ni, Na, Ca. **EPA 200.8:** Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Ni, Se, TL. **EPA 245.1 Hg.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.

L 1741813

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## ANALYTICAL REPORT

|                 |   |
|-----------------|---|
| Lab Number:     | L1742330  |
| Client:         | Turnkey Environmental Restoration, LLC<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley   |
| Phone:          | (716) 856-0599  |
| Project Name:   | MAIN & E. BALCOM  |
| Project Number: | T0239-016-001   |
| Report Date:    | 11/27/17  |

The original project report/data package is held by Alpha Analytical. This report/data package is paginated and should be reproduced only in its entirety. Alpha Analytical holds no responsibility for results and/or data that are not consistent with the original.

Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1742330  
**Report Date:** 11/27/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1742330-01                | MW-3             | WATER         | BUFFALO, NY                | 11/16/17 15:00                  | 11/16/17            |
| L1742330-02                | MW-4             | WATER         | BUFFALO, NY                | 11/16/17 13:30                  | 11/16/17            |
| L1742330-03                | BD               | WATER         | BUFFALO, NY                | 11/16/17 16:00                  | 11/16/17            |
| L1742330-04                | TRIP BLANK       | WATER         | BUFFALO, NY                | 11/16/17 00:00                  | 11/16/17            |



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1742330  
**Report Date:** 11/27/17

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

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**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1742330  
**Report Date:** 11/27/17

### Case Narrative (continued)

#### Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

#### Sample Receipt

L1742330-04: A sample identified as "TRIP BLANK" was received but not listed on the Chain of Custody. This sample was not analyzed.

#### Volatile Organics

The WG1065743-6/-7 MS/MSD recoveries, performed on L1742330-02, are outside the acceptance criteria for trans-1,2-dichloroethene (0%/0%). The unacceptable percent recoveries are attributed to the elevated concentrations of target compounds present in the native sample.

#### Total Metals

The WG1065298-3/-4 MS/MSD recoveries for calcium (0%/0%), magnesium (57%/65%) and sodium (MS 70%), performed on L1742330-02, do not apply because the sample concentrations are greater than four times the spike amounts added.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:

 Melissa Cripps

Title: Technical Director/Representative

Date: 11/27/17

# ORGANICS

# **VOLATILES**

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-01 D

Date Collected: 11/16/17 15:00

Client ID: MW-3

Date Received: 11/16/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Matrix: Water

Analytical Method: 1,8260C

Analytical Date: 11/22/17 16:51

Analyst: MKS

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Methylene chloride                           | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| 1,1-Dichloroethane                           | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Chloroform                                   | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Carbon tetrachloride                         | ND     |           | ug/l  | 1.2 | 0.34 | 2.5             |
| 1,2-Dichloropropane                          | ND     |           | ug/l  | 2.5 | 0.34 | 2.5             |
| Dibromochloromethane                         | ND     |           | ug/l  | 1.2 | 0.37 | 2.5             |
| 1,1,2-Trichloroethane                        | ND     |           | ug/l  | 3.8 | 1.2  | 2.5             |
| Tetrachloroethene                            | ND     |           | ug/l  | 1.2 | 0.45 | 2.5             |
| Chlorobenzene                                | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Trichlorofluoromethane                       | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| 1,2-Dichloroethane                           | ND     |           | ug/l  | 1.2 | 0.33 | 2.5             |
| 1,1,1-Trichloroethane                        | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Bromodichloromethane                         | ND     |           | ug/l  | 1.2 | 0.48 | 2.5             |
| trans-1,3-Dichloropropene                    | ND     |           | ug/l  | 1.2 | 0.41 | 2.5             |
| cis-1,3-Dichloropropene                      | ND     |           | ug/l  | 1.2 | 0.36 | 2.5             |
| Bromoform                                    | ND     |           | ug/l  | 5.0 | 1.6  | 2.5             |
| 1,1,2,2-Tetrachloroethane                    | ND     |           | ug/l  | 1.2 | 0.42 | 2.5             |
| Benzene                                      | ND     |           | ug/l  | 1.2 | 0.40 | 2.5             |
| Toluene                                      | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Ethylbenzene                                 | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Chloromethane                                | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Bromomethane                                 | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Vinyl chloride                               | ND     |           | ug/l  | 2.5 | 0.18 | 2.5             |
| Chloroethane                                 | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| 1,1-Dichloroethene                           | ND     |           | ug/l  | 1.2 | 0.42 | 2.5             |
| trans-1,2-Dichloroethene                     | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Trichloroethene                              | 30     |           | ug/l  | 1.2 | 0.44 | 2.5             |
| 1,2-Dichlorobenzene                          | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| 1,3-Dichlorobenzene                          | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| 1,4-Dichlorobenzene                          | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-01 D

Date Collected: 11/16/17 15:00

Client ID: MW-3

Date Received: 11/16/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Methyl tert butyl ether                      | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| p/m-Xylene                                   | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| o-Xylene                                     | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| cis-1,2-Dichloroethene                       | 2.5    | J         | ug/l  | 6.2 | 1.8  | 2.5             |
| Diisopropyl Ether                            | ND     |           | ug/l  | 5.0 | 1.6  | 2.5             |
| Styrene                                      | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Dichlorodifluoromethane                      | ND     |           | ug/l  | 12  | 2.5  | 2.5             |
| Acetone                                      | 51     |           | ug/l  | 12  | 3.6  | 2.5             |
| Carbon disulfide                             | ND     |           | ug/l  | 12  | 2.5  | 2.5             |
| 2-Butanone                                   | 360    |           | ug/l  | 12  | 4.8  | 2.5             |
| 4-Methyl-2-pentanone                         | ND     |           | ug/l  | 12  | 2.5  | 2.5             |
| 2-Hexanone                                   | ND     |           | ug/l  | 12  | 2.5  | 2.5             |
| Bromochloromethane                           | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| 1,2-Dibromoethane                            | ND     |           | ug/l  | 5.0 | 1.6  | 2.5             |
| n-Butylbenzene                               | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| sec-Butylbenzene                             | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| 1,2-Dibromo-3-chloropropane                  | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Isopropylbenzene                             | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| n-Propylbenzene                              | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| 1,2,3-Trichlorobenzene                       | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| 1,2,4-Trichlorobenzene                       | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Methyl Acetate                               | ND     |           | ug/l  | 5.0 | 0.58 | 2.5             |
| Cyclohexane                                  | ND     |           | ug/l  | 25  | 0.68 | 2.5             |
| 1,4-Dioxane                                  | ND     |           | ug/l  | 620 | 150  | 2.5             |
| Freon-113                                    | ND     |           | ug/l  | 6.2 | 1.8  | 2.5             |
| Methyl cyclohexane                           | ND     |           | ug/l  | 25  | 0.99 | 2.5             |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 115        |           | 70-130              |
| Toluene-d8            | 96         |           | 70-130              |
| 4-Bromofluorobenzene  | 97         |           | 70-130              |
| Dibromofluoromethane  | 105        |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

## SAMPLE RESULTS

Lab ID: L1742330-02  
 Client ID: MW-4  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 13:30  
 Date Received: 11/16/17  
 Field Prep: Not Specified

Matrix: Water  
 Analytical Method: 1,8260C  
 Analytical Date: 11/22/17 17:16  
 Analyst: MKS

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethane                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloroform                                   | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Carbon tetrachloride                         | ND     |           | ug/l  | 0.50 | 0.13 | 1               |
| 1,2-Dichloropropane                          | ND     |           | ug/l  | 1.0  | 0.14 | 1               |
| Dibromochloromethane                         | ND     |           | ug/l  | 0.50 | 0.15 | 1               |
| 1,1,2-Trichloroethane                        | ND     |           | ug/l  | 1.5  | 0.50 | 1               |
| Tetrachloroethene                            | ND     |           | ug/l  | 0.50 | 0.18 | 1               |
| Chlorobenzene                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichlorofluoromethane                       | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,2-Dichloroethane                           | 0.18   | J         | ug/l  | 0.50 | 0.13 | 1               |
| 1,1,1-Trichloroethane                        | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromodichloromethane                         | ND     |           | ug/l  | 0.50 | 0.19 | 1               |
| trans-1,3-Dichloropropene                    | ND     |           | ug/l  | 0.50 | 0.16 | 1               |
| cis-1,3-Dichloropropene                      | ND     |           | ug/l  | 0.50 | 0.14 | 1               |
| Bromoform                                    | ND     |           | ug/l  | 2.0  | 0.65 | 1               |
| 1,1,2,2-Tetrachloroethane                    | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| Benzene                                      | 3.4    |           | ug/l  | 0.50 | 0.16 | 1               |
| Toluene                                      | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Ethylbenzene                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloromethane                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromomethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Vinyl chloride                               | 6.9    |           | ug/l  | 1.0  | 0.07 | 1               |
| Chloroethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethene                           | 0.27   | J         | ug/l  | 0.50 | 0.17 | 1               |
| trans-1,2-Dichloroethene                     | 100    |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichloroethene                              | 17     |           | ug/l  | 0.50 | 0.18 | 1               |
| 1,2-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,3-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,4-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS****Lab ID:** L1742330-02**Date Collected:** 11/16/17 13:30**Client ID:** MW-4**Date Received:** 11/16/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Methyl tert butyl ether                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p/m-Xylene                                   | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| o-Xylene                                     | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| cis-1,2-Dichloroethene                       | 39     |           | ug/l  | 2.5 | 0.70 | 1               |
| Diisopropyl Ether                            | ND     |           | ug/l  | 2.0 | 0.65 | 1               |
| Styrene                                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Dichlorodifluoromethane                      | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Acetone                                      | 3.1    | J         | ug/l  | 5.0 | 1.5  | 1               |
| Carbon disulfide                             | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Butanone                                   | ND     |           | ug/l  | 5.0 | 1.9  | 1               |
| 4-Methyl-2-pentanone                         | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Hexanone                                   | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Bromochloromethane                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromoethane                            | ND     |           | ug/l  | 2.0 | 0.65 | 1               |
| n-Butylbenzene                               | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromo-3-chloropropane                  | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Isopropylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| n-Propylbenzene                              | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,3-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl Acetate                               | ND     |           | ug/l  | 2.0 | 0.23 | 1               |
| Cyclohexane                                  | 0.64   | J         | ug/l  | 10  | 0.27 | 1               |
| 1,4-Dioxane                                  | ND     |           | ug/l  | 250 | 61.  | 1               |
| Freon-113                                    | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl cyclohexane                           | 0.49   | J         | ug/l  | 10  | 0.40 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 115        |           | 70-130              |
| Toluene-d8            | 96         |           | 70-130              |
| 4-Bromofluorobenzene  | 95         |           | 70-130              |
| Dibromofluoromethane  | 104        |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

## SAMPLE RESULTS

Lab ID: L1742330-03  
 Client ID: BD  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 16:00  
 Date Received: 11/16/17  
 Field Prep: Not Specified

Matrix: Water  
 Analytical Method: 1,8260C  
 Analytical Date: 11/22/17 17:42  
 Analyst: MKS

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethane                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloroform                                   | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Carbon tetrachloride                         | ND     |           | ug/l  | 0.50 | 0.13 | 1               |
| 1,2-Dichloropropane                          | ND     |           | ug/l  | 1.0  | 0.14 | 1               |
| Dibromochloromethane                         | ND     |           | ug/l  | 0.50 | 0.15 | 1               |
| 1,1,2-Trichloroethane                        | ND     |           | ug/l  | 1.5  | 0.50 | 1               |
| Tetrachloroethene                            | ND     |           | ug/l  | 0.50 | 0.18 | 1               |
| Chlorobenzene                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichlorofluoromethane                       | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,2-Dichloroethane                           | 0.19   | J         | ug/l  | 0.50 | 0.13 | 1               |
| 1,1,1-Trichloroethane                        | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromodichloromethane                         | ND     |           | ug/l  | 0.50 | 0.19 | 1               |
| trans-1,3-Dichloropropene                    | ND     |           | ug/l  | 0.50 | 0.16 | 1               |
| cis-1,3-Dichloropropene                      | ND     |           | ug/l  | 0.50 | 0.14 | 1               |
| Bromoform                                    | ND     |           | ug/l  | 2.0  | 0.65 | 1               |
| 1,1,2,2-Tetrachloroethane                    | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| Benzene                                      | 3.3    |           | ug/l  | 0.50 | 0.16 | 1               |
| Toluene                                      | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Ethylbenzene                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloromethane                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromomethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Vinyl chloride                               | 6.3    |           | ug/l  | 1.0  | 0.07 | 1               |
| Chloroethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethene                           | 0.28   | J         | ug/l  | 0.50 | 0.17 | 1               |
| trans-1,2-Dichloroethene                     | 97     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichloroethene                              | 16     |           | ug/l  | 0.50 | 0.18 | 1               |
| 1,2-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,3-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,4-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS****Lab ID:** L1742330-03**Date Collected:** 11/16/17 16:00**Client ID:** BD**Date Received:** 11/16/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Methyl tert butyl ether                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p/m-Xylene                                   | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| o-Xylene                                     | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| cis-1,2-Dichloroethene                       | 38     |           | ug/l  | 2.5 | 0.70 | 1               |
| Diisopropyl Ether                            | ND     |           | ug/l  | 2.0 | 0.65 | 1               |
| Styrene                                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Dichlorodifluoromethane                      | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Acetone                                      | 2.5    | J         | ug/l  | 5.0 | 1.5  | 1               |
| Carbon disulfide                             | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Butanone                                   | ND     |           | ug/l  | 5.0 | 1.9  | 1               |
| 4-Methyl-2-pentanone                         | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Hexanone                                   | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Bromochloromethane                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromoethane                            | ND     |           | ug/l  | 2.0 | 0.65 | 1               |
| n-Butylbenzene                               | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromo-3-chloropropane                  | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Isopropylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| n-Propylbenzene                              | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,3-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl Acetate                               | ND     |           | ug/l  | 2.0 | 0.23 | 1               |
| Cyclohexane                                  | 0.61   | J         | ug/l  | 10  | 0.27 | 1               |
| 1,4-Dioxane                                  | ND     |           | ug/l  | 250 | 61.  | 1               |
| Freon-113                                    | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl cyclohexane                           | 0.43   | J         | ug/l  | 10  | 0.40 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 114        |           | 70-130              |
| Toluene-d8            | 96         |           | 70-130              |
| 4-Bromofluorobenzene  | 97         |           | 70-130              |
| Dibromofluoromethane  | 103        |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C

Analytical Date: 11/22/17 09:17

Analyst: PD

| Parameter  | Result | Qualifier | Units | RL   | MDL  |
|--|--------|-----------|-------|------|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-03 Batch: WG1065743-5 |        |           |       |      |      |
| Methylene chloride   | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,1-Dichloroethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| Chloroform   | ND     |           | ug/l  | 2.5  | 0.70 |
| Carbon tetrachloride   | ND     |           | ug/l  | 0.50 | 0.13 |
| 1,2-Dichloropropane  | ND     |           | ug/l  | 1.0  | 0.14 |
| Dibromochloromethane   | ND     |           | ug/l  | 0.50 | 0.15 |
| 1,1,2-Trichloroethane  | ND     |           | ug/l  | 1.5  | 0.50 |
| Tetrachloroethene  | ND     |           | ug/l  | 0.50 | 0.18 |
| Chlorobenzene  | ND     |           | ug/l  | 2.5  | 0.70 |
| Trichlorofluoromethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,2-Dichloroethane   | ND     |           | ug/l  | 0.50 | 0.13 |
| 1,1,1-Trichloroethane  | ND     |           | ug/l  | 2.5  | 0.70 |
| Bromodichloromethane   | ND     |           | ug/l  | 0.50 | 0.19 |
| trans-1,3-Dichloropropene  | ND     |           | ug/l  | 0.50 | 0.16 |
| cis-1,3-Dichloropropene  | ND     |           | ug/l  | 0.50 | 0.14 |
| Bromoform  | ND     |           | ug/l  | 2.0  | 0.65 |
| 1,1,2,2-Tetrachloroethane  | ND     |           | ug/l  | 0.50 | 0.17 |
| Benzene  | ND     |           | ug/l  | 0.50 | 0.16 |
| Toluene  | ND     |           | ug/l  | 2.5  | 0.70 |
| Ethylbenzene   | ND     |           | ug/l  | 2.5  | 0.70 |
| Chloromethane  | ND     |           | ug/l  | 2.5  | 0.70 |
| Bromomethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| Vinyl chloride   | ND     |           | ug/l  | 1.0  | 0.07 |
| Chloroethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,1-Dichloroethene   | ND     |           | ug/l  | 0.50 | 0.17 |
| trans-1,2-Dichloroethene   | ND     |           | ug/l  | 2.5  | 0.70 |
| Trichloroethene  | ND     |           | ug/l  | 0.50 | 0.18 |
| 1,2-Dichlorobenzene  | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,3-Dichlorobenzene  | ND     |           | ug/l  | 2.5  | 0.70 |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C

Analytical Date: 11/22/17 09:17

Analyst: PD

| Parameter  | Result | Qualifier | Units | RL  | MDL  |
|--|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-03 Batch: WG1065743-5 |        |           |       |     |      |
| 1,4-Dichlorobenzene  | ND     |           | ug/l  | 2.5 | 0.70 |
| Methyl tert butyl ether  | ND     |           | ug/l  | 2.5 | 0.70 |
| p/m-Xylene   | ND     |           | ug/l  | 2.5 | 0.70 |
| o-Xylene   | ND     |           | ug/l  | 2.5 | 0.70 |
| cis-1,2-Dichloroethene   | ND     |           | ug/l  | 2.5 | 0.70 |
| Diisopropyl Ether  | ND     |           | ug/l  | 2.0 | 0.65 |
| Styrene  | ND     |           | ug/l  | 2.5 | 0.70 |
| Dichlorodifluoromethane  | ND     |           | ug/l  | 5.0 | 1.0  |
| Acetone  | ND     |           | ug/l  | 5.0 | 1.5  |
| Carbon disulfide   | ND     |           | ug/l  | 5.0 | 1.0  |
| 2-Butanone   | ND     |           | ug/l  | 5.0 | 1.9  |
| 4-Methyl-2-pentanone   | ND     |           | ug/l  | 5.0 | 1.0  |
| 2-Hexanone   | ND     |           | ug/l  | 5.0 | 1.0  |
| Bromochloromethane   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2-Dibromoethane  | ND     |           | ug/l  | 2.0 | 0.65 |
| n-Butylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| sec-Butylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2-Dibromo-3-chloropropane  | ND     |           | ug/l  | 2.5 | 0.70 |
| Isopropylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| n-Propylbenzene  | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2,3-Trichlorobenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2,4-Trichlorobenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,3,5-Trimethylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2,4-Trimethylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| Methyl Acetate   | ND     |           | ug/l  | 2.0 | 0.23 |
| Cyclohexane  | ND     |           | ug/l  | 10  | 0.27 |
| 1,4-Dioxane  | ND     |           | ug/l  | 250 | 61.  |
| Freon-113  | ND     |           | ug/l  | 2.5 | 0.70 |
| Methyl cyclohexane   | ND     |           | ug/l  | 10  | 0.40 |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**Method Blank Analysis**  
**Batch Quality Control**

Analytical Method: 1,8260C

Analytical Date: 11/22/17 09:17

Analyst: PD

| Parameter  | Result | Qualifier | Units | RL | MDL |
|--|--------|-----------|-------|----|-----|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-03 Batch: WG1065743-5 |        |           |       |    |     |

| Surrogate             | %Recovery | Qualifier | Acceptance<br>Criteria |
|-----------------------|-----------|-----------|------------------------|
| 1,2-Dichloroethane-d4 | 108       |           | 70-130                 |
| Toluene-d8            | 95        |           | 70-130                 |
| 4-Bromofluorobenzene  | 102       |           | 70-130                 |
| Dibromofluoromethane  | 100       |           | 70-130                 |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1742330

**Report Date:** 11/27/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 Batch: WG1065743-3 WG1065743-4 |                  |      |                   |      |                     |     |      |               |
| Methylene chloride  | 100              |      | 100               |      | 70-130              | 0   |      | 20            |
| 1,1-Dichloroethane  | 100              |      | 100               |      | 70-130              | 0   |      | 20            |
| Chloroform  | 100              |      | 100               |      | 70-130              | 0   |      | 20            |
| Carbon tetrachloride  | 100              |      | 96                |      | 63-132              | 4   |      | 20            |
| 1,2-Dichloropropane   | 100              |      | 100               |      | 70-130              | 0   |      | 20            |
| Dibromochloromethane  | 96               |      | 94                |      | 63-130              | 2   |      | 20            |
| 1,1,2-Trichloroethane   | 110              |      | 100               |      | 70-130              | 10  |      | 20            |
| Tetrachloroethene   | 91               |      | 89                |      | 70-130              | 2   |      | 20            |
| Chlorobenzene   | 98               |      | 97                |      | 75-130              | 1   |      | 20            |
| Trichlorofluoromethane  | 120              |      | 110               |      | 62-150              | 9   |      | 20            |
| 1,2-Dichloroethane  | 110              |      | 110               |      | 70-130              | 0   |      | 20            |
| 1,1,1-Trichloroethane   | 100              |      | 100               |      | 67-130              | 0   |      | 20            |
| Bromodichloromethane  | 100              |      | 97                |      | 67-130              | 3   |      | 20            |
| trans-1,3-Dichloropropene   | 92               |      | 90                |      | 70-130              | 2   |      | 20            |
| cis-1,3-Dichloropropene   | 89               |      | 88                |      | 70-130              | 1   |      | 20            |
| Bromoform   | 91               |      | 89                |      | 54-136              | 2   |      | 20            |
| 1,1,2,2-Tetrachloroethane   | 100              |      | 100               |      | 67-130              | 0   |      | 20            |
| Benzene   | 100              |      | 100               |      | 70-130              | 0   |      | 20            |
| Toluene   | 100              |      | 100               |      | 70-130              | 0   |      | 20            |
| Ethylbenzene  | 100              |      | 100               |      | 70-130              | 0   |      | 20            |
| Chloromethane   | 120              |      | 120               |      | 64-130              | 0   |      | 20            |
| Bromomethane  | 100              |      | 100               |      | 39-139              | 0   |      | 20            |
| Vinyl chloride  | 130              |      | 130               |      | 55-140              | 0   |      | 20            |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1742330

**Report Date:** 11/27/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 Batch: WG1065743-3 WG1065743-4 |                  |      |                   |      |                     |     |      |               |
| Chloroethane  | 130              |      | 130               |      | 55-138              | 0   |      | 20            |
| 1,1-Dichloroethene  | 110              |      | 110               |      | 61-145              | 0   |      | 20            |
| trans-1,2-Dichloroethene  | 99               |      | 97                |      | 70-130              | 2   |      | 20            |
| Trichloroethene   | 100              |      | 99                |      | 70-130              | 1   |      | 20            |
| 1,2-Dichlorobenzene   | 95               |      | 96                |      | 70-130              | 1   |      | 20            |
| 1,3-Dichlorobenzene   | 95               |      | 96                |      | 70-130              | 1   |      | 20            |
| 1,4-Dichlorobenzene   | 93               |      | 94                |      | 70-130              | 1   |      | 20            |
| Methyl tert butyl ether   | 110              |      | 110               |      | 63-130              | 0   |      | 20            |
| p/m-Xylene  | 105              |      | 105               |      | 70-130              | 0   |      | 20            |
| o-Xylene  | 100              |      | 95                |      | 70-130              | 5   |      | 20            |
| cis-1,2-Dichloroethene  | 96               |      | 96                |      | 70-130              | 0   |      | 20            |
| Diisopropyl Ether   | 99               |      | 97                |      | 70-130              | 2   |      | 20            |
| Styrene   | 100              |      | 100               |      | 70-130              | 0   |      | 20            |
| Dichlorodifluoromethane   | 130              |      | 120               |      | 36-147              | 8   |      | 20            |
| Acetone   | 94               |      | 92                |      | 58-148              | 2   |      | 20            |
| Carbon disulfide  | 110              |      | 110               |      | 51-130              | 0   |      | 20            |
| 2-Butanone  | 110              |      | 100               |      | 63-138              | 10  |      | 20            |
| 4-Methyl-2-pentanone  | 89               |      | 86                |      | 59-130              | 3   |      | 20            |
| 2-Hexanone  | 69               |      | 67                |      | 57-130              | 3   |      | 20            |
| Bromochloromethane  | 100              |      | 100               |      | 70-130              | 0   |      | 20            |
| 1,2-Dibromoethane   | 100              |      | 100               |      | 70-130              | 0   |      | 20            |
| n-Butylbenzene  | 97               |      | 98                |      | 53-136              | 1   |      | 20            |
| sec-Butylbenzene  | 88               |      | 90                |      | 70-130              | 2   |      | 20            |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1742330

**Project Number:** T0239-016-001

**Report Date:** 11/27/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 Batch: WG1065743-3 WG1065743-4 |                  |      |                   |      |                     |     |      |               |
| 1,2-Dibromo-3-chloropropane   | 80               |      | 73                |      | 41-144              | 9   |      | 20            |
| Isopropylbenzene  | 88               |      | 90                |      | 70-130              | 2   |      | 20            |
| n-Propylbenzene   | 100              |      | 100               |      | 69-130              | 0   |      | 20            |
| 1,2,3-Trichlorobenzene  | 98               |      | 83                |      | 70-130              | 17  |      | 20            |
| 1,2,4-Trichlorobenzene  | 92               |      | 88                |      | 70-130              | 4   |      | 20            |
| 1,3,5-Trimethylbenzene  | 100              |      | 100               |      | 64-130              | 0   |      | 20            |
| 1,2,4-Trimethylbenzene  | 92               |      | 94                |      | 70-130              | 2   |      | 20            |
| Methyl Acetate  | 100              |      | 96                |      | 70-130              | 4   |      | 20            |
| Cyclohexane   | 110              |      | 100               |      | 70-130              | 10  |      | 20            |
| 1,4-Dioxane   | 118              |      | 102               |      | 56-162              | 15  |      | 20            |
| Freon-113   | 120              |      | 120               |      | 70-130              | 0   |      | 20            |
| Methyl cyclohexane  | 110              |      | 100               |      | 70-130              | 10  |      | 20            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 111              |      | 107               |      | 70-130                 |
| Toluene-d8            | 96               |      | 98                |      | 70-130                 |
| 4-Bromofluorobenzene  | 99               |      | 102               |      | 70-130                 |
| Dibromofluoromethane  | 100              |      | 98                |      | 70-130                 |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1742330

**Report Date:** 11/27/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1065743-6 WG1065743-7 QC Sample: L1742330-02 Client ID: MW-4 |               |          |          |              |      |           |               |      |                 |     |      |            |
| Methylene chloride   | ND            | 10       | 10       | 100          |      | 11        | 110           |      | 70-130          | 10  |      | 20         |
| 1,1-Dichloroethane   | ND            | 10       | 11       | 110          |      | 12        | 120           |      | 70-130          | 9   |      | 20         |
| Chloroform   | ND            | 10       | 11       | 110          |      | 11        | 110           |      | 70-130          | 0   |      | 20         |
| Carbon tetrachloride   | ND            | 10       | 11       | 110          |      | 11        | 110           |      | 63-132          | 0   |      | 20         |
| 1,2-Dichloropropane  | ND            | 10       | 9.8      | 98           |      | 11        | 110           |      | 70-130          | 12  |      | 20         |
| Dibromochloromethane   | ND            | 10       | 9.2      | 92           |      | 10        | 100           |      | 63-130          | 8   |      | 20         |
| 1,1,2-Trichloroethane  | ND            | 10       | 10       | 100          |      | 11        | 110           |      | 70-130          | 10  |      | 20         |
| Tetrachloroethene  | ND            | 10       | 9.0      | 90           |      | 9.9       | 99            |      | 70-130          | 10  |      | 20         |
| Chlorobenzene  | ND            | 10       | 9.7      | 97           |      | 10        | 100           |      | 75-130          | 3   |      | 20         |
| Trichlorofluoromethane   | ND            | 10       | 13       | 130          |      | 14        | 140           |      | 62-150          | 7   |      | 20         |
| 1,2-Dichloroethane   | 0.18J         | 10       | 12       | 120          |      | 12        | 120           |      | 70-130          | 0   |      | 20         |
| 1,1,1-Trichloroethane  | ND            | 10       | 11       | 110          |      | 12        | 120           |      | 67-130          | 9   |      | 20         |
| Bromodichloromethane   | ND            | 10       | 10       | 100          |      | 11        | 110           |      | 67-130          | 10  |      | 20         |
| trans-1,3-Dichloropropene  | ND            | 10       | 8.4      | 84           |      | 9.4       | 94            |      | 70-130          | 11  |      | 20         |
| cis-1,3-Dichloropropene  | ND            | 10       | 7.6      | 76           |      | 8.6       | 86            |      | 70-130          | 12  |      | 20         |
| Bromoform  | ND            | 10       | 8.5      | 85           |      | 9.3       | 93            |      | 54-136          | 9   |      | 20         |
| 1,1,2,2-Tetrachloroethane  | ND            | 10       | 9.6      | 96           |      | 10        | 100           |      | 67-130          | 4   |      | 20         |
| Benzene  | 3.4           | 10       | 14       | 106          |      | 15        | 116           |      | 70-130          | 7   |      | 20         |
| Toluene  | ND            | 10       | 10       | 100          |      | 11        | 110           |      | 70-130          | 10  |      | 20         |
| Ethylbenzene   | ND            | 10       | 10       | 100          |      | 11        | 110           |      | 70-130          | 10  |      | 20         |
| Chloromethane  | ND            | 10       | 12       | 120          |      | 13        | 130           |      | 64-130          | 8   |      | 20         |
| Bromomethane   | ND            | 10       | 8.3      | 83           |      | 10        | 100           |      | 39-139          | 19  |      | 20         |
| Vinyl chloride   | 6.9           | 10       | 20       | 131          |      | 22        | 151           | Q    | 55-140          | 10  |      | 20         |



# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1742330

**Report Date:** 11/27/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1065743-6 WG1065743-7 QC Sample: L1742330-02 Client ID: MW-4 |               |          |          |              |      |           |               |      |                 |     |      |            |
| Chloroethane   | ND            | 10       | 14       | 140          | Q    | 15        | 150           | Q    | 55-138          | 7   |      | 20         |
| 1,1-Dichloroethene   | 0.27J         | 10       | 11       | 110          |      | 12        | 120           |      | 61-145          | 9   |      | 20         |
| trans-1,2-Dichloroethene   | 100           | 10       | 100      | 0            | Q    | 100       | 0             | Q    | 70-130          | 0   |      | 20         |
| Trichloroethene  | 17            | 10       | 27       | 100          |      | 28        | 110           |      | 70-130          | 4   |      | 20         |
| 1,2-Dichlorobenzene  | ND            | 10       | 9.3      | 93           |      | 10        | 100           |      | 70-130          | 7   |      | 20         |
| 1,3-Dichlorobenzene  | ND            | 10       | 9.4      | 94           |      | 10        | 100           |      | 70-130          | 6   |      | 20         |
| 1,4-Dichlorobenzene  | ND            | 10       | 9.2      | 92           |      | 9.8       | 98            |      | 70-130          | 6   |      | 20         |
| Methyl tert butyl ether  | ND            | 10       | 10       | 100          |      | 12        | 120           |      | 63-130          | 18  |      | 20         |
| p/m-Xylene   | ND            | 20       | 21       | 105          |      | 22        | 110           |      | 70-130          | 5   |      | 20         |
| o-Xylene   | ND            | 20       | 19       | 95           |      | 21        | 105           |      | 70-130          | 10  |      | 20         |
| cis-1,2-Dichloroethene   | 39            | 10       | 49       | 100          |      | 49        | 100           |      | 70-130          | 0   |      | 20         |
| Diisopropyl Ether  | ND            | 10       | 9.0      | 90           |      | 10        | 100           |      | 70-130          | 11  |      | 20         |
| Styrene  | ND            | 20       | 20       | 100          |      | 21        | 105           |      | 70-130          | 5   |      | 20         |
| Dichlorodifluoromethane  | ND            | 10       | 13       | 130          |      | 14        | 140           |      | 36-147          | 7   |      | 20         |
| Acetone  | 3.1J          | 10       | 10       | 100          |      | 11        | 110           |      | 58-148          | 10  |      | 20         |
| Carbon disulfide   | ND            | 10       | 11       | 110          |      | 12        | 120           |      | 51-130          | 9   |      | 20         |
| 2-Butanone   | ND            | 10       | 10       | 100          |      | 11        | 110           |      | 63-138          | 10  |      | 20         |
| 4-Methyl-2-pentanone   | ND            | 10       | 7.9      | 79           |      | 9.0       | 90            |      | 59-130          | 13  |      | 20         |
| 2-Hexanone   | ND            | 10       | 6.1      | 61           |      | 7.3       | 73            |      | 57-130          | 18  |      | 20         |
| Bromochloromethane   | ND            | 10       | 11       | 110          |      | 11        | 110           |      | 70-130          | 0   |      | 20         |
| 1,2-Dibromoethane  | ND            | 10       | 9.4      | 94           |      | 10        | 100           |      | 70-130          | 6   |      | 20         |
| n-Butylbenzene   | ND            | 10       | 9.2      | 92           |      | 10        | 100           |      | 53-136          | 8   |      | 20         |
| sec-Butylbenzene   | ND            | 10       | 8.6      | 86           |      | 9.5       | 95            |      | 70-130          | 10  |      | 20         |

**Matrix Spike Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1742330**Report Date:** 11/27/17

| <b>Parameter</b>   | <b>Native Sample</b> | <b>MS Added</b> | <b>MS Found</b> | <b>MS %Recovery</b> | <b>Qual</b> | <b>MSD Found</b> | <b>MSD %Recovery</b> | <b>Qual</b> | <b>Recovery Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD Limits</b> |
|--|----------------------|-----------------|-----------------|---------------------|-------------|------------------|----------------------|-------------|------------------------|------------|-------------|-------------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1065743-6 WG1065743-7 QC Sample: L1742330-02 Client ID: MW-4 |                      |                 |                 |                     |             |                  |                      |             |                        |            |             |                   |
| 1,2-Dibromo-3-chloropropane  | ND                   | 10              | 7.5             | 75                  |             | 8.4              | 84                   |             | 41-144                 | 11         |             | 20                |
| Isopropylbenzene   | ND                   | 10              | 8.6             | 86                  |             | 9.4              | 94                   |             | 70-130                 | 9          |             | 20                |
| n-Propylbenzene  | ND                   | 10              | 9.7             | 97                  |             | 11               | 110                  |             | 69-130                 | 13         |             | 20                |
| 1,2,3-Trichlorobenzene   | ND                   | 10              | 6.9             | 69                  | Q           | 10               | 100                  |             | 70-130                 | 37         | Q           | 20                |
| 1,2,4-Trichlorobenzene   | ND                   | 10              | 8.1             | 81                  |             | 10               | 100                  |             | 70-130                 | 21         | Q           | 20                |
| 1,3,5-Trimethylbenzene   | ND                   | 10              | 10              | 100                 |             | 11               | 110                  |             | 64-130                 | 10         |             | 20                |
| 1,2,4-Trimethylbenzene   | ND                   | 10              | 9.1             | 91                  |             | 9.9              | 99                   |             | 70-130                 | 8          |             | 20                |
| Methyl Acetate   | ND                   | 10              | 9.2             | 92                  |             | 10               | 100                  |             | 70-130                 | 8          |             | 20                |
| Cyclohexane  | 0.64J                | 10              | 11              | 110                 |             | 12               | 120                  |             | 70-130                 | 9          |             | 20                |
| 1,4-Dioxane  | ND                   | 500             | 360             | 72                  |             | 480              | 96                   |             | 56-162                 | 29         | Q           | 20                |
| Freon-113  | ND                   | 10              | 12              | 120                 |             | 13               | 130                  |             | 70-130                 | 8          |             | 20                |
| Methyl cyclohexane   | 0.49J                | 10              | 11              | 110                 |             | 12               | 120                  |             | 70-130                 | 9          |             | 20                |

| <b>Surrogate</b>      | <b>MS % Recovery</b> | <b>Qualifier</b> | <b>MSD % Recovery</b> | <b>Qualifier</b> | <b>Acceptance Criteria</b> |
|-----------------------|----------------------|------------------|-----------------------|------------------|----------------------------|
| 1,2-Dichloroethane-d4 | 115                  |                  | 112                   |                  | 70-130                     |
| 4-Bromofluorobenzene  | 98                   |                  | 97                    |                  | 70-130                     |
| Dibromofluoromethane  | 102                  |                  | 100                   |                  | 70-130                     |
| Toluene-d8            | 97                   |                  | 95                    |                  | 70-130                     |

# SEMIVOLATILES

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-01  
 Client ID: MW-3  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 15:00  
 Date Received: 11/16/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 11/21/17 21:04

Matrix: Water  
 Analytical Method: 1,8270D  
 Analytical Date: 11/23/17 22:41  
 Analyst: RC

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| 1,2,4-Trichlorobenzene                           | ND     |           | ug/l  | 5.0 | 0.66 | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/l  | 2.0 | 0.67 | 1               |
| 1,2-Dichlorobenzene                              | ND     |           | ug/l  | 2.0 | 0.73 | 1               |
| 1,3-Dichlorobenzene                              | ND     |           | ug/l  | 2.0 | 0.69 | 1               |
| 1,4-Dichlorobenzene                              | ND     |           | ug/l  | 2.0 | 0.71 | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/l  | 5.0 | 1.4  | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/l  | 5.0 | 0.84 | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/l  | 2.0 | 0.62 | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/l  | 2.0 | 0.73 | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/l  | 2.0 | 0.70 | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/l  | 20  | 7.8  | 1               |
| Isophorone                                       | ND     |           | ug/l  | 5.0 | 0.60 | 1               |
| Nitrobenzene                                     | ND     |           | ug/l  | 2.0 | 0.75 | 1               |
| NDPA/DPA   | ND     |           | ug/l  | 2.0 | 0.64 | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/l  | 5.0 | 0.70 | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/l  | 3.0 | 0.91 | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/l  | 5.0 | 1.3  | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/l  | 5.0 | 0.69 | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| Diethyl phthalate                                | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| Dimethyl phthalate                               | ND     |           | ug/l  | 5.0 | 0.65 | 1               |
| Biphenyl   | ND     |           | ug/l  | 2.0 | 0.76 | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.2  | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.3  | 1               |
| Dibenzofuran                                     | ND     |           | ug/l  | 2.0 | 0.66 | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/l  | 10  | 0.67 | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS****Lab ID:** L1742330-01**Date Collected:** 11/16/17 15:00**Client ID:** MW-3**Date Received:** 11/16/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Acetophenone                                     | ND     |           | ug/l  | 5.0 | 0.85 | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/l  | 5.0 | 0.68 | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/l  | 2.0 | 0.62 | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/l  | 2.0 | 0.63 | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/l  | 5.0 | 0.77 | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/l  | 5.0 | 1.6  | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/l  | 10  | 1.5  | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/l  | 10  | 1.8  | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/l  | 20  | 5.5  | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/l  | 10  | 2.1  | 1               |
| Phenol   | ND     |           | ug/l  | 5.0 | 1.9  | 1               |
| 2-Methylphenol                                   | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/l  | 5.0 | 0.72 | 1               |
| Benzoic Acid                                     | ND     |           | ug/l  | 50  | 13.  | 1               |
| Benzyl Alcohol                                   | ND     |           | ug/l  | 2.0 | 0.72 | 1               |
| Carbazole  | ND     |           | ug/l  | 2.0 | 0.63 | 1               |
| Atrazine   | ND     |           | ug/l  | 10  | 1.8  | 1               |
| Benzaldehyde                                     | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| Caprolactam                                      | ND     |           | ug/l  | 10  | 3.6  | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/l  | 5.0 | 0.93 | 1               |

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 49         |           | 21-120              |
| Phenol-d6            | 33         |           | 10-120              |
| Nitrobenzene-d5      | 74         |           | 23-120              |
| 2-Fluorobiphenyl     | 77         |           | 15-120              |
| 2,4,6-Tribromophenol | 86         |           | 10-120              |
| 4-Terphenyl-d14      | 79         |           | 41-149              |

**Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1742330**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-01  
 Client ID: MW-3  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 15:00  
 Date Received: 11/16/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 11/21/17 21:00

Matrix: Water  
 Analytical Method: 1,8270D-SIM  
 Analytical Date: 11/25/17 06:08  
 Analyst: KL

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab |        |           |       |      |      |                 |
| Acenaphthene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| 2-Chloronaphthalene                                  | ND     |           | ug/l  | 0.20 | 0.04 | 1               |
| Fluoranthene   | 0.05   | J         | ug/l  | 0.10 | 0.04 | 1               |
| Hexachlorobutadiene                                  | ND     |           | ug/l  | 0.50 | 0.04 | 1               |
| Naphthalene  | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(a)anthracene                                   | ND     |           | ug/l  | 0.10 | 0.02 | 1               |
| Benzo(a)pyrene                                       | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(b)fluoranthene                                 | ND     |           | ug/l  | 0.10 | 0.02 | 1               |
| Benzo(k)fluoranthene                                 | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Chrysene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Acenaphthylene                                       | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Anthracene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(ghi)perylene                                   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Fluorene   | 0.06   | J         | ug/l  | 0.10 | 0.04 | 1               |
| Phenanthrene   | 0.42   |           | ug/l  | 0.10 | 0.02 | 1               |
| Dibenzo(a,h)anthracene                               | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Indeno(1,2,3-cd)pyrene                               | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Pyrene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| 2-Methylnaphthalene                                  | ND     |           | ug/l  | 0.10 | 0.05 | 1               |
| Pentachlorophenol                                    | ND     |           | ug/l  | 0.80 | 0.22 | 1               |
| Hexachlorobenzene                                    | ND     |           | ug/l  | 0.80 | 0.03 | 1               |
| Hexachloroethane                                     | ND     |           | ug/l  | 0.80 | 0.03 | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-01

Date Collected: 11/16/17 15:00

Client ID: MW-3

Date Received: 11/16/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS-SIM - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 48         |           | 21-120              |
| Phenol-d6            | 31         |           | 10-120              |
| Nitrobenzene-d5      | 81         |           | 23-120              |
| 2-Fluorobiphenyl     | 78         |           | 15-120              |
| 2,4,6-Tribromophenol | 72         |           | 10-120              |
| 4-Terphenyl-d14      | 74         |           | 41-149              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

## SAMPLE RESULTS

Lab ID: L1742330-02  
 Client ID: MW-4  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 13:30  
 Date Received: 11/16/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 11/21/17 21:04

Matrix: Water  
 Analytical Method: 1,8270D  
 Analytical Date: 11/23/17 23:09  
 Analyst: RC

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| 1,2,4-Trichlorobenzene                           | ND     |           | ug/l  | 5.0 | 0.66 | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/l  | 2.0 | 0.67 | 1               |
| 1,2-Dichlorobenzene                              | ND     |           | ug/l  | 2.0 | 0.73 | 1               |
| 1,3-Dichlorobenzene                              | ND     |           | ug/l  | 2.0 | 0.69 | 1               |
| 1,4-Dichlorobenzene                              | ND     |           | ug/l  | 2.0 | 0.71 | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/l  | 5.0 | 1.4  | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/l  | 5.0 | 0.84 | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/l  | 2.0 | 0.62 | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/l  | 2.0 | 0.73 | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/l  | 2.0 | 0.70 | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/l  | 20  | 7.8  | 1               |
| Isophorone                                       | ND     |           | ug/l  | 5.0 | 0.60 | 1               |
| Nitrobenzene                                     | ND     |           | ug/l  | 2.0 | 0.75 | 1               |
| NDPA/DPA   | ND     |           | ug/l  | 2.0 | 0.64 | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/l  | 5.0 | 0.70 | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/l  | 3.0 | 0.91 | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/l  | 5.0 | 1.3  | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/l  | 5.0 | 0.69 | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| Diethyl phthalate                                | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| Dimethyl phthalate                               | ND     |           | ug/l  | 5.0 | 0.65 | 1               |
| Biphenyl   | ND     |           | ug/l  | 2.0 | 0.76 | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.2  | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.3  | 1               |
| Dibenzofuran                                     | ND     |           | ug/l  | 2.0 | 0.66 | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/l  | 10  | 0.67 | 1               |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS****Lab ID:** L1742330-02**Date Collected:** 11/16/17 13:30**Client ID:** MW-4**Date Received:** 11/16/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Acetophenone                                     | ND     |           | ug/l  | 5.0 | 0.85 | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/l  | 5.0 | 0.68 | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/l  | 2.0 | 0.62 | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/l  | 2.0 | 0.63 | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/l  | 5.0 | 0.77 | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/l  | 5.0 | 1.6  | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/l  | 10  | 1.5  | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/l  | 10  | 1.8  | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/l  | 20  | 5.5  | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/l  | 10  | 2.1  | 1               |
| Phenol   | ND     |           | ug/l  | 5.0 | 1.9  | 1               |
| 2-Methylphenol                                   | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/l  | 5.0 | 0.72 | 1               |
| Benzoic Acid                                     | ND     |           | ug/l  | 50  | 13.  | 1               |
| Benzyl Alcohol                                   | ND     |           | ug/l  | 2.0 | 0.72 | 1               |
| Carbazole  | ND     |           | ug/l  | 2.0 | 0.63 | 1               |
| Atrazine   | ND     |           | ug/l  | 10  | 1.8  | 1               |
| Benzaldehyde                                     | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| Caprolactam                                      | ND     |           | ug/l  | 10  | 3.6  | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/l  | 5.0 | 0.93 | 1               |

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 50         |           | 21-120              |
| Phenol-d6            | 33         |           | 10-120              |
| Nitrobenzene-d5      | 79         |           | 23-120              |
| 2-Fluorobiphenyl     | 80         |           | 15-120              |
| 2,4,6-Tribromophenol | 93         |           | 10-120              |
| 4-Terphenyl-d14      | 85         |           | 41-149              |

**Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1742330**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-02  
 Client ID: MW-4  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 13:30  
 Date Received: 11/16/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 11/21/17 21:00

Matrix: Water  
 Analytical Method: 1,8270D-SIM  
 Analytical Date: 11/25/17 05:37  
 Analyst: KL

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab |        |           |       |      |      |                 |
| Acenaphthene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| 2-Chloronaphthalene                                  | ND     |           | ug/l  | 0.20 | 0.04 | 1               |
| Fluoranthene   | 0.05   | J         | ug/l  | 0.10 | 0.04 | 1               |
| Hexachlorobutadiene                                  | ND     |           | ug/l  | 0.50 | 0.04 | 1               |
| Naphthalene  | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(a)anthracene                                   | ND     |           | ug/l  | 0.10 | 0.02 | 1               |
| Benzo(a)pyrene                                       | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(b)fluoranthene                                 | ND     |           | ug/l  | 0.10 | 0.02 | 1               |
| Benzo(k)fluoranthene                                 | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Chrysene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Acenaphthylene                                       | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Anthracene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(ghi)perylene                                   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Fluorene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Phenanthrene   | 0.22   |           | ug/l  | 0.10 | 0.02 | 1               |
| Dibenzo(a,h)anthracene                               | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Indeno(1,2,3-cd)pyrene                               | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Pyrene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| 2-Methylnaphthalene                                  | ND     |           | ug/l  | 0.10 | 0.05 | 1               |
| Pentachlorophenol                                    | ND     |           | ug/l  | 0.80 | 0.22 | 1               |
| Hexachlorobenzene                                    | ND     |           | ug/l  | 0.80 | 0.03 | 1               |
| Hexachloroethane                                     | ND     |           | ug/l  | 0.80 | 0.03 | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-02

Date Collected: 11/16/17 13:30

Client ID: MW-4

Date Received: 11/16/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS-SIM - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 52         |           | 21-120              |
| Phenol-d6            | 34         |           | 10-120              |
| Nitrobenzene-d5      | 90         |           | 23-120              |
| 2-Fluorobiphenyl     | 84         |           | 15-120              |
| 2,4,6-Tribromophenol | 76         |           | 10-120              |
| 4-Terphenyl-d14      | 78         |           | 41-149              |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-03  
 Client ID: BD  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 16:00  
 Date Received: 11/16/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 11/21/17 21:04

Matrix: Water  
 Analytical Method: 1,8270D  
 Analytical Date: 11/23/17 23:38  
 Analyst: RC

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| 1,2,4-Trichlorobenzene                           | ND     |           | ug/l  | 5.0 | 0.66 | 1               |
| Bis(2-chloroethyl)ether                          | ND     |           | ug/l  | 2.0 | 0.67 | 1               |
| 1,2-Dichlorobenzene                              | ND     |           | ug/l  | 2.0 | 0.73 | 1               |
| 1,3-Dichlorobenzene                              | ND     |           | ug/l  | 2.0 | 0.69 | 1               |
| 1,4-Dichlorobenzene                              | ND     |           | ug/l  | 2.0 | 0.71 | 1               |
| 3,3'-Dichlorobenzidine                           | ND     |           | ug/l  | 5.0 | 1.4  | 1               |
| 2,4-Dinitrotoluene                               | ND     |           | ug/l  | 5.0 | 0.84 | 1               |
| 2,6-Dinitrotoluene                               | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 4-Chlorophenyl phenyl ether                      | ND     |           | ug/l  | 2.0 | 0.62 | 1               |
| 4-Bromophenyl phenyl ether                       | ND     |           | ug/l  | 2.0 | 0.73 | 1               |
| Bis(2-chloroisopropyl)ether                      | ND     |           | ug/l  | 2.0 | 0.70 | 1               |
| Bis(2-chloroethoxy)methane                       | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| Hexachlorocyclopentadiene                        | ND     |           | ug/l  | 20  | 7.8  | 1               |
| Isophorone                                       | ND     |           | ug/l  | 5.0 | 0.60 | 1               |
| Nitrobenzene                                     | ND     |           | ug/l  | 2.0 | 0.75 | 1               |
| NDPA/DPA   | ND     |           | ug/l  | 2.0 | 0.64 | 1               |
| n-Nitrosodi-n-propylamine                        | ND     |           | ug/l  | 5.0 | 0.70 | 1               |
| Bis(2-ethylhexyl)phthalate                       | ND     |           | ug/l  | 3.0 | 0.91 | 1               |
| Butyl benzyl phthalate                           | ND     |           | ug/l  | 5.0 | 1.3  | 1               |
| Di-n-butylphthalate                              | ND     |           | ug/l  | 5.0 | 0.69 | 1               |
| Di-n-octylphthalate                              | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| Diethyl phthalate                                | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| Dimethyl phthalate                               | ND     |           | ug/l  | 5.0 | 0.65 | 1               |
| Biphenyl   | ND     |           | ug/l  | 2.0 | 0.76 | 1               |
| 4-Chloroaniline                                  | ND     |           | ug/l  | 5.0 | 0.63 | 1               |
| 2-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 3-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.2  | 1               |
| 4-Nitroaniline                                   | ND     |           | ug/l  | 5.0 | 1.3  | 1               |
| Dibenzofuran                                     | ND     |           | ug/l  | 2.0 | 0.66 | 1               |
| 1,2,4,5-Tetrachlorobenzene                       | ND     |           | ug/l  | 10  | 0.67 | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS****Lab ID:** L1742330-03**Date Collected:** 11/16/17 16:00**Client ID:** BD**Date Received:** 11/16/17**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified

| Parameter  | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Semivolatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Acetophenone                                     | ND     |           | ug/l  | 5.0 | 0.85 | 1               |
| 2,4,6-Trichlorophenol                            | ND     |           | ug/l  | 5.0 | 0.68 | 1               |
| p-Chloro-m-cresol                                | ND     |           | ug/l  | 2.0 | 0.62 | 1               |
| 2-Chlorophenol                                   | ND     |           | ug/l  | 2.0 | 0.63 | 1               |
| 2,4-Dichlorophenol                               | ND     |           | ug/l  | 5.0 | 0.77 | 1               |
| 2,4-Dimethylphenol                               | ND     |           | ug/l  | 5.0 | 1.6  | 1               |
| 2-Nitrophenol                                    | ND     |           | ug/l  | 10  | 1.5  | 1               |
| 4-Nitrophenol                                    | ND     |           | ug/l  | 10  | 1.8  | 1               |
| 2,4-Dinitrophenol                                | ND     |           | ug/l  | 20  | 5.5  | 1               |
| 4,6-Dinitro-o-cresol                             | ND     |           | ug/l  | 10  | 2.1  | 1               |
| Phenol   | ND     |           | ug/l  | 5.0 | 1.9  | 1               |
| 2-Methylphenol                                   | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 3-Methylphenol/4-Methylphenol                    | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| 2,4,5-Trichlorophenol                            | ND     |           | ug/l  | 5.0 | 0.72 | 1               |
| Benzoic Acid                                     | ND     |           | ug/l  | 50  | 13.  | 1               |
| Benzyl Alcohol                                   | ND     |           | ug/l  | 2.0 | 0.72 | 1               |
| Carbazole  | ND     |           | ug/l  | 2.0 | 0.63 | 1               |
| Atrazine   | ND     |           | ug/l  | 10  | 1.8  | 1               |
| Benzaldehyde                                     | ND     |           | ug/l  | 5.0 | 1.1  | 1               |
| Caprolactam                                      | ND     |           | ug/l  | 10  | 3.6  | 1               |
| 2,3,4,6-Tetrachlorophenol                        | ND     |           | ug/l  | 5.0 | 0.93 | 1               |

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 47         |           | 21-120              |
| Phenol-d6            | 32         |           | 10-120              |
| Nitrobenzene-d5      | 78         |           | 23-120              |
| 2-Fluorobiphenyl     | 77         |           | 15-120              |
| 2,4,6-Tribromophenol | 91         |           | 10-120              |
| 4-Terphenyl-d14      | 84         |           | 41-149              |

Project Name: MAIN &amp; E. BALCOM

Project Number: T0239-016-001

Lab Number: L1742330

Report Date: 11/27/17

## SAMPLE RESULTS

Lab ID: L1742330-03  
 Client ID: BD  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 16:00  
 Date Received: 11/16/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 11/21/17 21:00

Matrix: Water  
 Analytical Method: 1,8270D-SIM  
 Analytical Date: 11/25/17 06:40  
 Analyst: KL

| Parameter  | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab |        |           |       |      |      |                 |
| Acenaphthene   | 0.04   | J         | ug/l  | 0.10 | 0.04 | 1               |
| 2-Chloronaphthalene                                  | ND     |           | ug/l  | 0.20 | 0.04 | 1               |
| Fluoranthene   | 0.07   | J         | ug/l  | 0.10 | 0.04 | 1               |
| Hexachlorobutadiene                                  | ND     |           | ug/l  | 0.50 | 0.04 | 1               |
| Naphthalene  | 0.04   | J         | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(a)anthracene                                   | 0.02   | J         | ug/l  | 0.10 | 0.02 | 1               |
| Benzo(a)pyrene                                       | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(b)fluoranthene                                 | ND     |           | ug/l  | 0.10 | 0.02 | 1               |
| Benzo(k)fluoranthene                                 | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Chrysene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Acenaphthylene                                       | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Anthracene   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Benzo(ghi)perylene                                   | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Fluorene   | 0.06   | J         | ug/l  | 0.10 | 0.04 | 1               |
| Phenanthrene   | 0.32   |           | ug/l  | 0.10 | 0.02 | 1               |
| Dibenzo(a,h)anthracene                               | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Indeno(1,2,3-cd)pyrene                               | ND     |           | ug/l  | 0.10 | 0.04 | 1               |
| Pyrene   | 0.05   | J         | ug/l  | 0.10 | 0.04 | 1               |
| 2-Methylnaphthalene                                  | 0.06   | J         | ug/l  | 0.10 | 0.05 | 1               |
| Pentachlorophenol                                    | ND     |           | ug/l  | 0.80 | 0.22 | 1               |
| Hexachlorobenzene                                    | ND     |           | ug/l  | 0.80 | 0.03 | 1               |
| Hexachloroethane                                     | ND     |           | ug/l  | 0.80 | 0.03 | 1               |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-03

Date Collected: 11/16/17 16:00

Client ID: BD

Date Received: 11/16/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

| Parameter | Result | Qualifier | Units | RL | MDL | Dilution Factor |
|-----------|--------|-----------|-------|----|-----|-----------------|
|-----------|--------|-----------|-------|----|-----|-----------------|

Semivolatile Organics by GC/MS-SIM - Westborough Lab

| Surrogate            | % Recovery | Qualifier | Acceptance Criteria |
|----------------------|------------|-----------|---------------------|
| 2-Fluorophenol       | 47         |           | 21-120              |
| Phenol-d6            | 34         |           | 10-120              |
| Nitrobenzene-d5      | 84         |           | 23-120              |
| 2-Fluorobiphenyl     | 83         |           | 15-120              |
| 2,4,6-Tribromophenol | 76         |           | 10-120              |
| 4-Terphenyl-d14      | 77         |           | 41-149              |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 11/21/17 23:34  
 Analyst: CB

Extraction Method: EPA 3510C  
 Extraction Date: 11/20/17 21:15

| Parameter  | Result | Qualifier | Units | RL  | MDL  |
|--|--------|-----------|-------|-----|------|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-03 Batch: WG1065030-1 |        |           |       |     |      |
| 1,2,4-Trichlorobenzene   | ND     |           | ug/l  | 5.0 | 0.66 |
| Bis(2-chloroethyl)ether  | ND     |           | ug/l  | 2.0 | 0.67 |
| 1,2-Dichlorobenzene  | ND     |           | ug/l  | 2.0 | 0.73 |
| 1,3-Dichlorobenzene  | ND     |           | ug/l  | 2.0 | 0.69 |
| 1,4-Dichlorobenzene  | ND     |           | ug/l  | 2.0 | 0.71 |
| 3,3'-Dichlorobenzidine   | ND     |           | ug/l  | 5.0 | 1.4  |
| 2,4-Dinitrotoluene   | ND     |           | ug/l  | 5.0 | 0.84 |
| 2,6-Dinitrotoluene   | ND     |           | ug/l  | 5.0 | 1.1  |
| 4-Chlorophenyl phenyl ether  | ND     |           | ug/l  | 2.0 | 0.62 |
| 4-Bromophenyl phenyl ether   | ND     |           | ug/l  | 2.0 | 0.73 |
| Bis(2-chloroisopropyl)ether  | ND     |           | ug/l  | 2.0 | 0.70 |
| Bis(2-chloroethoxy)methane   | ND     |           | ug/l  | 5.0 | 0.63 |
| Hexachlorocyclopentadiene  | ND     |           | ug/l  | 20  | 7.8  |
| Isophorone   | ND     |           | ug/l  | 5.0 | 0.60 |
| Nitrobenzene   | ND     |           | ug/l  | 2.0 | 0.75 |
| NDPA/DPA   | ND     |           | ug/l  | 2.0 | 0.64 |
| n-Nitrosodi-n-propylamine  | ND     |           | ug/l  | 5.0 | 0.70 |
| Bis(2-ethylhexyl)phthalate   | 1.9    | J         | ug/l  | 3.0 | 0.91 |
| Butyl benzyl phthalate   | ND     |           | ug/l  | 5.0 | 1.3  |
| Di-n-butylphthalate  | ND     |           | ug/l  | 5.0 | 0.69 |
| Di-n-octylphthalate  | ND     |           | ug/l  | 5.0 | 1.1  |
| Diethyl phthalate  | ND     |           | ug/l  | 5.0 | 0.63 |
| Dimethyl phthalate   | ND     |           | ug/l  | 5.0 | 0.65 |
| Biphenyl   | ND     |           | ug/l  | 2.0 | 0.76 |
| 4-Chloroaniline  | ND     |           | ug/l  | 5.0 | 0.63 |
| 2-Nitroaniline   | ND     |           | ug/l  | 5.0 | 1.1  |
| 3-Nitroaniline   | ND     |           | ug/l  | 5.0 | 1.2  |
| 4-Nitroaniline   | ND     |           | ug/l  | 5.0 | 1.3  |
| Dibenzofuran   | ND     |           | ug/l  | 2.0 | 0.66 |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D  
 Analytical Date: 11/21/17 23:34  
 Analyst: CB

Extraction Method: EPA 3510C  
 Extraction Date: 11/20/17 21:15

| Parameter  | Result | Qualifier | Units | RL  | MDL  |
|--|--------|-----------|-------|-----|------|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-03 Batch: WG1065030-1 |        |           |       |     |      |
| 1,2,4,5-Tetrachlorobenzene   | ND     |           | ug/l  | 10  | 0.67 |
| Acetophenone   | ND     |           | ug/l  | 5.0 | 0.85 |
| 2,4,6-Trichlorophenol  | ND     |           | ug/l  | 5.0 | 0.68 |
| p-Chloro-m-cresol  | ND     |           | ug/l  | 2.0 | 0.62 |
| 2-Chlorophenol   | ND     |           | ug/l  | 2.0 | 0.63 |
| 2,4-Dichlorophenol   | ND     |           | ug/l  | 5.0 | 0.77 |
| 2,4-Dimethylphenol   | ND     |           | ug/l  | 5.0 | 1.6  |
| 2-Nitrophenol  | ND     |           | ug/l  | 10  | 1.5  |
| 4-Nitrophenol  | ND     |           | ug/l  | 10  | 1.8  |
| 2,4-Dinitrophenol  | ND     |           | ug/l  | 20  | 5.5  |
| 4,6-Dinitro-o-cresol   | ND     |           | ug/l  | 10  | 2.1  |
| Phenol   | ND     |           | ug/l  | 5.0 | 1.9  |
| 2-Methylphenol   | ND     |           | ug/l  | 5.0 | 1.0  |
| 3-Methylphenol/4-Methylphenol  | ND     |           | ug/l  | 5.0 | 1.1  |
| 2,4,5-Trichlorophenol  | ND     |           | ug/l  | 5.0 | 0.72 |
| Benzoic Acid   | ND     |           | ug/l  | 50  | 13.  |
| Benzyl Alcohol   | ND     |           | ug/l  | 2.0 | 0.72 |
| Carbazole  | ND     |           | ug/l  | 2.0 | 0.63 |
| Atrazine   | ND     |           | ug/l  | 10  | 1.8  |
| Benzaldehyde   | ND     |           | ug/l  | 5.0 | 1.1  |
| Caprolactam  | ND     |           | ug/l  | 10  | 3.6  |
| 2,3,4,6-Tetrachlorophenol  | ND     |           | ug/l  | 5.0 | 0.93 |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**Method Blank Analysis**  
**Batch Quality Control**Analytical Method: 1,8270D  
Analytical Date: 11/21/17 23:34  
Analyst: CBExtraction Method: EPA 3510C  
Extraction Date: 11/20/17 21:15

| Parameter  | Result | Qualifier | Units | RL | MDL |
|--|--------|-----------|-------|----|-----|
| Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01-03 Batch: WG1065030-1 |        |           |       |    |     |

| Surrogate            | %Recovery | Qualifier | Acceptance<br>Criteria |
|----------------------|-----------|-----------|------------------------|
| 2-Fluorophenol       | 44        |           | 21-120                 |
| Phenol-d6            | 30        |           | 10-120                 |
| Nitrobenzene-d5      | 70        |           | 23-120                 |
| 2-Fluorobiphenyl     | 72        |           | 15-120                 |
| 2,4,6-Tribromophenol | 95        |           | 10-120                 |
| 4-Terphenyl-d14      | 92        |           | 41-149                 |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8270D-SIM

Extraction Method: EPA 3510C

Analytical Date: 11/25/17 02:25

Extraction Date: 11/20/17 21:21

Analyst: KL

| Parameter  | Result | Qualifier | Units | RL   | MDL  |
|--|--------|-----------|-------|------|------|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab for sample(s): 01-03 Batch: WG1065035-1 |        |           |       |      |      |
| Acenaphthene   | ND     |           | ug/l  | 0.10 | 0.04 |
| 2-Chloronaphthalene  | ND     |           | ug/l  | 0.20 | 0.04 |
| Fluoranthene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Hexachlorobutadiene  | ND     |           | ug/l  | 0.50 | 0.04 |
| Naphthalene  | ND     |           | ug/l  | 0.10 | 0.04 |
| Benzo(a)anthracene   | ND     |           | ug/l  | 0.10 | 0.02 |
| Benzo(a)pyrene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Benzo(b)fluoranthene   | ND     |           | ug/l  | 0.10 | 0.02 |
| Benzo(k)fluoranthene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Chrysene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Acenaphthylene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Anthracene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Benzo(ghi)perylene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Fluorene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Phenanthrene   | ND     |           | ug/l  | 0.10 | 0.02 |
| Dibenzo(a,h)anthracene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Indeno(1,2,3-cd)pyrene   | ND     |           | ug/l  | 0.10 | 0.04 |
| Pyrene   | ND     |           | ug/l  | 0.10 | 0.04 |
| 2-Methylnaphthalene  | ND     |           | ug/l  | 0.10 | 0.05 |
| Pentachlorophenol  | ND     |           | ug/l  | 0.80 | 0.22 |
| Hexachlorobenzene  | ND     |           | ug/l  | 0.80 | 0.03 |
| Hexachloroethane   | ND     |           | ug/l  | 0.80 | 0.03 |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**Method Blank Analysis**  
**Batch Quality Control**

Analytical Method: 1,8270D-SIM

Extraction Method: EPA 3510C

Analytical Date: 11/25/17 02:25

Extraction Date: 11/20/17 21:21

Analyst: KL

| Parameter  | Result | Qualifier | Units | RL | MDL |
|--|--------|-----------|-------|----|-----|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab for sample(s): 01-03 Batch: WG1065035-1 |        |           |       |    |     |

| Surrogate            | %Recovery | Qualifier | Acceptance<br>Criteria |
|----------------------|-----------|-----------|------------------------|
| 2-Fluorophenol       | 45        |           | 21-120                 |
| Phenol-d6            | 31        |           | 10-120                 |
| Nitrobenzene-d5      | 81        |           | 23-120                 |
| 2-Fluorobiphenyl     | 70        |           | 15-120                 |
| 2,4,6-Tribromophenol | 65        |           | 10-120                 |
| 4-Terphenyl-d14      | 77        |           | 41-149                 |

## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 Batch: WG1065030-2 WG1065030-3 |                  |      |                   |      |                     |     |      |               |
| 1,2,4-Trichlorobenzene  | 69               |      | 66                |      | 39-98               | 4   |      | 30            |
| Bis(2-chloroethyl)ether   | 85               |      | 82                |      | 40-140              | 4   |      | 30            |
| 1,2-Dichlorobenzene   | 63               |      | 63                |      | 40-140              | 0   |      | 30            |
| 1,3-Dichlorobenzene   | 59               |      | 61                |      | 40-140              | 3   |      | 30            |
| 1,4-Dichlorobenzene   | 59               |      | 62                |      | 36-97               | 5   |      | 30            |
| 3,3'-Dichlorobenzidine  | 83               |      | 69                |      | 40-140              | 18  |      | 30            |
| 2,4-Dinitrotoluene  | 106              |      | 94                |      | 48-143              | 12  |      | 30            |
| 2,6-Dinitrotoluene  | 134              |      | 112               |      | 40-140              | 18  |      | 30            |
| 4-Chlorophenyl phenyl ether   | 89               |      | 85                |      | 40-140              | 5   |      | 30            |
| 4-Bromophenyl phenyl ether  | 99               |      | 92                |      | 40-140              | 7   |      | 30            |
| Bis(2-chloroisopropyl)ether   | 110              |      | 106               |      | 40-140              | 4   |      | 30            |
| Bis(2-chloroethoxy)methane  | 99               |      | 88                |      | 40-140              | 12  |      | 30            |
| Hexachlorocyclopentadiene   | 49               |      | 49                |      | 40-140              | 0   |      | 30            |
| Isophorone  | 110              |      | 97                |      | 40-140              | 13  |      | 30            |
| Nitrobenzene  | 103              |      | 94                |      | 40-140              | 9   |      | 30            |
| NDPA/DPA  | 98               |      | 91                |      | 40-140              | 7   |      | 30            |
| n-Nitrosodi-n-propylamine   | 111              |      | 101               |      | 29-132              | 9   |      | 30            |
| Bis(2-ethylhexyl)phthalate  | 90               |      | 85                |      | 40-140              | 6   |      | 30            |
| Butyl benzyl phthalate  | 123              |      | 106               |      | 40-140              | 15  |      | 30            |
| Di-n-butylphthalate   | 107              |      | 97                |      | 40-140              | 10  |      | 30            |
| Di-n-octylphthalate   | 97               |      | 89                |      | 40-140              | 9   |      | 30            |
| Diethyl phthalate   | 99               |      | 91                |      | 40-140              | 8   |      | 30            |
| Dimethyl phthalate  | 111              |      | 94                |      | 40-140              | 17  |      | 30            |

# Lab Control Sample Analysis

## Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: T0239-016-001

Lab Number: L1742330

Report Date: 11/27/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 Batch: WG1065030-2 WG1065030-3 |                  |      |                   |      |                     |     |      |               |
| Biphenyl  | 88               |      | 83                |      | 40-140              | 6   |      | 30            |
| 4-Chloroaniline   | 65               |      | 62                |      | 40-140              | 5   |      | 30            |
| 2-Nitroaniline  | 140              |      | 119               |      | 52-143              | 16  |      | 30            |
| 3-Nitroaniline  | 88               |      | 79                |      | 25-145              | 11  |      | 30            |
| 4-Nitroaniline  | 107              |      | 97                |      | 51-143              | 10  |      | 30            |
| Dibenzofuran  | 82               |      | 80                |      | 40-140              | 2   |      | 30            |
| 1,2,4,5-Tetrachlorobenzene  | 86               |      | 82                |      | 2-134               | 5   |      | 30            |
| Acetophenone  | 98               |      | 90                |      | 39-129              | 9   |      | 30            |
| 2,4,6-Trichlorophenol   | 115              |      | 103               |      | 30-130              | 11  |      | 30            |
| p-Chloro-m-cresol   | 111              | Q    | 97                |      | 23-97               | 13  |      | 30            |
| 2-Chlorophenol  | 86               |      | 81                |      | 27-123              | 6   |      | 30            |
| 2,4-Dichlorophenol  | 105              |      | 91                |      | 30-130              | 14  |      | 30            |
| 2,4-Dimethylphenol  | 68               |      | 80                |      | 30-130              | 16  |      | 30            |
| 2-Nitrophenol   | 118              |      | 105               |      | 30-130              | 12  |      | 30            |
| 4-Nitrophenol   | 79               |      | 68                |      | 10-80               | 15  |      | 30            |
| 2,4-Dinitrophenol   | 109              |      | 96                |      | 20-130              | 13  |      | 30            |
| 4,6-Dinitro-o-cresol  | 127              |      | 109               |      | 20-164              | 15  |      | 30            |
| Phenol  | 48               |      | 44                |      | 12-110              | 9   |      | 30            |
| 2-Methylphenol  | 81               |      | 75                |      | 30-130              | 8   |      | 30            |
| 3-Methylphenol/4-Methylphenol   | 80               |      | 72                |      | 30-130              | 11  |      | 30            |
| 2,4,5-Trichlorophenol   | 119              |      | 101               |      | 30-130              | 16  |      | 30            |
| Benzoic Acid  | 50               |      | 39                |      | 10-164              | 25  |      | 30            |
| Benzyl Alcohol  | 93               |      | 85                |      | 26-116              | 9   |      | 30            |

## Lab Control Sample Analysis

### Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 Batch: WG1065030-2 WG1065030-3 |                  |      |                   |      |                     |     |      |               |
| Carbazole   | 97               |      | 93                |      | 55-144              | 4   |      | 30            |
| Atrazine  | 142              | Q    | 122               |      | 40-140              | 15  |      | 30            |
| Benzaldehyde  | 89               |      | 87                |      | 40-140              | 2   |      | 30            |
| Caprolactam   | 52               |      | 45                |      | 10-130              | 14  |      | 30            |
| 2,3,4,6-Tetrachlorophenol   | 112              |      | 104               |      | 40-140              | 7   |      | 30            |

| Surrogate            | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|----------------------|------------------|------|-------------------|------|------------------------|
| 2-Fluorophenol       | 54               |      | 51                |      | 21-120                 |
| Phenol-d6            | 44               |      | 39                |      | 10-120                 |
| Nitrobenzene-d5      | 107              |      | 97                |      | 23-120                 |
| 2-Fluorobiphenyl     | 93               |      | 84                |      | 15-120                 |
| 2,4,6-Tribromophenol | 116              |      | 108               |      | 10-120                 |
| 4-Terphenyl-d14      | 110              |      | 97                |      | 41-149                 |

# Lab Control Sample Analysis

## Batch Quality Control

Project Name: MAIN &amp; E. BALCOM

Project Number: T0239-016-001

Lab Number: L1742330

Report Date: 11/27/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab Associated sample(s): 01-03 Batch: WG1065035-2 WG1065035-3 |                  |      |                   |      |                     |     |      |               |
| Acenaphthene  | 74               |      | 82                |      | 40-140              | 10  |      | 40            |
| 2-Chloronaphthalene   | 65               |      | 72                |      | 40-140              | 10  |      | 40            |
| Fluoranthene  | 74               |      | 82                |      | 40-140              | 10  |      | 40            |
| Hexachlorobutadiene   | 47               |      | 52                |      | 40-140              | 10  |      | 40            |
| Naphthalene   | 65               |      | 73                |      | 40-140              | 12  |      | 40            |
| Benzo(a)anthracene  | 74               |      | 82                |      | 40-140              | 10  |      | 40            |
| Benzo(a)pyrene  | 79               |      | 87                |      | 40-140              | 10  |      | 40            |
| Benzo(b)fluoranthene  | 82               |      | 89                |      | 40-140              | 8   |      | 40            |
| Benzo(k)fluoranthene  | 79               |      | 86                |      | 40-140              | 8   |      | 40            |
| Chrysene  | 80               |      | 89                |      | 40-140              | 11  |      | 40            |
| Acenaphthylene  | 69               |      | 76                |      | 40-140              | 10  |      | 40            |
| Anthracene  | 77               |      | 84                |      | 40-140              | 9   |      | 40            |
| Benzo(ghi)perylene  | 81               |      | 89                |      | 40-140              | 9   |      | 40            |
| Fluorene  | 71               |      | 78                |      | 40-140              | 9   |      | 40            |
| Phenanthrene  | 78               |      | 85                |      | 40-140              | 9   |      | 40            |
| Dibenzo(a,h)anthracene  | 78               |      | 86                |      | 40-140              | 10  |      | 40            |
| Indeno(1,2,3-cd)pyrene  | 80               |      | 88                |      | 40-140              | 10  |      | 40            |
| Pyrene  | 73               |      | 80                |      | 40-140              | 9   |      | 40            |
| 2-Methylnaphthalene   | 62               |      | 69                |      | 40-140              | 11  |      | 40            |
| Pentachlorophenol   | 69               |      | 76                |      | 40-140              | 10  |      | 40            |
| Hexachlorobenzene   | 62               |      | 67                |      | 40-140              | 8   |      | 40            |
| Hexachloroethane  | 61               |      | 67                |      | 40-140              | 9   |      | 40            |



# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1742330

**Project Number:** T0239-016-001

**Report Date:** 11/27/17

| <b>Parameter</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|

Semivolatile Organics by GC/MS-SIM - Westborough Lab Associated sample(s): 01-03 Batch: WG1065035-2 WG1065035-3

| <b>Surrogate</b>     | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> |
|----------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|
| 2-Fluorophenol       | 48                       |             | 54                        |             | 21-120                         |
| Phenol-d6            | 31                       |             | 36                        |             | 10-120                         |
| Nitrobenzene-d5      | 79                       |             | 88                        |             | 23-120                         |
| 2-Fluorobiphenyl     | 73                       |             | 80                        |             | 15-120                         |
| 2,4,6-Tribromophenol | 68                       |             | 76                        |             | 10-120                         |
| 4-Terphenyl-d14      | 75                       |             | 81                        |             | 41-149                         |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1742330

**Report Date:** 11/27/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1065030-4 WG1065030-5 QC Sample: L1742330-02 Client ID: MW-4 |               |          |          |              |      |           |               |      |                 |     |      |            |
| 1,2,4-Trichlorobenzene   | ND            | 40       | 29       | 73           |      | 28        | 70            |      | 39-98           | 4   |      | 30         |
| Bis(2-chloroethyl)ether  | ND            | 40       | 29       | 73           |      | 29        | 73            |      | 40-140          | 0   |      | 30         |
| 1,2-Dichlorobenzene  | ND            | 40       | 28       | 70           |      | 26        | 65            |      | 40-140          | 7   |      | 30         |
| 1,3-Dichlorobenzene  | ND            | 40       | 27       | 68           |      | 25        | 63            |      | 40-140          | 8   |      | 30         |
| 1,4-Dichlorobenzene  | ND            | 40       | 27       | 68           |      | 25        | 63            |      | 36-97           | 8   |      | 30         |
| 3,3'-Dichlorobenzidine   | ND            | 40       | 20       | 50           |      | 10        | 25            | Q    | 40-140          | 67  | Q    | 30         |
| 2,4-Dinitrotoluene   | ND            | 40       | 34       | 85           |      | 33        | 83            |      | 48-143          | 3   |      | 30         |
| 2,6-Dinitrotoluene   | ND            | 40       | 31       | 78           |      | 30        | 75            |      | 40-140          | 3   |      | 30         |
| 4-Chlorophenyl phenyl ether  | ND            | 40       | 31       | 78           |      | 31        | 78            |      | 40-140          | 0   |      | 30         |
| 4-Bromophenyl phenyl ether   | ND            | 40       | 31       | 78           |      | 31        | 78            |      | 40-140          | 0   |      | 30         |
| Bis(2-chloroisopropyl)ether  | ND            | 40       | 29       | 73           |      | 29        | 73            |      | 40-140          | 0   |      | 30         |
| Bis(2-chloroethoxy)methane   | ND            | 40       | 31       | 78           |      | 31        | 78            |      | 40-140          | 0   |      | 30         |
| Hexachlorocyclopentadiene  | ND            | 40       | 25       | 63           |      | 23        | 58            |      | 40-140          | 8   |      | 30         |
| Isophorone   | ND            | 40       | 32       | 80           |      | 32        | 80            |      | 40-140          | 0   |      | 30         |
| Nitrobenzene   | ND            | 40       | 31       | 78           |      | 30        | 75            |      | 40-140          | 3   |      | 30         |
| NDPA/DPA   | ND            | 40       | 31       | 78           |      | 31        | 78            |      | 40-140          | 0   |      | 30         |
| n-Nitrosodi-n-propylamine  | ND            | 40       | 32       | 80           |      | 32        | 80            |      | 29-132          | 0   |      | 30         |
| Bis(2-ethylhexyl)phthalate   | ND            | 40       | 39       | 98           |      | 39        | 98            |      | 40-140          | 0   |      | 30         |
| Butyl benzyl phthalate   | ND            | 40       | 37       | 93           |      | 39        | 98            |      | 40-140          | 5   |      | 30         |
| Di-n-butylphthalate  | ND            | 40       | 35       | 88           |      | 36        | 90            |      | 40-140          | 3   |      | 30         |
| Di-n-octylphthalate  | ND            | 40       | 35       | 88           |      | 37        | 93            |      | 40-140          | 6   |      | 30         |
| Diethyl phthalate  | ND            | 40       | 32       | 80           |      | 33        | 83            |      | 40-140          | 3   |      | 30         |
| Dimethyl phthalate   | ND            | 40       | 29       | 73           |      | 28        | 70            |      | 40-140          | 4   |      | 30         |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1742330

**Report Date:** 11/27/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1065030-4 WG1065030-5 QC Sample: L1742330-02 Client ID: MW-4 |               |          |          |              |      |           |               |      |                 |     |      |            |
| Biphenyl   | ND            | 40       | 28       | 70           |      | 27        | 68            |      | 40-140          | 4   |      | 30         |
| 4-Chloroaniline  | ND            | 40       | 20       | 50           |      | 19        | 48            |      | 40-140          | 5   |      | 30         |
| 2-Nitroaniline   | ND            | 40       | 32       | 80           |      | 31        | 78            |      | 52-143          | 3   |      | 30         |
| 3-Nitroaniline   | ND            | 40       | 26       | 65           |      | 26        | 65            |      | 25-145          | 0   |      | 30         |
| 4-Nitroaniline   | ND            | 40       | 31       | 78           |      | 28        | 70            |      | 51-143          | 10  |      | 30         |
| Dibenzofuran   | ND            | 40       | 30       | 75           |      | 30        | 75            |      | 40-140          | 0   |      | 30         |
| 1,2,4,5-Tetrachlorobenzene   | ND            | 40       | 28       | 70           |      | 26        | 65            |      | 2-134           | 7   |      | 30         |
| Acetophenone   | ND            | 40       | 33       | 83           |      | 32        | 80            |      | 39-129          | 3   |      | 30         |
| 2,4,6-Trichlorophenol  | ND            | 40       | 30       | 75           |      | 30        | 75            |      | 30-130          | 0   |      | 30         |
| p-Chloro-m-cresol  | ND            | 40       | 29       | 73           |      | 29        | 73            |      | 23-97           | 0   |      | 30         |
| 2-Chlorophenol   | ND            | 40       | 31       | 78           |      | 30        | 75            |      | 27-123          | 3   |      | 30         |
| 2,4-Dichlorophenol   | ND            | 40       | 33       | 83           |      | 34        | 85            |      | 30-130          | 3   |      | 30         |
| 2,4-Dimethylphenol   | ND            | 40       | 30       | 75           |      | 25        | 63            |      | 30-130          | 18  |      | 30         |
| 2-Nitrophenol  | ND            | 40       | 33       | 83           |      | 33        | 83            |      | 30-130          | 0   |      | 30         |
| 4-Nitrophenol  | ND            | 40       | 20       | 50           |      | 20        | 50            |      | 10-80           | 0   |      | 30         |
| 2,4-Dinitrophenol  | ND            | 40       | 33       | 83           |      | 32        | 80            |      | 20-130          | 3   |      | 30         |
| 4,6-Dinitro-o-cresol   | ND            | 40       | 33       | 83           |      | 33        | 83            |      | 20-164          | 0   |      | 30         |
| Phenol   | ND            | 40       | 15       | 38           |      | 14        | 35            |      | 12-110          | 7   |      | 30         |
| 2-Methylphenol   | ND            | 40       | 27       | 68           |      | 26        | 65            |      | 30-130          | 4   |      | 30         |
| 3-Methylphenol/4-Methylphenol  | ND            | 40       | 26       | 65           |      | 27        | 68            |      | 30-130          | 4   |      | 30         |
| 2,4,5-Trichlorophenol  | ND            | 40       | 31       | 78           |      | 31        | 78            |      | 30-130          | 0   |      | 30         |
| Benzoic Acid   | ND            | 40       | 18J      | 45           |      | 19.J      | 48            |      | 10-164          | 5   |      | 30         |
| Benzyl Alcohol   | ND            | 40       | 26       | 65           |      | 27        | 68            |      | 26-116          | 4   |      | 30         |

**Matrix Spike Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1742330**Report Date:** 11/27/17

| <b>Parameter</b>   | <b>Native Sample</b> | <b>MS Added</b> | <b>MS Found</b> | <b>MS %Recovery</b> | <b>Qual</b> | <b>MSD Found</b> | <b>MSD %Recovery</b> | <b>Qual</b> | <b>Recovery Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD Limits</b> |
|--|----------------------|-----------------|-----------------|---------------------|-------------|------------------|----------------------|-------------|------------------------|------------|-------------|-------------------|
| Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1065030-4 WG1065030-5 QC Sample: L1742330-02 Client ID: MW-4 |                      |                 |                 |                     |             |                  |                      |             |                        |            |             |                   |
| Carbazole  | ND                   | 40              | 32              | 80                  |             | 32               | 80                   |             | 55-144                 | 0          |             | 30                |
| Atrazine   | ND                   | 40              | 37              | 93                  |             | 36               | 90                   |             | 40-140                 | 3          |             | 30                |
| Benzaldehyde   | ND                   | 40              | 30              | 75                  |             | 30               | 75                   |             | 40-140                 | 0          |             | 30                |
| Caprolactam  | ND                   | 40              | 9.5J            | 24                  |             | 10               | 25                   |             | 10-130                 | 5          |             | 30                |
| 2,3,4,6-Tetrachlorophenol  | ND                   | 40              | 32              | 80                  |             | 32               | 80                   |             | 40-140                 | 0          |             | 30                |

| <b>Surrogate</b>     | <b>MS % Recovery</b> | <b>Qualifier</b> | <b>MSD % Recovery</b> | <b>Qualifier</b> | <b>Acceptance Criteria</b> |
|----------------------|----------------------|------------------|-----------------------|------------------|----------------------------|
| 2,4,6-Tribromophenol | 87                   |                  | 86                    |                  | 10-120                     |
| 2-Fluorobiphenyl     | 69                   |                  | 66                    |                  | 15-120                     |
| 2-Fluorophenol       | 50                   |                  | 49                    |                  | 21-120                     |
| 4-Terphenyl-d14      | 74                   |                  | 78                    |                  | 41-149                     |
| Nitrobenzene-d5      | 88                   |                  | 88                    |                  | 23-120                     |
| Phenol-d6            | 36                   |                  | 35                    |                  | 10-120                     |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1742330

**Report Date:** 11/27/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Semivolatile Organics by GC/MS-SIM - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1065035-4 WG1065035-5 QC Sample: L1742330-02 Client ID: MW-4 |               |          |          |              |      |           |               |      |                 |     |      |            |
| Acenaphthene   | ND            | 40       | 36       | 90           |      | 36        | 90            |      | 40-140          | 0   |      | 40         |
| 2-Chloronaphthalene  | ND            | 40       | 32       | 80           |      | 32        | 80            |      | 40-140          | 0   |      | 40         |
| Fluoranthene   | 0.05J         | 40       | 34       | 85           |      | 35        | 88            |      | 40-140          | 3   |      | 40         |
| Hexachlorobutadiene  | ND            | 40       | 23       | 58           |      | 22        | 55            |      | 40-140          | 4   |      | 40         |
| Naphthalene  | ND            | 40       | 31       | 78           |      | 30        | 75            |      | 40-140          | 3   |      | 40         |
| Benzo(a)anthracene   | ND            | 40       | 34       | 85           |      | 35        | 88            |      | 40-140          | 3   |      | 40         |
| Benzo(a)pyrene   | ND            | 40       | 36       | 90           |      | 37        | 93            |      | 40-140          | 3   |      | 40         |
| Benzo(b)fluoranthene   | ND            | 40       | 36       | 90           |      | 38        | 95            |      | 40-140          | 5   |      | 40         |
| Benzo(k)fluoranthene   | ND            | 40       | 36       | 90           |      | 36        | 90            |      | 40-140          | 0   |      | 40         |
| Chrysene   | ND            | 40       | 36       | 90           |      | 37        | 93            |      | 40-140          | 3   |      | 40         |
| Acenaphthylene   | ND            | 40       | 33       | 83           |      | 33        | 83            |      | 40-140          | 0   |      | 40         |
| Anthracene   | ND            | 40       | 36       | 90           |      | 36        | 90            |      | 40-140          | 0   |      | 40         |
| Benzo(ghi)perylene   | ND            | 40       | 36       | 90           |      | 37        | 93            |      | 40-140          | 3   |      | 40         |
| Fluorene   | ND            | 40       | 34       | 85           |      | 34        | 85            |      | 40-140          | 0   |      | 40         |
| Phenanthrene   | 0.22          | 40       | 36       | 89           |      | 37        | 92            |      | 40-140          | 3   |      | 40         |
| Dibenzo(a,h)anthracene   | ND            | 40       | 35       | 88           |      | 35        | 88            |      | 40-140          | 0   |      | 40         |
| Indeno(1,2,3-cd)pyrene   | ND            | 40       | 35       | 88           |      | 37        | 93            |      | 40-140          | 6   |      | 40         |
| Pyrene   | ND            | 40       | 33       | 83           |      | 34        | 85            |      | 40-140          | 3   |      | 40         |
| 2-Methylnaphthalene  | ND            | 40       | 30       | 75           |      | 30        | 75            |      | 40-140          | 0   |      | 40         |
| Pentachlorophenol  | ND            | 40       | 32       | 80           |      | 34        | 85            |      | 40-140          | 6   |      | 40         |
| Hexachlorobenzene  | ND            | 40       | 30       | 75           |      | 30        | 75            |      | 40-140          | 0   |      | 40         |
| Hexachloroethane   | ND            | 40       | 29       | 73           |      | 27        | 68            |      | 40-140          | 7   |      | 40         |

**Matrix Spike Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17

| <b>Parameter</b> | <b>Native Sample</b> | <b>MS Added</b> | <b>MS Found</b> | <b>MS %Recovery</b> | <b>Qual</b> | <b>MSD Found</b> | <b>MSD %Recovery</b> | <b>Qual</b> | <b>Recovery Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD Limits</b> |
|------------------|----------------------|-----------------|-----------------|---------------------|-------------|------------------|----------------------|-------------|------------------------|------------|-------------|-------------------|
|------------------|----------------------|-----------------|-----------------|---------------------|-------------|------------------|----------------------|-------------|------------------------|------------|-------------|-------------------|

Semivolatile Organics by GC/MS-SIM - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1065035-4 WG1065035-5 QC Sample: L1742330-02  
 Client ID: MW-4

| <b>Surrogate</b>     | <b>MS</b>         |                  | <b>MSD</b>        |                  | <b>Acceptance Criteria</b> |
|----------------------|-------------------|------------------|-------------------|------------------|----------------------------|
|                      | <b>% Recovery</b> | <b>Qualifier</b> | <b>% Recovery</b> | <b>Qualifier</b> |                            |
| 2,4,6-Tribromophenol | 60                |                  | 62                |                  | 10-120                     |
| 2-Fluorobiphenyl     | 79                |                  | 82                |                  | 15-120                     |
| 2-Fluorophenol       | 43                |                  | 40                |                  | 21-120                     |
| 4-Terphenyl-d14      | 74                |                  | 76                |                  | 41-149                     |
| Nitrobenzene-d5      | 79                |                  | 78                |                  | 23-120                     |
| Phenol-d6            | 32                |                  | 32                |                  | 10-120                     |

# PCBS

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-01  
 Client ID: MW-3  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 15:00  
 Date Received: 11/16/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 11/21/17 02:53  
 Cleanup Method: EPA 3665A  
 Cleanup Date: 11/22/17  
 Cleanup Method: EPA 3660B  
 Cleanup Date: 11/22/17

Matrix: Water  
 Analytical Method: 1,8082A  
 Analytical Date: 11/27/17 12:46  
 Analyst: JW

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Aroclor 1016                                      | ND     |           | ug/l  | 0.083 | 0.020 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/l  | 0.083 | 0.032 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/l  | 0.083 | 0.027 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/l  | 0.083 | 0.030 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/l  | 0.083 | 0.023 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/l  | 0.083 | 0.035 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/l  | 0.083 | 0.020 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/l  | 0.083 | 0.017 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/l  | 0.083 | 0.027 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/l  | 0.083 | 0.017 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 75         |           | 30-150              | A      |
| Decachlorobiphenyl           | 65         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 75         |           | 30-150              | B      |
| Decachlorobiphenyl           | 69         |           | 30-150              | B      |



Project Name: MAIN &amp; E. BALCOM

Project Number: T0239-016-001

Lab Number: L1742330

Report Date: 11/27/17

## SAMPLE RESULTS

Lab ID: L1742330-02  
 Client ID: MW-4  
 Sample Location: BUFFALO, NY

Matrix: Water  
 Analytical Method: 1,8082A  
 Analytical Date: 11/22/17 17:47  
 Analyst: JW

Date Collected: 11/16/17 13:30  
 Date Received: 11/16/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 11/21/17 02:53  
 Cleanup Method: EPA 3665A  
 Cleanup Date: 11/22/17  
 Cleanup Method: EPA 3660B  
 Cleanup Date: 11/22/17

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Aroclor 1016                                      | ND     |           | ug/l  | 0.083 | 0.020 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/l  | 0.083 | 0.032 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/l  | 0.083 | 0.027 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/l  | 0.083 | 0.030 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/l  | 0.083 | 0.023 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/l  | 0.083 | 0.035 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/l  | 0.083 | 0.020 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/l  | 0.083 | 0.017 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/l  | 0.083 | 0.027 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/l  | 0.083 | 0.017 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 66         |           | 30-150              | A      |
| Decachlorobiphenyl           | 42         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 69         |           | 30-150              | B      |
| Decachlorobiphenyl           | 45         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1742330  
**Report Date:** 11/27/17

**SAMPLE RESULTS**

**Lab ID:** L1742330-03  
**Client ID:** BD  
**Sample Location:** BUFFALO, NY

**Matrix:** Water  
**Analytical Method:** 1,8082A  
**Analytical Date:** 11/27/17 13:00  
**Analyst:** JW

**Date Collected:** 11/16/17 16:00  
**Date Received:** 11/16/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 3510C  
**Extraction Date:** 11/21/17 02:53  
**Cleanup Method:** EPA 3665A  
**Cleanup Date:** 11/22/17  
**Cleanup Method:** EPA 3660B  
**Cleanup Date:** 11/22/17

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Aroclor 1016                                      | ND     |           | ug/l  | 0.083 | 0.020 | 1               | A      |
| Aroclor 1221                                      | ND     |           | ug/l  | 0.083 | 0.032 | 1               | A      |
| Aroclor 1232                                      | ND     |           | ug/l  | 0.083 | 0.027 | 1               | A      |
| Aroclor 1242                                      | ND     |           | ug/l  | 0.083 | 0.030 | 1               | A      |
| Aroclor 1248                                      | ND     |           | ug/l  | 0.083 | 0.023 | 1               | A      |
| Aroclor 1254                                      | ND     |           | ug/l  | 0.083 | 0.035 | 1               | A      |
| Aroclor 1260                                      | ND     |           | ug/l  | 0.083 | 0.020 | 1               | A      |
| Aroclor 1262                                      | ND     |           | ug/l  | 0.083 | 0.017 | 1               | A      |
| Aroclor 1268                                      | ND     |           | ug/l  | 0.083 | 0.027 | 1               | A      |
| PCBs, Total                                       | ND     |           | ug/l  | 0.083 | 0.017 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 52         |           | 30-150              | A      |
| Decachlorobiphenyl           | 63         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 95         |           | 30-150              | B      |
| Decachlorobiphenyl           | 75         |           | 30-150              | B      |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8082A  
 Analytical Date: 11/27/17 13:59  
 Analyst: JW

Extraction Method: EPA 3510C  
 Extraction Date: 11/20/17 20:31  
 Cleanup Method: EPA 3665A  
 Cleanup Date: 11/22/17  
 Cleanup Method: EPA 3660B  
 Cleanup Date: 11/22/17

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Column |
|---|--------|-----------|-------|-------|-------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab for sample(s): 01-03 Batch: WG1065021-1 |        |           |       |       |       |        |
| Aroclor 1016  | ND     |           | ug/l  | 0.083 | 0.020 | A      |
| Aroclor 1221  | ND     |           | ug/l  | 0.083 | 0.032 | A      |
| Aroclor 1232  | ND     |           | ug/l  | 0.083 | 0.027 | A      |
| Aroclor 1242  | ND     |           | ug/l  | 0.083 | 0.030 | A      |
| Aroclor 1248  | ND     |           | ug/l  | 0.083 | 0.023 | A      |
| Aroclor 1254  | ND     |           | ug/l  | 0.083 | 0.035 | A      |
| Aroclor 1260  | ND     |           | ug/l  | 0.083 | 0.020 | A      |
| Aroclor 1262  | ND     |           | ug/l  | 0.083 | 0.017 | A      |
| Aroclor 1268  | ND     |           | ug/l  | 0.083 | 0.027 | A      |
| PCBs, Total   | ND     |           | ug/l  | 0.083 | 0.017 | A      |

| Surrogate                    | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|------------------------------|-----------|-----------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 53        |           | 30-150                 | A      |
| Decachlorobiphenyl           | 90        |           | 30-150                 | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 79        |           | 30-150                 | B      |
| Decachlorobiphenyl           | 99        |           | 30-150                 | B      |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1742330

**Project Number:** T0239-016-001

**Report Date:** 11/27/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits | Column |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|--------|
| Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 01-03 Batch: WG1065021-2 WG1065021-3 |                  |      |                   |      |                     |     |      |               |        |
| Aroclor 1016   | 63               |      | 68                |      | 40-140              | 8   |      | 50            | A      |
| Aroclor 1260   | 72               |      | 70                |      | 40-140              | 3   |      | 50            | A      |

| Surrogate                    | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria | Column |
|------------------------------|------------------|------|-------------------|------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 52               |      | 55                |      | 30-150                 | A      |
| Decachlorobiphenyl           | 66               |      | 62                |      | 30-150                 | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 47               |      | 52                |      | 30-150                 | B      |
| Decachlorobiphenyl           | 62               |      | 63                |      | 30-150                 | B      |

**Matrix Spike Analysis***Batch Quality Control***Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17

| <b>Parameter</b>  | <b>Native Sample</b> | <b>MS Added</b> | <b>MS Found</b> | <b>MS %Recovery</b> | <b>Qual</b> | <b>MSD Found</b> | <b>MSD %Recovery</b> | <b>Qual</b> | <b>Recovery Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD Limits</b> | <b>Column</b> |
|---|----------------------|-----------------|-----------------|---------------------|-------------|------------------|----------------------|-------------|------------------------|------------|-------------|-------------------|---------------|
| Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1065021-4 WG1065021-5 QC Sample: L1742330-02 Client ID: MW-4 |                      |                 |                 |                     |             |                  |                      |             |                        |            |             |                   |               |
| Aroclor 1016  | ND                   | 2.6             | 2.13            | 82                  |             | 2.18             | 84                   |             | 40-140                 | 2          |             | 50                | A             |
| Aroclor 1260  | ND                   | 2.6             | 1.61            | 62                  |             | 1.76             | 68                   |             | 40-140                 | 9          |             | 50                | A             |

| <b>Surrogate</b>             | <b>MS % Recovery</b> | <b>Qualifier</b> | <b>MSD % Recovery</b> | <b>Qualifier</b> | <b>Acceptance Criteria</b> | <b>Column</b> |
|------------------------------|----------------------|------------------|-----------------------|------------------|----------------------------|---------------|
| 2,4,5,6-Tetrachloro-m-xylene | 74                   |                  | 77                    |                  | 30-150                     | A             |
| Decachlorobiphenyl           | 52                   |                  | 53                    |                  | 30-150                     | A             |
| 2,4,5,6-Tetrachloro-m-xylene | 75                   |                  | 80                    |                  | 30-150                     | B             |
| Decachlorobiphenyl           | 54                   |                  | 61                    |                  | 30-150                     | B             |

# PESTICIDES

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-01  
 Client ID: MW-3  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 15:00  
 Date Received: 11/16/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 11/22/17 05:09

Matrix: Water  
 Analytical Method: 1,8081B  
 Analytical Date: 11/22/17 23:30  
 Analyst: KEG

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Delta-BHC   | ND     |           | ug/l  | 0.020 | 0.005 | 1               | A      |
| Lindane   | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Alpha-BHC   | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Beta-BHC  | ND     |           | ug/l  | 0.020 | 0.006 | 1               | A      |
| Heptachlor  | ND     |           | ug/l  | 0.020 | 0.003 | 1               | A      |
| Aldrin  | ND     |           | ug/l  | 0.020 | 0.002 | 1               | A      |
| Heptachlor epoxide                                | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Endrin  | 0.012  | J         | ug/l  | 0.040 | 0.004 | 1               | B      |
| Endrin aldehyde                                   | ND     |           | ug/l  | 0.040 | 0.008 | 1               | A      |
| Endrin ketone                                     | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Dieldrin  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| 4,4'-DDE  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| 4,4'-DDD  | 0.012  | J         | ug/l  | 0.040 | 0.005 | 1               | A      |
| 4,4'-DDT  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| Endosulfan I                                      | ND     |           | ug/l  | 0.020 | 0.003 | 1               | A      |
| Endosulfan II                                     | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Endosulfan sulfate                                | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Methoxychlor                                      | ND     |           | ug/l  | 0.200 | 0.007 | 1               | A      |
| Toxaphene   | ND     |           | ug/l  | 0.200 | 0.063 | 1               | A      |
| cis-Chlordane                                     | ND     |           | ug/l  | 0.020 | 0.007 | 1               | A      |
| trans-Chlordane                                   | ND     |           | ug/l  | 0.020 | 0.006 | 1               | A      |
| Chlordane   | ND     |           | ug/l  | 0.200 | 0.046 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 103        |           | 30-150              | A      |
| Decachlorobiphenyl           | 48         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 87         |           | 30-150              | B      |
| Decachlorobiphenyl           | 49         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1742330  
**Report Date:** 11/27/17

**SAMPLE RESULTS**

**Lab ID:** L1742330-01  
**Client ID:** MW-3  
**Sample Location:** BUFFALO, NY

**Date Collected:** 11/16/17 15:00  
**Date Received:** 11/16/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 8151A  
**Extraction Date:** 11/18/17 08:55

**Matrix:** Water  
**Analytical Method:** 1,8151A  
**Analytical Date:** 11/20/17 02:24  
**Analyst:** SL

**Methylation Date:** 11/18/17 17:55

| Parameter                                      | Result | Qualifier | Units | RL   | MDL   | Dilution Factor | Column |
|--|--------|-----------|-------|------|-------|-----------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab |        |           |       |      |       |                 |        |
| 2,4-D  | ND     |           | ug/l  | 10.0 | 0.498 | 1               | A      |
| 2,4,5-T  | ND     |           | ug/l  | 2.00 | 0.531 | 1               | A      |
| 2,4,5-TP (Silvex)                              | ND     |           | ug/l  | 2.00 | 0.539 | 1               | A      |

| Surrogate | % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|------------|-----------|---------------------|--------|
| DCAA      | 109        |           | 30-150              | A      |
| DCAA      | 81         |           | 30-150              | B      |



**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**SAMPLE RESULTS**

Lab ID: L1742330-02  
 Client ID: MW-4  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 13:30  
 Date Received: 11/16/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 11/22/17 05:09

Matrix: Water  
 Analytical Method: 1,8081B  
 Analytical Date: 11/22/17 23:45  
 Analyst: KEG

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Delta-BHC   | ND     |           | ug/l  | 0.020 | 0.005 | 1               | A      |
| Lindane   | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Alpha-BHC   | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Beta-BHC  | ND     |           | ug/l  | 0.020 | 0.006 | 1               | A      |
| Heptachlor  | ND     |           | ug/l  | 0.020 | 0.003 | 1               | A      |
| Aldrin  | ND     |           | ug/l  | 0.020 | 0.002 | 1               | A      |
| Heptachlor epoxide                                | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Endrin  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| Endrin aldehyde                                   | ND     |           | ug/l  | 0.040 | 0.008 | 1               | A      |
| Endrin ketone                                     | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Dieldrin  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| 4,4'-DDE  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| 4,4'-DDD  | 0.020  | J         | ug/l  | 0.040 | 0.005 | 1               | A      |
| 4,4'-DDT  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| Endosulfan I                                      | ND     |           | ug/l  | 0.020 | 0.003 | 1               | A      |
| Endosulfan II                                     | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Endosulfan sulfate                                | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Methoxychlor                                      | ND     |           | ug/l  | 0.200 | 0.007 | 1               | A      |
| Toxaphene   | ND     |           | ug/l  | 0.200 | 0.063 | 1               | A      |
| cis-Chlordane                                     | ND     |           | ug/l  | 0.020 | 0.007 | 1               | A      |
| trans-Chlordane                                   | ND     |           | ug/l  | 0.020 | 0.006 | 1               | A      |
| Chlordane   | ND     |           | ug/l  | 0.200 | 0.046 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 102        |           | 30-150              | A      |
| Decachlorobiphenyl           | 48         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 75         |           | 30-150              | B      |
| Decachlorobiphenyl           | 43         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1742330  
**Report Date:** 11/27/17

**SAMPLE RESULTS**

**Lab ID:** L1742330-02  
**Client ID:** MW-4  
**Sample Location:** BUFFALO, NY

**Date Collected:** 11/16/17 13:30  
**Date Received:** 11/16/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 8151A  
**Extraction Date:** 11/18/17 08:55

**Matrix:** Water  
**Analytical Method:** 1,8151A  
**Analytical Date:** 11/20/17 02:45  
**Analyst:** SL

**Methylation Date:** 11/18/17 17:55

| Parameter                                      | Result | Qualifier | Units | RL   | MDL   | Dilution Factor | Column |
|--|--------|-----------|-------|------|-------|-----------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab |        |           |       |      |       |                 |        |
| 2,4-D  | ND     |           | ug/l  | 10.0 | 0.498 | 1               | A      |
| 2,4,5-T  | ND     |           | ug/l  | 2.00 | 0.531 | 1               | A      |
| 2,4,5-TP (Silvex)                              | ND     |           | ug/l  | 2.00 | 0.539 | 1               | A      |

| Surrogate | % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|------------|-----------|---------------------|--------|
| DCAA      | 105        |           | 30-150              | A      |
| DCAA      | 78         |           | 30-150              | B      |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

## SAMPLE RESULTS

Lab ID: L1742330-03  
 Client ID: BD  
 Sample Location: BUFFALO, NY

Date Collected: 11/16/17 16:00  
 Date Received: 11/16/17  
 Field Prep: Not Specified  
 Extraction Method: EPA 3510C  
 Extraction Date: 11/22/17 05:09

Matrix: Water  
 Analytical Method: 1,8081B  
 Analytical Date: 11/23/17 00:29  
 Analyst: KEG

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Dilution Factor | Column |
|---|--------|-----------|-------|-------|-------|-----------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab |        |           |       |       |       |                 |        |
| Delta-BHC   | ND     |           | ug/l  | 0.020 | 0.005 | 1               | A      |
| Lindane   | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Alpha-BHC   | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Beta-BHC  | 0.008  | JPI       | ug/l  | 0.020 | 0.006 | 1               | B      |
| Heptachlor  | ND     |           | ug/l  | 0.020 | 0.003 | 1               | A      |
| Aldrin  | ND     |           | ug/l  | 0.020 | 0.002 | 1               | A      |
| Heptachlor epoxide                                | ND     |           | ug/l  | 0.020 | 0.004 | 1               | A      |
| Endrin  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| Endrin aldehyde                                   | ND     |           | ug/l  | 0.040 | 0.008 | 1               | A      |
| Endrin ketone                                     | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Dieldrin  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| 4,4'-DDE  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| 4,4'-DDD  | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| 4,4'-DDT  | ND     |           | ug/l  | 0.040 | 0.004 | 1               | A      |
| Endosulfan I                                      | ND     |           | ug/l  | 0.020 | 0.003 | 1               | A      |
| Endosulfan II                                     | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Endosulfan sulfate                                | ND     |           | ug/l  | 0.040 | 0.005 | 1               | A      |
| Methoxychlor                                      | ND     |           | ug/l  | 0.200 | 0.007 | 1               | A      |
| Toxaphene   | ND     |           | ug/l  | 0.200 | 0.063 | 1               | A      |
| cis-Chlordane                                     | ND     |           | ug/l  | 0.020 | 0.007 | 1               | A      |
| trans-Chlordane                                   | 0.010  | JPI       | ug/l  | 0.020 | 0.006 | 1               | A      |
| Chlordane   | ND     |           | ug/l  | 0.200 | 0.046 | 1               | A      |

| Surrogate                    | % Recovery | Qualifier | Acceptance Criteria | Column |
|------------------------------|------------|-----------|---------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 101        |           | 30-150              | A      |
| Decachlorobiphenyl           | 56         |           | 30-150              | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 77         |           | 30-150              | B      |
| Decachlorobiphenyl           | 88         |           | 30-150              | B      |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1742330  
**Report Date:** 11/27/17

**SAMPLE RESULTS**

**Lab ID:** L1742330-03  
**Client ID:** BD  
**Sample Location:** BUFFALO, NY

**Date Collected:** 11/16/17 16:00  
**Date Received:** 11/16/17  
**Field Prep:** Not Specified  
**Extraction Method:** EPA 8151A  
**Extraction Date:** 11/18/17 08:55

**Matrix:** Water  
**Analytical Method:** 1,8151A  
**Analytical Date:** 11/20/17 03:50  
**Analyst:** SL

**Methylation Date:** 11/18/17 17:55

| Parameter                                      | Result | Qualifier | Units | RL   | MDL   | Dilution Factor | Column |
|--|--------|-----------|-------|------|-------|-----------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab |        |           |       |      |       |                 |        |
| 2,4-D  | ND     |           | ug/l  | 10.0 | 0.498 | 1               | A      |
| 2,4,5-T  | ND     |           | ug/l  | 2.00 | 0.531 | 1               | A      |
| 2,4,5-TP (Silvex)                              | ND     |           | ug/l  | 2.00 | 0.539 | 1               | A      |

| Surrogate | % Recovery | Qualifier | Acceptance Criteria | Column |
|-----------|------------|-----------|---------------------|--------|
| DCAA      | 107        |           | 30-150              | A      |
| DCAA      | 84         |           | 30-150              | B      |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8151A  
 Analytical Date: 11/20/17 05:44  
 Analyst: SL

Extraction Method: EPA 8151A  
 Extraction Date: 11/18/17 08:55

Methylation Date: 11/18/17 17:55

| Parameter  | Result | Qualifier | Units | RL   | MDL   | Column |
|--|--------|-----------|-------|------|-------|--------|
| Chlorinated Herbicides by GC - Westborough Lab for sample(s): 01-03 Batch: WG1064453-1 |        |           |       |      |       |        |
| 2,4-D  | ND     |           | ug/l  | 10.0 | 0.498 | A      |
| 2,4,5-T  | ND     |           | ug/l  | 2.00 | 0.531 | A      |
| 2,4,5-TP (Silvex)  | ND     |           | ug/l  | 2.00 | 0.539 | A      |

| Surrogate | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|-----------|-----------|-----------|------------------------|--------|
| DCAA      | 139       |           | 30-150                 | A      |
| DCAA      | 114       |           | 30-150                 | B      |

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8081B  
 Analytical Date: 11/22/17 22:44  
 Analyst: KEG

Extraction Method: EPA 3510C  
 Extraction Date: 11/22/17 05:09

| Parameter   | Result | Qualifier | Units | RL    | MDL   | Column |
|---|--------|-----------|-------|-------|-------|--------|
| Organochlorine Pesticides by GC - Westborough Lab for sample(s): 01-03 Batch: WG1065541-1 |        |           |       |       |       |        |
| Delta-BHC   | ND     |           | ug/l  | 0.020 | 0.005 | A      |
| Lindane   | ND     |           | ug/l  | 0.020 | 0.004 | A      |
| Alpha-BHC   | ND     |           | ug/l  | 0.020 | 0.004 | A      |
| Beta-BHC  | ND     |           | ug/l  | 0.020 | 0.006 | A      |
| Heptachlor  | ND     |           | ug/l  | 0.020 | 0.003 | A      |
| Aldrin  | ND     |           | ug/l  | 0.020 | 0.002 | A      |
| Heptachlor epoxide  | ND     |           | ug/l  | 0.020 | 0.004 | A      |
| Endrin  | ND     |           | ug/l  | 0.040 | 0.004 | A      |
| Endrin aldehyde   | ND     |           | ug/l  | 0.040 | 0.008 | A      |
| Endrin ketone   | ND     |           | ug/l  | 0.040 | 0.005 | A      |
| Dieldrin  | ND     |           | ug/l  | 0.040 | 0.004 | A      |
| 4,4'-DDE  | ND     |           | ug/l  | 0.040 | 0.004 | A      |
| 4,4'-DDD  | ND     |           | ug/l  | 0.040 | 0.005 | A      |
| 4,4'-DDT  | ND     |           | ug/l  | 0.040 | 0.004 | A      |
| Endosulfan I  | ND     |           | ug/l  | 0.020 | 0.003 | A      |
| Endosulfan II   | ND     |           | ug/l  | 0.040 | 0.005 | A      |
| Endosulfan sulfate  | ND     |           | ug/l  | 0.040 | 0.005 | A      |
| Methoxychlor  | ND     |           | ug/l  | 0.200 | 0.007 | A      |
| Toxaphene   | ND     |           | ug/l  | 0.200 | 0.063 | A      |
| cis-Chlordane   | ND     |           | ug/l  | 0.020 | 0.007 | A      |
| trans-Chlordane   | ND     |           | ug/l  | 0.020 | 0.006 | A      |
| Chlordane   | ND     |           | ug/l  | 0.200 | 0.046 | A      |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**Method Blank Analysis**  
**Batch Quality Control**Analytical Method: 1,8081B  
Analytical Date: 11/22/17 22:44  
Analyst: KEGExtraction Method: EPA 3510C  
Extraction Date: 11/22/17 05:09

| Parameter   | Result | Qualifier | Units | RL | MDL | Column |
|---|--------|-----------|-------|----|-----|--------|
| Organochlorine Pesticides by GC - Westborough Lab for sample(s): 01-03 Batch: WG1065541-1 |        |           |       |    |     |        |

| Surrogate                    | %Recovery | Qualifier | Acceptance<br>Criteria | Column |
|------------------------------|-----------|-----------|------------------------|--------|
| 2,4,5,6-Tetrachloro-m-xylene | 90        |           | 30-150                 | A      |
| Decachlorobiphenyl           | 51        |           | 30-150                 | A      |
| 2,4,5,6-Tetrachloro-m-xylene | 86        |           | 30-150                 | B      |
| Decachlorobiphenyl           | 53        |           | 30-150                 | B      |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1742330

**Project Number:** T0239-016-001

**Report Date:** 11/27/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits | Column |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|--------|
| Chlorinated Herbicides by GC - Westborough Lab Associated sample(s): 01-03 Batch: WG1064453-2 WG1064453-3 |                  |      |                   |      |                     |     |      |               |        |
| 2,4-D   | 118              |      | 114               |      | 30-150              | 3   |      | 25            | A      |
| 2,4,5-T   | 124              |      | 120               |      | 30-150              | 3   |      | 25            | A      |
| 2,4,5-TP (Silvex)   | 116              |      | 113               |      | 30-150              | 3   |      | 25            | A      |

| Surrogate | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria | Column |
|-----------|------------------|------|-------------------|------|------------------------|--------|
| DCAA      | 142              |      | 137               |      | 30-150                 | A      |
| DCAA      | 135              |      | 132               |      | 30-150                 | B      |



# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1742330

**Project Number:** T0239-016-001

**Report Date:** 11/27/17

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits | Column |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01-03 Batch: WG1065541-2 WG1065541-3 |                  |      |                   |      |                     |     |      |               |        |
| Delta-BHC  | 96               |      | 110               |      | 30-150              | 14  |      | 20            | A      |
| Lindane  | 88               |      | 103               |      | 30-150              | 16  |      | 20            | A      |
| Alpha-BHC  | 90               |      | 107               |      | 30-150              | 17  |      | 20            | A      |
| Beta-BHC   | 84               |      | 97                |      | 30-150              | 15  |      | 20            | A      |
| Heptachlor   | 80               |      | 94                |      | 30-150              | 16  |      | 20            | A      |
| Aldrin   | 81               |      | 95                |      | 30-150              | 16  |      | 20            | A      |
| Heptachlor epoxide   | 86               |      | 100               |      | 30-150              | 15  |      | 20            | A      |
| Endrin   | 87               |      | 103               |      | 30-150              | 17  |      | 20            | A      |
| Endrin aldehyde  | 74               |      | 87                |      | 30-150              | 17  |      | 20            | A      |
| Endrin ketone  | 84               |      | 100               |      | 30-150              | 17  |      | 20            | A      |
| Dieldrin   | 90               |      | 105               |      | 30-150              | 15  |      | 20            | A      |
| 4,4'-DDE   | 89               |      | 103               |      | 30-150              | 15  |      | 20            | A      |
| 4,4'-DDD   | 96               |      | 112               |      | 30-150              | 15  |      | 20            | A      |
| 4,4'-DDT   | 79               |      | 93                |      | 30-150              | 17  |      | 20            | A      |
| Endosulfan I   | 82               |      | 95                |      | 30-150              | 15  |      | 20            | A      |
| Endosulfan II  | 86               |      | 99                |      | 30-150              | 14  |      | 20            | A      |
| Endosulfan sulfate   | 79               |      | 91                |      | 30-150              | 14  |      | 20            | A      |
| Methoxychlor   | 70               |      | 83                |      | 30-150              | 18  |      | 20            | A      |
| cis-Chlordane  | 85               |      | 98                |      | 30-150              | 15  |      | 20            | A      |
| trans-Chlordane  | 87               |      | 100               |      | 30-150              | 14  |      | 20            | A      |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1742330

**Project Number:** T0239-016-001

**Report Date:** 11/27/17

| <b>Parameter</b> | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
|------------------|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|

Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01-03 Batch: WG1065541-2 WG1065541-3

| <b>Surrogate</b>             | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>Acceptance<br/>Criteria</b> | <b>Column</b> |
|------------------------------|--------------------------|-------------|---------------------------|-------------|--------------------------------|---------------|
| 2,4,5,6-Tetrachloro-m-xylene | 81                       |             | 93                        |             | 30-150                         | A             |
| Decachlorobiphenyl           | 55                       |             | 38                        |             | 30-150                         | A             |
| 2,4,5,6-Tetrachloro-m-xylene | 78                       |             | 89                        |             | 30-150                         | B             |
| Decachlorobiphenyl           | 53                       |             | 38                        |             | 30-150                         | B             |

**Matrix Spike Analysis***Batch Quality Control***Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17

| <i>Parameter</i>   | <i>Native Sample</i> | <i>MS Added</i> | <i>MS Found</i> | <i>MS %Recovery</i> | <i>Qual</i> | <i>MSD Found</i> | <i>MSD %Recovery</i> | <i>Qual</i> | <i>Recovery Limits</i> | <i>RPD</i> | <i>Qual</i> | <i>RPD Limits</i> | <i>Column</i> |
|--|----------------------|-----------------|-----------------|---------------------|-------------|------------------|----------------------|-------------|------------------------|------------|-------------|-------------------|---------------|
| Chlorinated Herbicides by GC - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1064453-4 WG1064453-5 QC Sample: L1742330-02 Client ID: MW-4 |                      |                 |                 |                     |             |                  |                      |             |                        |            |             |                   |               |
| 2,4-D  | ND                   | 10              | 9.86J           | 99                  |             | 9.84J            | 98                   |             | 30-150                 | 0          |             | 25                | A             |
| 2,4,5-T  | ND                   | 10              | 9.24            | 92                  |             | 9.46             | 95                   |             | 30-150                 | 2          |             | 25                | A             |
| 2,4,5-TP (Silvex)  | ND                   | 10              | 11.0            | 110                 |             | 11.1             | 111                  |             | 30-150                 | 1          |             | 25                | A             |

| <i>Surrogate</i> | <i>MS % Recovery</i> | <i>Qualifier</i> | <i>MSD % Recovery</i> | <i>Qualifier</i> | <i>Acceptance Criteria</i> | <i>Column</i> |
|------------------|----------------------|------------------|-----------------------|------------------|----------------------------|---------------|
| DCAA             | 117                  |                  | 119                   |                  | 30-150                     | A             |
| DCAA             | 92                   |                  | 91                    |                  | 30-150                     | B             |

# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1742330

**Report Date:** 11/27/17

| Parameter   | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits | Column |
|---|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|--------|
| Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1065541-4 WG1065541-5 QC Sample: L1742330-02 Client ID: MW-4 |               |          |          |              |      |           |               |      |                 |     |      |            |        |
| Delta-BHC   | ND            | 0.5      | 0.610    | 122          |      | 0.614     | 123           |      | 30-150          | 1   |      | 30         | A      |
| Lindane   | ND            | 0.5      | 0.479    | 96           |      | 0.518     | 104           |      | 30-150          | 8   |      | 30         | A      |
| Alpha-BHC   | ND            | 0.5      | 0.512    | 102          |      | 0.519     | 104           |      | 30-150          | 1   |      | 30         | A      |
| Beta-BHC  | ND            | 0.5      | 0.627    | 125          |      | 0.625     | 125           |      | 30-150          | 0   |      | 30         | A      |
| Heptachlor  | ND            | 0.5      | 0.529    | 106          |      | 0.528     | 106           |      | 30-150          | 0   |      | 30         | A      |
| Aldrin  | ND            | 0.5      | 0.518    | 104          |      | 0.524     | 105           |      | 30-150          | 1   |      | 30         | A      |
| Heptachlor epoxide  | ND            | 0.5      | 0.545    | 109          |      | 0.554     | 111           |      | 30-150          | 2   |      | 30         | A      |
| Endrin  | ND            | 0.5      | 0.652    | 130          |      | 0.648     | 130           |      | 30-150          | 1   |      | 30         | A      |
| Endrin aldehyde   | ND            | 0.5      | 0.500    | 100          |      | 0.502     | 100           |      | 30-150          | 0   |      | 30         | A      |
| Endrin ketone   | ND            | 0.5      | 0.558    | 112          |      | 0.570     | 114           |      | 30-150          | 2   |      | 30         | A      |
| Dieldrin  | ND            | 0.5      | 0.587    | 117          |      | 0.598     | 120           |      | 30-150          | 2   |      | 30         | A      |
| 4,4'-DDE  | ND            | 0.5      | 0.536    | 107          |      | 0.552     | 110           |      | 30-150          | 3   |      | 30         | A      |
| 4,4'-DDD  | 0.020J        | 0.5      | 0.620    | 124          |      | 0.636     | 127           |      | 30-150          | 3   |      | 30         | A      |
| 4,4'-DDT  | ND            | 0.5      | 0.536    | 107          |      | 0.560     | 112           |      | 30-150          | 4   |      | 30         | A      |
| Endosulfan I  | ND            | 0.5      | 0.533    | 107          |      | 0.537     | 107           |      | 30-150          | 1   |      | 30         | A      |
| Endosulfan II   | ND            | 0.5      | 0.548    | 110          |      | 0.557     | 111           |      | 30-150          | 2   |      | 30         | A      |
| Endosulfan sulfate  | ND            | 0.5      | 0.520    | 104          |      | 0.537     | 107           |      | 30-150          | 3   |      | 30         | A      |
| Methoxychlor  | ND            | 0.5      | 0.493    | 99           |      | 0.503     | 101           |      | 30-150          | 2   |      | 30         | A      |
| cis-Chlordane   | ND            | 0.5      | 0.502    | 100          |      | 0.517     | 103           |      | 30-150          | 3   |      | 30         | A      |
| trans-Chlordane   | ND            | 0.5      | 0.542    | 108          |      | 0.556     | 111           |      | 30-150          | 3   |      | 30         | A      |

**Matrix Spike Analysis****Batch Quality Control****Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17

| <b>Parameter</b>  | <b>Native Sample</b> | <b>MS Added</b> | <b>MS Found</b> | <b>MS %Recovery</b> | <b>Qual</b> | <b>MSD Found</b> | <b>MSD %Recovery</b> | <b>Qual</b> | <b>Recovery Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD Limits</b> |
|---|----------------------|-----------------|-----------------|---------------------|-------------|------------------|----------------------|-------------|------------------------|------------|-------------|-------------------|
| Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 01-03 QC Batch ID: WG1065541-4 WG1065541-5 QC Sample: L1742330-02 Client ID: MW-4 |                      |                 |                 |                     |             |                  |                      |             |                        |            |             |                   |

| <b>Surrogate</b>             | <b>MS</b>         |                  | <b>MSD</b>        |                  | <b>Acceptance Criteria</b> | <b>Column</b> |
|------------------------------|-------------------|------------------|-------------------|------------------|----------------------------|---------------|
|                              | <b>% Recovery</b> | <b>Qualifier</b> | <b>% Recovery</b> | <b>Qualifier</b> |                            |               |
| 2,4,5,6-Tetrachloro-m-xylene | 113               |                  | 112               |                  | 30-150                     | A             |
| Decachlorobiphenyl           | 49                |                  | 62                |                  | 30-150                     | A             |
| 2,4,5,6-Tetrachloro-m-xylene | 75                |                  | 72                |                  | 30-150                     | B             |
| Decachlorobiphenyl           | 44                |                  | 52                |                  | 30-150                     | B             |

## METALS

Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

## SAMPLE RESULTS

Lab ID: L1742330-01

Date Collected: 11/16/17 15:00

Client ID: MW-3

Date Received: 11/16/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Matrix: Water

| Parameter                    | Result  | Qualifier | Units | RL      | MDL     | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|---------|-----------|-------|---------|---------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |         |           |       |         |         |                 |                |                |             |                   |         |
| Aluminum, Total              | 2.40    |           | mg/l  | 0.0100  | 0.00327 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Antimony, Total              | 0.00059 | J         | mg/l  | 0.00400 | 0.00042 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Arsenic, Total               | 0.01029 |           | mg/l  | 0.00050 | 0.00016 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Barium, Total                | 0.1009  |           | mg/l  | 0.00050 | 0.00017 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Beryllium, Total             | 0.00016 | J         | mg/l  | 0.00050 | 0.00010 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Cadmium, Total               | 0.00008 | J         | mg/l  | 0.00020 | 0.00005 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Calcium, Total               | 142.    |           | mg/l  | 0.100   | 0.0394  | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Chromium, Total              | 0.00420 |           | mg/l  | 0.00100 | 0.00017 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Cobalt, Total                | 0.00238 |           | mg/l  | 0.00050 | 0.00016 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Copper, Total                | 0.00449 |           | mg/l  | 0.00100 | 0.00038 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Iron, Total                  | 6.09    |           | mg/l  | 0.0500  | 0.0191  | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Lead, Total                  | 0.01491 |           | mg/l  | 0.00100 | 0.00034 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Magnesium, Total             | 105.    |           | mg/l  | 0.0700  | 0.0242  | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Manganese, Total             | 0.2688  |           | mg/l  | 0.00100 | 0.00044 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Mercury, Total               | ND      |           | mg/l  | 0.00020 | 0.00006 | 1               | 11/20/17 15:27 | 11/21/17 14:29 | EPA 7470A   | 1,7470A           | MG      |
| Nickel, Total                | 0.01044 |           | mg/l  | 0.00200 | 0.00055 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Potassium, Total             | 4.89    |           | mg/l  | 0.100   | 0.0309  | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Selenium, Total              | 0.00247 | J         | mg/l  | 0.00500 | 0.00173 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Silver, Total                | ND      |           | mg/l  | 0.00040 | 0.00016 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Sodium, Total                | 78.5    |           | mg/l  | 0.200   | 0.0293  | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Thallium, Total              | ND      |           | mg/l  | 0.00050 | 0.00014 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Vanadium, Total              | 0.00574 |           | mg/l  | 0.00500 | 0.00157 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |
| Zinc, Total                  | 0.02254 |           | mg/l  | 0.01000 | 0.00341 | 1               | 11/21/17 13:30 | 11/22/17 16:18 | EPA 3005A   | 1,6020A           | AM      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

## SAMPLE RESULTS

Lab ID: L1742330-02

Date Collected: 11/16/17 13:30

Client ID: MW-4

Date Received: 11/16/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Matrix: Water

| Parameter                    | Result  | Qualifier | Units | RL      | MDL     | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|---------|-----------|-------|---------|---------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |         |           |       |         |         |                 |                |                |             |                   |         |
| Aluminum, Total              | 0.971   |           | mg/l  | 0.0100  | 0.00327 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Antimony, Total              | 0.00220 | J         | mg/l  | 0.00400 | 0.00042 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Arsenic, Total               | 0.00211 |           | mg/l  | 0.00050 | 0.00016 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Barium, Total                | 0.06502 |           | mg/l  | 0.00050 | 0.00017 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Beryllium, Total             | ND      |           | mg/l  | 0.00050 | 0.00010 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Cadmium, Total               | ND      |           | mg/l  | 0.00020 | 0.00005 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Calcium, Total               | 236.    |           | mg/l  | 0.100   | 0.0394  | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Chromium, Total              | 0.00185 |           | mg/l  | 0.00100 | 0.00017 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Cobalt, Total                | 0.00158 |           | mg/l  | 0.00050 | 0.00016 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Copper, Total                | 0.00274 |           | mg/l  | 0.00100 | 0.00038 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Iron, Total                  | 3.37    |           | mg/l  | 0.0500  | 0.0191  | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Lead, Total                  | 0.00371 |           | mg/l  | 0.00100 | 0.00034 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Magnesium, Total             | 54.9    |           | mg/l  | 0.0700  | 0.0242  | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Manganese, Total             | 0.1710  |           | mg/l  | 0.00100 | 0.00044 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Mercury, Total               | ND      |           | mg/l  | 0.00020 | 0.00006 | 1               | 11/20/17 15:27 | 11/21/17 14:09 | EPA 7470A   | 1,7470A           | MG      |
| Nickel, Total                | 0.00434 |           | mg/l  | 0.00200 | 0.00055 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Potassium, Total             | 13.6    |           | mg/l  | 0.100   | 0.0309  | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Selenium, Total              | ND      |           | mg/l  | 0.00500 | 0.00173 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Silver, Total                | ND      |           | mg/l  | 0.00040 | 0.00016 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Sodium, Total                | 174.    |           | mg/l  | 0.200   | 0.0293  | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Thallium, Total              | ND      |           | mg/l  | 0.00050 | 0.00014 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Vanadium, Total              | 0.00250 | J         | mg/l  | 0.00500 | 0.00157 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |
| Zinc, Total                  | 0.01368 |           | mg/l  | 0.01000 | 0.00341 | 1               | 11/21/17 13:30 | 11/22/17 15:58 | EPA 3005A   | 1,6020A           | AM      |





Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

## SAMPLE RESULTS

Lab ID: L1742330-03

Date Collected: 11/16/17 16:00

Client ID: BD

Date Received: 11/16/17

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Matrix: Water

| Parameter                    | Result  | Qualifier | Units | RL      | MDL     | Dilution Factor | Date Prepared  | Date Analyzed  | Prep Method | Analytical Method | Analyst |
|------------------------------|---------|-----------|-------|---------|---------|-----------------|----------------|----------------|-------------|-------------------|---------|
| Total Metals - Mansfield Lab |         |           |       |         |         |                 |                |                |             |                   |         |
| Aluminum, Total              | 1.93    |           | mg/l  | 0.0100  | 0.00327 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Antimony, Total              | ND      |           | mg/l  | 0.00400 | 0.00042 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Arsenic, Total               | 0.00239 |           | mg/l  | 0.00050 | 0.00016 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Barium, Total                | 0.06958 |           | mg/l  | 0.00050 | 0.00017 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Beryllium, Total             | ND      |           | mg/l  | 0.00050 | 0.00010 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Cadmium, Total               | ND      |           | mg/l  | 0.00020 | 0.00005 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Calcium, Total               | 239.    |           | mg/l  | 0.100   | 0.0394  | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Chromium, Total              | 0.00317 |           | mg/l  | 0.00100 | 0.00017 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Cobalt, Total                | 0.00223 |           | mg/l  | 0.00050 | 0.00016 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Copper, Total                | 0.00364 |           | mg/l  | 0.00100 | 0.00038 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Iron, Total                  | 4.72    |           | mg/l  | 0.0500  | 0.0191  | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Lead, Total                  | 0.00558 |           | mg/l  | 0.00100 | 0.00034 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Magnesium, Total             | 55.6    |           | mg/l  | 0.0700  | 0.0242  | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Manganese, Total             | 0.1897  |           | mg/l  | 0.00100 | 0.00044 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Mercury, Total               | ND      |           | mg/l  | 0.00020 | 0.00006 | 1               | 11/20/17 15:27 | 11/21/17 14:31 | EPA 7470A   | 1,7470A           | MG      |
| Nickel, Total                | 0.00550 |           | mg/l  | 0.00200 | 0.00055 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Potassium, Total             | 13.1    |           | mg/l  | 0.100   | 0.0309  | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Selenium, Total              | ND      |           | mg/l  | 0.00500 | 0.00173 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Silver, Total                | ND      |           | mg/l  | 0.00040 | 0.00016 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Sodium, Total                | 174.    |           | mg/l  | 0.200   | 0.0293  | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Thallium, Total              | ND      |           | mg/l  | 0.00050 | 0.00014 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Vanadium, Total              | 0.00421 | J         | mg/l  | 0.00500 | 0.00157 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |
| Zinc, Total                  | 0.01202 |           | mg/l  | 0.01000 | 0.00341 | 1               | 11/21/17 13:30 | 11/22/17 16:22 | EPA 3005A   | 1,6020A           | AM      |



Project Name: MAIN &amp; E. BALCOM

Lab Number: L1742330

Project Number: T0239-016-001

Report Date: 11/27/17

## Method Blank Analysis Batch Quality Control

| Parameter  | Result | Qualifier | Units | RL      | MDL     | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|--|--------|-----------|-------|---------|---------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01-03 Batch: WG1064917-1 |        |           |       |         |         |                    |                  |                  |                      |         |
| Mercury, Total   | ND     |           | mg/l  | 0.00020 | 0.00006 | 1                  | 11/20/17 15:27   | 11/21/17 14:05   | 1,7470A              | MG      |

### Prep Information

Digestion Method: EPA 7470A

| Parameter  | Result  | Qualifier | Units | RL      | MDL     | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|--|---------|-----------|-------|---------|---------|--------------------|------------------|------------------|----------------------|---------|
| Total Metals - Mansfield Lab for sample(s): 01-03 Batch: WG1065298-1 |         |           |       |         |         |                    |                  |                  |                      |         |
| Aluminum, Total  | ND      |           | mg/l  | 0.0100  | 0.00327 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Antimony, Total  | 0.00049 | J         | mg/l  | 0.00400 | 0.00042 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Arsenic, Total   | ND      |           | mg/l  | 0.00050 | 0.00016 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Barium, Total  | ND      |           | mg/l  | 0.00050 | 0.00017 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Beryllium, Total   | ND      |           | mg/l  | 0.00050 | 0.00010 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Cadmium, Total   | ND      |           | mg/l  | 0.00020 | 0.00005 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Calcium, Total   | ND      |           | mg/l  | 0.100   | 0.0394  | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Chromium, Total  | ND      |           | mg/l  | 0.00100 | 0.00017 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Cobalt, Total  | ND      |           | mg/l  | 0.00050 | 0.00016 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Copper, Total  | ND      |           | mg/l  | 0.00100 | 0.00038 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Iron, Total  | ND      |           | mg/l  | 0.0500  | 0.0191  | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Lead, Total  | ND      |           | mg/l  | 0.00100 | 0.00034 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Magnesium, Total   | ND      |           | mg/l  | 0.0700  | 0.0242  | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Manganese, Total   | ND      |           | mg/l  | 0.00100 | 0.00044 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Nickel, Total  | ND      |           | mg/l  | 0.00200 | 0.00055 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Potassium, Total   | ND      |           | mg/l  | 0.100   | 0.0309  | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Selenium, Total  | ND      |           | mg/l  | 0.00500 | 0.00173 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Silver, Total  | ND      |           | mg/l  | 0.00040 | 0.00016 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Sodium, Total  | ND      |           | mg/l  | 0.200   | 0.0293  | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Thallium, Total  | ND      |           | mg/l  | 0.00050 | 0.00014 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Vanadium, Total  | ND      |           | mg/l  | 0.00500 | 0.00157 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |
| Zinc, Total  | ND      |           | mg/l  | 0.01000 | 0.00341 | 1                  | 11/21/17 13:30   | 11/22/17 15:51   | 1,6020A              | AM      |

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1742330

**Project Number:** T0239-016-001

**Report Date:** 11/27/17

## **Method Blank Analysis Batch Quality Control**

### **Prep Information**

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Digestion Method: EPA 3005A

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1742330

**Project Number:** T0239-016-001

**Report Date:** 11/27/17

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-03 Batch: WG1064917-2 |                  |      |                   |      |                     |     |      |            |
| Mercury, Total  | 107              |      | -                 |      | 80-120              | -   |      |            |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1742330

**Project Number:** T0239-016-001

**Report Date:** 11/27/17

| Parameter   | LCS<br>%Recovery | LCSD<br>%Recovery | %Recovery<br>Limits | RPD | RPD Limits |
|---|------------------|-------------------|---------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-03 Batch: WG1065298-2 |                  |                   |                     |     |            |
| Aluminum, Total   | 110              | -                 | 80-120              | -   |            |
| Antimony, Total   | 99               | -                 | 80-120              | -   |            |
| Arsenic, Total  | 110              | -                 | 80-120              | -   |            |
| Barium, Total   | 100              | -                 | 80-120              | -   |            |
| Beryllium, Total  | 109              | -                 | 80-120              | -   |            |
| Cadmium, Total  | 106              | -                 | 80-120              | -   |            |
| Calcium, Total  | 114              | -                 | 80-120              | -   |            |
| Chromium, Total   | 99               | -                 | 80-120              | -   |            |
| Cobalt, Total   | 99               | -                 | 80-120              | -   |            |
| Copper, Total   | 101              | -                 | 80-120              | -   |            |
| Iron, Total   | 106              | -                 | 80-120              | -   |            |
| Lead, Total   | 107              | -                 | 80-120              | -   |            |
| Magnesium, Total  | 113              | -                 | 80-120              | -   |            |
| Manganese, Total  | 104              | -                 | 80-120              | -   |            |
| Nickel, Total   | 99               | -                 | 80-120              | -   |            |
| Potassium, Total  | 110              | -                 | 80-120              | -   |            |
| Selenium, Total   | 112              | -                 | 80-120              | -   |            |
| Silver, Total   | 100              | -                 | 80-120              | -   |            |
| Sodium, Total   | 110              | -                 | 80-120              | -   |            |
| Thallium, Total   | 103              | -                 | 80-120              | -   |            |
| Vanadium, Total   | 102              | -                 | 80-120              | -   |            |

**Lab Control Sample Analysis**  
Batch Quality Control**Project Name:** MAIN & E. BALCOM**Project Number:** T0239-016-001**Lab Number:** L1742330**Report Date:** 11/27/17

| Parameter   | LCS<br>%Recovery | LCSD<br>%Recovery | %Recovery<br>Limits | RPD | RPD Limits |
|---|------------------|-------------------|---------------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-03 Batch: WG1065298-2 |                  |                   |                     |     |            |
| Zinc, Total   | 114              | -                 | 80-120              | -   |            |

# **Matrix Spike Analysis** Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1742330

**Project Number:** T0239-016-001

**Report Date:** 11/27/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | Qual | MSD Found | MSD %Recovery | Qual | Recovery Limits | RPD | Qual | RPD Limits |
|--|---------------|----------|----------|--------------|------|-----------|---------------|------|-----------------|-----|------|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-03 QC Batch ID: WG1064917-3 WG1064917-4 QC Sample: L1742330-02 Client ID: MW-4 |               |          |          |              |      |           |               |      |                 |     |      |            |
| Mercury, Total   | ND            | 0.005    | 0.00477  | 95           |      | 0.00460   | 92            |      | 75-125          | 4   |      | 20         |

# **Matrix Spike Analysis** **Batch Quality Control**

**Project Name:** MAIN & E. BALCOM

**Project Number:** T0239-016-001

**Lab Number:** L1742330

**Report Date:** 11/27/17

| Parameter  | Native Sample | MS Added | MS Found                 | MS %Recovery | MSD Found   | MSD %Recovery          | Recovery Limits | RPD             | RPD Limits |    |    |
|--|---------------|----------|--------------------------|--------------|-------------|------------------------|-----------------|-----------------|------------|----|----|
| Total Metals - Mansfield Lab Associated sample(s): 01-03 |               |          | QC Batch ID: WG1065298-3 |              | WG1065298-4 | QC Sample: L1742330-02 |                 | Client ID: MW-4 |            |    |    |
| Aluminum, Total  | 0.971         | 2        | 3.14                     | 108          | 3.23        | 113                    | 75-125          | 3               | 20         |    |    |
| Antimony, Total  | 0.00220J      | 0.5      | 0.4998                   | 100          | 0.4971      | 99                     | 75-125          | 1               | 20         |    |    |
| Arsenic, Total   | 0.00211       | 0.12     | 0.1323                   | 108          | 0.1334      | 109                    | 75-125          | 1               | 20         |    |    |
| Barium, Total  | 0.06502       | 2        | 2.026                    | 98           | 2.066       | 100                    | 75-125          | 2               | 20         |    |    |
| Beryllium, Total   | ND            | 0.05     | 0.05260                  | 105          | 0.05417     | 108                    | 75-125          | 3               | 20         |    |    |
| Cadmium, Total   | ND            | 0.051    | 0.05186                  | 102          | 0.05052     | 99                     | 75-125          | 3               | 20         |    |    |
| Calcium, Total   | 236.          | 10       | 230                      | 0            | Q           | 236                    | 0               | Q               | 75-125     | 3  | 20 |
| Chromium, Total  | 0.00185       | 0.2      | 0.1996                   | 99           | 0.2066      | 102                    | 75-125          | 3               | 20         |    |    |
| Cobalt, Total  | 0.00158       | 0.5      | 0.4827                   | 96           | 0.5090      | 101                    | 75-125          | 5               | 20         |    |    |
| Copper, Total  | 0.00274       | 0.25     | 0.2414                   | 95           | 0.2519      | 100                    | 75-125          | 4               | 20         |    |    |
| Iron, Total  | 3.37          | 1        | 4.37                     | 100          | 4.46        | 109                    | 75-125          | 2               | 20         |    |    |
| Lead, Total  | 0.00371       | 0.51     | 0.5501                   | 107          | 0.5496      | 107                    | 75-125          | 0               | 20         |    |    |
| Magnesium, Total   | 54.9          | 10       | 60.6                     | 57           | Q           | 61.4                   | 65              | Q               | 75-125     | 1  | 20 |
| Manganese, Total   | 0.1710        | 0.5      | 0.6823                   | 102          | 0.7129      | 108                    | 75-125          | 4               | 20         |    |    |
| Nickel, Total  | 0.00434       | 0.5      | 0.4871                   | 96           | 0.5009      | 99                     | 75-125          | 3               | 20         |    |    |
| Potassium, Total   | 13.6          | 10       | 23.5                     | 99           | 24.6        | 110                    | 75-125          | 5               | 20         |    |    |
| Selenium, Total  | ND            | 0.12     | 0.125                    | 104          | 0.139       | 116                    | 75-125          | 11              | 20         |    |    |
| Silver, Total  | ND            | 0.05     | 0.04978                  | 100          | 0.04953     | 99                     | 75-125          | 1               | 20         |    |    |
| Sodium, Total  | 174.          | 10       | 181                      | 70           | Q           | 182                    | 80              | 75-125          | 1          | 20 |    |
| Thallium, Total  | ND            | 0.12     | 0.1251                   | 104          | 0.1276      | 106                    | 75-125          | 2               | 20         |    |    |
| Vanadium, Total  | 0.00250J      | 0.5      | 0.5052                   | 101          | 0.5328      | 106                    | 75-125          | 5               | 20         |    |    |



# Matrix Spike Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM

**Lab Number:** L1742330

**Project Number:** T0239-016-001

**Report Date:** 11/27/17

| Parameter  | Native Sample | MS Added | MS Found | MS %Recovery | MSD Found | MSD %Recovery | Recovery Limits | RPD | RPD Limits |
|--|---------------|----------|----------|--------------|-----------|---------------|-----------------|-----|------------|
| Total Metals - Mansfield Lab Associated sample(s): 01-03 QC Batch ID: WG1065298-3 WG1065298-4 QC Sample: L1742330-02 Client ID: MW-4 |               |          |          |              |           |               |                 |     |            |
| Zinc, Total  | 0.01368       | 0.5      | 0.5302   | 103          | 0.5459    | 106           | 75-125          | 3   | 20         |

**Project Name:** MAIN & E. BALCOM**Lab Number:** L1742330**Project Number:** T0239-016-001**Report Date:** 11/27/17**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information****Cooler Custody Seal**

A Absent

B Absent

C Absent

**Container Information**

| Container ID  | Container Type               | Cooler | Initial pH | Final pH | Temp deg C | Pres | Seal   | Frozen Date/Time | Analysis(*)  |
|---------------|------------------------------|--------|------------|----------|------------|------|--------|------------------|--|
| L1742330-01A  | Vial HCl preserved           | C      | NA         |          | 2.9        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-01B  | Vial HCl preserved           | C      | NA         |          | 2.9        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-01C  | Vial HCl preserved           | C      | NA         |          | 2.9        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-01D  | Plastic 250ml HNO3 preserved | C      | <2         | <2       | 2.9        | Y    | Absent |                  | BA-6020T(180),FE-6020T(180),SE-6020T(180),TL-6020T(180),CA-6020T(180),CR-6020T(180),K-6020T(180),NI-6020T(180),CU-6020T(180),NA-6020T(180),ZN-6020T(180),PB-6020T(180),BE-6020T(180),MN-6020T(180),AS-6020T(180),SB-6020T(180),V-6020T(180),AG-6020T(180),AL-6020T(180),CD-6020T(180),HG-T(28),MG-6020T(180),CO-6020T(180) |
| L1742330-01E  | Amber 500ml unpreserved      | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1742330-01F  | Amber 500ml unpreserved      | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1742330-01G  | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1742330-01H  | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1742330-01I  | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | HERB-APA(7)  |
| L1742330-01J  | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | HERB-APA(7)  |
| L1742330-01K  | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |
| L1742330-01L  | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |
| L1742330-02A  | Vial HCl preserved           | B      | NA         |          | 3.6        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-02A1 | Vial HCl preserved           | B      | NA         |          | 3.6        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-02A2 | Vial HCl preserved           | C      | NA         |          | 2.9        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-02B  | Vial HCl preserved           | B      | NA         |          | 3.6        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-02B1 | Vial HCl preserved           | B      | NA         |          | 3.6        | Y    | Absent |                  | NYTCL-8260-R2(14)  |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Serial\_No:** 11271717:29  
**Lab Number:** L1742330  
**Report Date:** 11/27/17

**Container Information**

| Container ID  | Container Type               | Cooler | Initial pH | Final pH | Temp deg C | Pres | Seal   | Frozen Date/Time | Analysis(*)  |
|---------------|------------------------------|--------|------------|----------|------------|------|--------|------------------|--|
| L1742330-02B2 | Vial HCl preserved           | C      | NA         |          | 2.9        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-02C  | Vial HCl preserved           | B      | NA         |          | 3.6        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-02C1 | Vial HCl preserved           | B      | NA         |          | 3.6        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-02C2 | Vial HCl preserved           | C      | NA         |          | 2.9        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-02D  | Plastic 250ml HNO3 preserved | B      | <2         | <2       | 3.6        | Y    | Absent |                  | BA-6020T(180),FE-6020T(180),SE-6020T(180),TL-6020T(180),CA-6020T(180),CR-6020T(180),K-6020T(180),NI-6020T(180),CU-6020T(180),NA-6020T(180),ZN-6020T(180),PB-6020T(180),BE-6020T(180),MN-6020T(180),AS-6020T(180),SB-6020T(180),V-6020T(180),AG-6020T(180),AL-6020T(180),CD-6020T(180),HG-T(28),MG-6020T(180),CO-6020T(180) |
| L1742330-02D1 | Plastic 250ml HNO3 preserved | B      | <2         | <2       | 3.6        | Y    | Absent |                  | BA-6020T(180),FE-6020T(180),SE-6020T(180),TL-6020T(180),CA-6020T(180),CR-6020T(180),K-6020T(180),NI-6020T(180),CU-6020T(180),NA-6020T(180),ZN-6020T(180),PB-6020T(180),BE-6020T(180),MN-6020T(180),AS-6020T(180),SB-6020T(180),V-6020T(180),AG-6020T(180),AL-6020T(180),CD-6020T(180),HG-T(28),MG-6020T(180),CO-6020T(180) |
| L1742330-02D2 | Plastic 250ml HNO3 preserved | C      | <2         | <2       | 2.9        | Y    | Absent |                  | BA-6020T(180),FE-6020T(180),SE-6020T(180),TL-6020T(180),CA-6020T(180),CR-6020T(180),K-6020T(180),NI-6020T(180),CU-6020T(180),NA-6020T(180),ZN-6020T(180),PB-6020T(180),BE-6020T(180),MN-6020T(180),AS-6020T(180),SB-6020T(180),V-6020T(180),AG-6020T(180),AL-6020T(180),CD-6020T(180),HG-T(28),MG-6020T(180),CO-6020T(180) |
| L1742330-02E  | Amber 500ml unpreserved      | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1742330-02E1 | Amber 500ml unpreserved      | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1742330-02E2 | Amber 500ml unpreserved      | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1742330-02F  | Amber 500ml unpreserved      | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1742330-02F1 | Amber 500ml unpreserved      | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1742330-02F2 | Amber 500ml unpreserved      | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1742330-02G  | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1742330-02G1 | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1742330-02G2 | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

Serial\_No:11271717:29  
**Lab Number:** L1742330  
**Report Date:** 11/27/17

**Container Information**

| Container ID  | Container Type               | Cooler | Initial pH | Final pH | Temp deg C | Pres | Seal   | Frozen Date/Time | Analysis(*)  |
|---------------|------------------------------|--------|------------|----------|------------|------|--------|------------------|--|
| L1742330-02H  | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1742330-02H1 | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1742330-02H2 | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1742330-02I  | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | HERB-APA(7)  |
| L1742330-02I1 | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | HERB-APA(7)  |
| L1742330-02I2 | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | HERB-APA(7)  |
| L1742330-02J  | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | HERB-APA(7)  |
| L1742330-02J1 | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | HERB-APA(7)  |
| L1742330-02J2 | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | HERB-APA(7)  |
| L1742330-02K  | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |
| L1742330-02K1 | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |
| L1742330-02K2 | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |
| L1742330-02L  | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |
| L1742330-02L1 | Amber 1000ml unpreserved     | B      | 7          | 7        | 3.6        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |
| L1742330-02L2 | Amber 1000ml unpreserved     | C      | 7          | 7        | 2.9        | Y    | Absent |                  | NYTCL-8270(7),NYTCL-8270-SIM(7)  |
| L1742330-03A  | Vial HCl preserved           | A      | NA         |          | 2.5        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-03B  | Vial HCl preserved           | A      | NA         |          | 2.5        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-03C  | Vial HCl preserved           | A      | NA         |          | 2.5        | Y    | Absent |                  | NYTCL-8260-R2(14)  |
| L1742330-03D  | Plastic 250ml HNO3 preserved | A      | <2         | <2       | 2.5        | Y    | Absent |                  | BA-6020T(180),FE-6020T(180),SE-6020T(180),TL-6020T(180),CA-6020T(180),CR-6020T(180),K-6020T(180),NI-6020T(180),CU-6020T(180),NA-6020T(180),ZN-6020T(180),PB-6020T(180),BE-6020T(180),MN-6020T(180),AS-6020T(180),SB-6020T(180),V-6020T(180),AG-6020T(180),AL-6020T(180),CD-6020T(180),HG-T(28),MG-6020T(180),CO-6020T(180) |
| L1742330-03E  | Amber 500ml unpreserved      | A      | 7          | 7        | 2.5        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1742330-03F  | Amber 500ml unpreserved      | A      | 7          | 7        | 2.5        | Y    | Absent |                  | NYTCL-8081(7)  |
| L1742330-03G  | Amber 1000ml unpreserved     | A      | 7          | 7        | 2.5        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1742330-03H  | Amber 1000ml unpreserved     | A      | 7          | 7        | 2.5        | Y    | Absent |                  | NYTCL-8082-1200ML(7)   |
| L1742330-03I  | Amber 1000ml unpreserved     | A      | 7          | 7        | 2.5        | Y    | Absent |                  | HERB-APA(7)  |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

Serial\_No:11271717:29  
**Lab Number:** L1742330  
**Report Date:** 11/27/17

**Container Information**

| <b>Container ID</b> | <b>Container Type</b>    | <b>Cooler</b> | <b>Initial pH</b> | <b>Final pH</b> | <b>Temp deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen Date/Time</b> | <b>Analysis(*)</b>              |
|---------------------|--------------------------|---------------|-------------------|-----------------|-------------------|-------------|-------------|-------------------------|---------------------------------|
| L1742330-03J        | Amber 1000ml unpreserved | A             | 7                 | 7               | 2.5               | Y           | Absent      |                         | HERB-APA(7)                     |
| L1742330-03K        | Amber 1000ml unpreserved | A             | 7                 | 7               | 2.5               | Y           | Absent      |                         | NYTCL-8270(7),NYTCL-8270-SIM(7) |
| L1742330-03L        | Amber 1000ml unpreserved | A             | 7                 | 7               | 2.5               | Y           | Absent      |                         | NYTCL-8270(7),NYTCL-8270-SIM(7) |
| L1742330-04A        | Vial HCl preserved       | A             | NA                |                 | 2.5               | Y           | Absent      |                         | ARCHIVE()                       |
| L1742330-04B        | Vial HCl preserved       | A             | NA                |                 | 2.5               | Y           | Absent      |                         | ARCHIVE()                       |
| L1742330-04C        | Vial HCl preserved       | A             | NA                |                 | 2.5               | Y           | Absent      |                         | ARCHIVE()                       |
| L1742330-04D        | Vial HCl preserved       | A             | NA                |                 | 2.5               | Y           | Absent      |                         | ARCHIVE()                       |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1742330  
**Report Date:** 11/27/17

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1742330  
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#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1742330  
**Report Date:** 11/27/17

## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.





**Alpha Analytical, Inc.**

ID No.:17873

Facility: **Company-wide**

Revision 10

Department: **Quality Assurance**

Published Date: 1/16/2017 11:00:05 AM

Title: **Certificate/Approval Program Summary**

Page 1 of 1

**Certification Information**


The following analytes are not included in our Primary NELAP Scope of Accreditation:

**Westborough Facility****EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** NPW and SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**EPA 9012B:** NPW: Total Cyanide**EPA 9050A:** NPW: Specific Conductance**SM3500:** NPW: Ferrous Iron**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.**SM5310C:** DW: Dissolved Organic Carbon**Mansfield Facility****SM 2540D:** TSS**EPA 3005A** NPW**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

**Westborough Facility:****Drinking Water****EPA 300.0:** Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE, EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH, EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E.****Mansfield Facility:****Drinking Water****EPA 200.7:** Ba, Be, Cd, Cr, Cu, Ni, Na, Ca. **EPA 200.8:** Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Ni, Se, TL. **EPA 245.1 Hg.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.

|  <b>NEW YORK CHAIN OF CUSTODY</b><br>Westborough, MA 01581<br>8 Walkup Dr.<br>TEL: 508-898-9220<br>FAX: 508-898-9193<br>Mansfield, MA 02048<br>320 Forbes Blvd<br>TEL: 508-822-9300<br>FAX: 508-822-3288 |             | <b>Service Centers</b><br>Mahwah, NJ 07430: 35 Whitney Rd, Suite 5<br>Albany, NY 12205: 14 Walker Way<br>Tonawanda, NY 14150: 275 Cooper Ave, Suite 105   |       | Page<br>1 of 1  |         | Date Rec'd in Lab<br>11/16/17  |  | ALPHA Job #<br>11742330   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|-------------|---|-------|---|---------|--|--|---|--|----------------|-------------|------------|-------|---------|---------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
|  |             | <b>Project Information</b><br>Project Name: <u>Man E. Ballon</u><br>Project Location: <u>Buffalo, NY</u><br>Project # <u>T0239-016-001</u><br>(Use Project name as Project #) <input type="checkbox"/><br>Project Manager: <u>Nate Munley</u><br>ALPHAQuote #:<br>Turn-Around Time<br>Standard <input checked="" type="checkbox"/> Rush (only if pre approved) <input type="checkbox"/> Due Date:<br># of Days: |       |   |         | <b>Deliverables</b><br><input type="checkbox"/> ASP-A <input checked="" type="checkbox"/> ASP-B<br><input type="checkbox"/> EquiS (1 File) <input type="checkbox"/> EquiS (4 File)<br><input type="checkbox"/> Other |  | <b>Billing Information</b><br><input type="checkbox"/> Same as Client Info<br>PO #  |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| <b>Client Information</b><br>Client: <u>TURKEY ENU Restoration</u><br>Address: <u>2558 Hamlet Pk</u><br><u>Buffalo, NY 14218</u><br>Phone: <u>716-713-3937</u><br>Fax:<br>Email: <u>NMunley@TurkeyENU.com</u>  |             | <b>Regulatory Requirement</b><br><input type="checkbox"/> NY TOGS <input type="checkbox"/> NY Part 375<br><input type="checkbox"/> AWQ Standards <input type="checkbox"/> NY CP-51<br><input type="checkbox"/> NY Restricted Use <input type="checkbox"/> Other<br><input type="checkbox"/> NY Unrestricted Use<br><input type="checkbox"/> NYC Sewer Discharge   |       | <b>Disposal Site Information</b><br>Please identify below location of applicable disposal facilities.<br>Disposal Facility:<br><input type="checkbox"/> NJ <input type="checkbox"/> NY<br><input type="checkbox"/> Other: |         | <b>Other project specific requirements/comments:</b><br><u>Category B</u><br>Please specify Metals or TAL.   |  | <b>ANALYSIS</b><br><table border="1" style="width:100%; border-collapse: collapse;"> <thead> <tr> <th>TCL/CP-Sludg's</th> <th>TCL/Sludg's</th> <th>TAL Metals</th> <th>PCB's</th> <th>Desturc</th> <th>Herbume</th> </tr> </thead> <tbody> <tr> <td>X</td> <td>X</td> <td>X</td> <td>X</td> <td>X</td> <td>X</td> </tr> <tr> <td>X</td> <td>X</td> <td>X</td> <td>X</td> <td>X</td> <td>X</td> </tr> <tr> <td>X</td> <td>X</td> <td>X</td> <td>X</td> <td>X</td> <td>X</td> </tr> </tbody> </table> |  | TCL/CP-Sludg's | TCL/Sludg's | TAL Metals | PCB's | Desturc | Herbume | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X |
| TCL/CP-Sludg's   | TCL/Sludg's | TAL Metals  | PCB's | Desturc   | Herbume |  |  |   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| X  | X           | X   | X     | X   | X       |  |  |   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| X  | X           | X   | X     | X   | X       |  |  |   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| X  | X           | X   | X     | X   | X       |  |  |   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| These samples have been previously analyzed by Alpha <input type="checkbox"/>  |             | <b>Sample Filtration</b><br><input type="checkbox"/> Done<br><input type="checkbox"/> Lab to do<br>Preservation<br><input type="checkbox"/> Lab to do<br>(Please Specify below)   |       | <b>Sample Specific Comments</b>   |         | <b>Total Bottles</b>   |  |   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| ALPHA Lab ID (Lab Use Only)  |             | Sample ID   |       | Collection<br>Date Time   |         | Sample Matrix  |  | Sampler's Initials  |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| 42330-01   |             | MW-3  |       | 11/16/17 15:00  |         | water  |  | NMS   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| -02  |             | MW-4  |       | 13:30   |         | ↓  |  | ↓   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| -03  |             | BD  |       | 16:00   |         | ↓  |  | ↓   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Preservative Code:<br>A = None<br>B = HCl<br>C = HNO <sub>3</sub><br>D = H <sub>2</sub> SO <sub>4</sub><br>E = NaOH<br>F = MeOH<br>G = NaHSO <sub>4</sub><br>H = Na <sub>2</sub> S <sub>2</sub> O <sub>3</sub><br>K/E = Zn Ac/NaOH<br>O = Other  |             | Container Code<br>P = Plastic<br>A = Amber Glass<br>V = Vial<br>G = Glass<br>B = Bacteria Cup<br>C = Cube<br>O = Other<br>E = Encore<br>D = BOD Bottle  |       | Westboro: Certification No: MA935<br>Mansfield: Certification No: MA015   |         | Container Type<br>V A A A A A  |  | Preservative<br>B 0 0 0 0 0   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Relinquished By:   |             | Date/Time   |       | Received By:  |         | Date/Time  |  | Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)  |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| [Signature]  |             | 11/16/17 16:30  |       | [Signature]   |         | 11/16/17 16:35   |  |   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|  |             |   |       |   |         |  |  |   |  |                |             |            |       |         |         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |



## ANALYTICAL REPORT

|                 |   |
|-----------------|---|
| Lab Number:     | L1804490  |
| Client:         | Turnkey Environmental Restoration, LLC<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley   |
| Phone:          | (716) 856-0599  |
| Project Name:   | MAIN & E. BALCOM ST. SITE   |
| Project Number: | B0239-016-001   |
| Report Date:    | 02/14/18  |

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Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)



**Project Name:** MAIN & E. BALCOM ST. SITE  
**Project Number:** B0239-016-001

**Lab Number:** L1804490  
**Report Date:** 02/14/18

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1804490-01                | MW-5 (20-24')    | SOIL          | BUFFALO, NY                | 02/08/18 10:00                  | 02/08/18            |

**Project Name:** MAIN & E. BALCOM ST. SITE  
**Project Number:** B0239-016-001

**Lab Number:** L1804490  
**Report Date:** 02/14/18

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

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**Project Name:** MAIN & E. BALCOM ST. SITE  
**Project Number:** B0239-016-001

**Lab Number:** L1804490  
**Report Date:** 02/14/18

### Case Narrative (continued)

#### Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

#### Volatile Organics

Any reported concentrations that are below 200 ug/kg may be biased low due to the sample not being collected according to 5035-L/5035A-L low-level specifications.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:



Cristin Walker

Title: Technical Director/Representative

Date: 02/14/18

# ORGANICS

# **VOLATILES**



**Project Name:** MAIN & E. BALCOM ST. SITE**Lab Number:** L1804490**Project Number:** B0239-016-001**Report Date:** 02/14/18**SAMPLE RESULTS**

**Lab ID:** L1804490-01  
**Client ID:** MW-5 (20-24')  
**Sample Location:** BUFFALO, NY  
**Sample Depth:**  
**Matrix:** Soil  
**Analytical Method:** 1,8260C  
**Analytical Date:** 02/13/18 20:58  
**Analyst:** MV  
**Percent Solids:** 87%

**Date Collected:** 02/08/18 10:00  
**Date Received:** 02/08/18  
**Field Prep:** Not Specified

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| Methylene chloride                           | ND     |           | ug/kg | 11  | 1.8  | 1               |
| 1,1-Dichloroethane                           | ND     |           | ug/kg | 1.6 | 0.29 | 1               |
| Chloroform                                   | ND     |           | ug/kg | 1.6 | 0.40 | 1               |
| Carbon tetrachloride                         | ND     |           | ug/kg | 1.1 | 0.37 | 1               |
| 1,2-Dichloropropane                          | ND     |           | ug/kg | 3.7 | 0.24 | 1               |
| Dibromochloromethane                         | ND     |           | ug/kg | 1.1 | 0.19 | 1               |
| 1,1,2-Trichloroethane                        | ND     |           | ug/kg | 1.6 | 0.33 | 1               |
| Tetrachloroethene                            | ND     |           | ug/kg | 1.1 | 0.32 | 1               |
| Chlorobenzene                                | ND     |           | ug/kg | 1.1 | 0.37 | 1               |
| Trichlorofluoromethane                       | ND     |           | ug/kg | 5.3 | 0.44 | 1               |
| 1,2-Dichloroethane                           | ND     |           | ug/kg | 1.1 | 0.26 | 1               |
| 1,1,1-Trichloroethane                        | ND     |           | ug/kg | 1.1 | 0.37 | 1               |
| Bromodichloromethane                         | ND     |           | ug/kg | 1.1 | 0.33 | 1               |
| trans-1,3-Dichloropropene                    | ND     |           | ug/kg | 1.1 | 0.22 | 1               |
| cis-1,3-Dichloropropene                      | ND     |           | ug/kg | 1.1 | 0.25 | 1               |
| Bromoform                                    | ND     |           | ug/kg | 4.3 | 0.25 | 1               |
| 1,1,2,2-Tetrachloroethane                    | ND     |           | ug/kg | 1.1 | 0.32 | 1               |
| Benzene                                      | ND     |           | ug/kg | 1.1 | 0.21 | 1               |
| Toluene                                      | 1.1    | J         | ug/kg | 1.6 | 0.21 | 1               |
| Ethylbenzene                                 | ND     |           | ug/kg | 1.1 | 0.18 | 1               |
| Chloromethane                                | ND     |           | ug/kg | 5.3 | 0.46 | 1               |
| Bromomethane                                 | ND     |           | ug/kg | 2.1 | 0.36 | 1               |
| Vinyl chloride                               | ND     |           | ug/kg | 2.1 | 0.34 | 1               |
| Chloroethane                                 | ND     |           | ug/kg | 2.1 | 0.34 | 1               |
| 1,1-Dichloroethene                           | ND     |           | ug/kg | 1.1 | 0.40 | 1               |
| trans-1,2-Dichloroethene                     | ND     |           | ug/kg | 1.6 | 0.26 | 1               |
| Trichloroethene                              | ND     |           | ug/kg | 1.1 | 0.32 | 1               |
| 1,2-Dichlorobenzene                          | ND     |           | ug/kg | 5.3 | 0.19 | 1               |
| 1,3-Dichlorobenzene                          | ND     |           | ug/kg | 5.3 | 0.23 | 1               |

**Project Name:** MAIN & E. BALCOM ST. SITE**Lab Number:** L1804490**Project Number:** B0239-016-001**Report Date:** 02/14/18**SAMPLE RESULTS**

Lab ID: L1804490-01  
 Client ID: MW-5 (20-24')  
 Sample Location: BUFFALO, NY  
 Sample Depth:

Date Collected: 02/08/18 10:00  
 Date Received: 02/08/18  
 Field Prep: Not Specified

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| 1,4-Dichlorobenzene                          | ND     |           | ug/kg | 5.3 | 0.19 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/kg | 2.1 | 0.16 | 1               |
| p/m-Xylene                                   | 0.59   | J         | ug/kg | 2.1 | 0.37 | 1               |
| o-Xylene                                     | ND     |           | ug/kg | 2.1 | 0.36 | 1               |
| cis-1,2-Dichloroethene                       | ND     |           | ug/kg | 1.1 | 0.36 | 1               |
| Styrene                                      | ND     |           | ug/kg | 2.1 | 0.43 | 1               |
| Dichlorodifluoromethane                      | ND     |           | ug/kg | 11  | 0.53 | 1               |
| Acetone                                      | 6.7    | J         | ug/kg | 11  | 2.4  | 1               |
| Carbon disulfide                             | ND     |           | ug/kg | 11  | 1.2  | 1               |
| 2-Butanone                                   | ND     |           | ug/kg | 11  | 0.74 | 1               |
| 4-Methyl-2-pentanone                         | ND     |           | ug/kg | 11  | 0.26 | 1               |
| 2-Hexanone                                   | ND     |           | ug/kg | 11  | 0.71 | 1               |
| Bromochloromethane                           | ND     |           | ug/kg | 5.3 | 0.38 | 1               |
| 1,2-Dibromoethane                            | ND     |           | ug/kg | 4.3 | 0.21 | 1               |
| n-Butylbenzene                               | ND     |           | ug/kg | 1.1 | 0.24 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/kg | 1.1 | 0.23 | 1               |
| 1,2-Dibromo-3-chloropropane                  | ND     |           | ug/kg | 5.3 | 0.42 | 1               |
| Isopropylbenzene                             | ND     |           | ug/kg | 1.1 | 0.21 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/kg | 1.1 | 0.22 | 1               |
| n-Propylbenzene                              | ND     |           | ug/kg | 1.1 | 0.23 | 1               |
| 1,2,3-Trichlorobenzene                       | ND     |           | ug/kg | 5.3 | 0.27 | 1               |
| 1,2,4-Trichlorobenzene                       | ND     |           | ug/kg | 5.3 | 0.23 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/kg | 5.3 | 0.17 | 1               |
| 1,2,4-Trimethylbenzene                       | 0.22   | J         | ug/kg | 5.3 | 0.20 | 1               |
| Methyl Acetate                               | ND     |           | ug/kg | 21  | 0.49 | 1               |
| Cyclohexane                                  | ND     |           | ug/kg | 21  | 0.46 | 1               |
| 1,4-Dioxane                                  | ND     |           | ug/kg | 43  | 15.  | 1               |
| Freon-113                                    | ND     |           | ug/kg | 21  | 0.55 | 1               |
| Methyl cyclohexane                           | ND     |           | ug/kg | 4.3 | 0.26 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 120        |           | 70-130              |
| Toluene-d8            | 108        |           | 70-130              |
| 4-Bromofluorobenzene  | 118        |           | 70-130              |
| Dibromofluoromethane  | 95         |           | 70-130              |

Project Name: MAIN &amp; E. BALCOM ST. SITE

Lab Number: L1804490

Project Number: B0239-016-001

Report Date: 02/14/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 02/13/18 20:31  
 Analyst: MKS

| Parameter   | Result | Qualifier | Units | RL  | MDL  |
|---|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1089110-5 |        |           |       |     |      |
| Methylene chloride  | ND     |           | ug/kg | 10  | 1.6  |
| 1,1-Dichloroethane  | ND     |           | ug/kg | 1.5 | 0.27 |
| Chloroform  | ND     |           | ug/kg | 1.5 | 0.37 |
| Carbon tetrachloride  | ND     |           | ug/kg | 1.0 | 0.34 |
| 1,2-Dichloropropane   | ND     |           | ug/kg | 3.5 | 0.23 |
| Dibromochloromethane  | ND     |           | ug/kg | 1.0 | 0.18 |
| 1,1,2-Trichloroethane   | ND     |           | ug/kg | 1.5 | 0.31 |
| Tetrachloroethene   | ND     |           | ug/kg | 1.0 | 0.30 |
| Chlorobenzene   | ND     |           | ug/kg | 1.0 | 0.35 |
| Trichlorofluoromethane  | ND     |           | ug/kg | 5.0 | 0.42 |
| 1,2-Dichloroethane  | ND     |           | ug/kg | 1.0 | 0.25 |
| 1,1,1-Trichloroethane   | ND     |           | ug/kg | 1.0 | 0.35 |
| Bromodichloromethane  | ND     |           | ug/kg | 1.0 | 0.31 |
| trans-1,3-Dichloropropene   | ND     |           | ug/kg | 1.0 | 0.21 |
| cis-1,3-Dichloropropene   | ND     |           | ug/kg | 1.0 | 0.23 |
| Bromoform   | ND     |           | ug/kg | 4.0 | 0.24 |
| 1,1,2,2-Tetrachloroethane   | ND     |           | ug/kg | 1.0 | 0.30 |
| Benzene   | ND     |           | ug/kg | 1.0 | 0.19 |
| Toluene   | ND     |           | ug/kg | 1.5 | 0.20 |
| Ethylbenzene  | ND     |           | ug/kg | 1.0 | 0.17 |
| Chloromethane   | ND     |           | ug/kg | 5.0 | 0.44 |
| Bromomethane  | ND     |           | ug/kg | 2.0 | 0.34 |
| Vinyl chloride  | ND     |           | ug/kg | 2.0 | 0.32 |
| Chloroethane  | ND     |           | ug/kg | 2.0 | 0.32 |
| 1,1-Dichloroethene  | ND     |           | ug/kg | 1.0 | 0.37 |
| trans-1,2-Dichloroethene  | ND     |           | ug/kg | 1.5 | 0.24 |
| Trichloroethene   | ND     |           | ug/kg | 1.0 | 0.30 |
| 1,2-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.18 |
| 1,3-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.22 |

Project Name: MAIN &amp; E. BALCOM ST. SITE

Lab Number: L1804490

Project Number: B0239-016-001

Report Date: 02/14/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 02/13/18 20:31  
 Analyst: MKS

| Parameter   | Result | Qualifier | Units | RL  | MDL  |
|---|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1089110-5 |        |           |       |     |      |
| 1,4-Dichlorobenzene   | ND     |           | ug/kg | 5.0 | 0.18 |
| Methyl tert butyl ether   | ND     |           | ug/kg | 2.0 | 0.15 |
| p/m-Xylene  | ND     |           | ug/kg | 2.0 | 0.35 |
| o-Xylene  | ND     |           | ug/kg | 2.0 | 0.34 |
| cis-1,2-Dichloroethene  | ND     |           | ug/kg | 1.0 | 0.34 |
| Styrene   | ND     |           | ug/kg | 2.0 | 0.40 |
| Dichlorodifluoromethane   | ND     |           | ug/kg | 10  | 0.50 |
| Acetone   | ND     |           | ug/kg | 10  | 2.3  |
| Carbon disulfide  | ND     |           | ug/kg | 10  | 1.1  |
| 2-Butanone  | ND     |           | ug/kg | 10  | 0.69 |
| 4-Methyl-2-pentanone  | ND     |           | ug/kg | 10  | 0.24 |
| 2-Hexanone  | ND     |           | ug/kg | 10  | 0.67 |
| Bromochloromethane  | ND     |           | ug/kg | 5.0 | 0.36 |
| 1,2-Dibromoethane   | ND     |           | ug/kg | 4.0 | 0.20 |
| n-Butylbenzene  | ND     |           | ug/kg | 1.0 | 0.23 |
| sec-Butylbenzene  | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,2-Dibromo-3-chloropropane   | ND     |           | ug/kg | 5.0 | 0.40 |
| Isopropylbenzene  | ND     |           | ug/kg | 1.0 | 0.19 |
| p-Isopropyltoluene  | ND     |           | ug/kg | 1.0 | 0.20 |
| n-Propylbenzene   | ND     |           | ug/kg | 1.0 | 0.22 |
| 1,2,3-Trichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.25 |
| 1,2,4-Trichlorobenzene  | ND     |           | ug/kg | 5.0 | 0.22 |
| 1,3,5-Trimethylbenzene  | ND     |           | ug/kg | 5.0 | 0.16 |
| 1,2,4-Trimethylbenzene  | ND     |           | ug/kg | 5.0 | 0.19 |
| Methyl Acetate  | ND     |           | ug/kg | 20  | 0.46 |
| Cyclohexane   | ND     |           | ug/kg | 20  | 0.43 |
| 1,4-Dioxane   | ND     |           | ug/kg | 40  | 14.  |
| Freon-113   | ND     |           | ug/kg | 20  | 0.51 |
| Methyl cyclohexane  | ND     |           | ug/kg | 4.0 | 0.24 |

**Project Name:** MAIN & E. BALCOM ST. SITE**Lab Number:** L1804490**Project Number:** B0239-016-001**Report Date:** 02/14/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 02/13/18 20:31  
 Analyst: MKS

| Parameter   | Result | Qualifier | Units | RL | MDL |
|---|--------|-----------|-------|----|-----|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1089110-5 |        |           |       |    |     |

#### Tentatively Identified Compounds

No Tentatively Identified Compounds      ND      ug/kg

| Surrogate             | %Recovery | Qualifier | Acceptance<br>Criteria |
|-----------------------|-----------|-----------|------------------------|
| 1,2-Dichloroethane-d4 | 124       |           | 70-130                 |
| Toluene-d8            | 106       |           | 70-130                 |
| 4-Bromofluorobenzene  | 114       |           | 70-130                 |
| Dibromofluoromethane  | 95        |           | 70-130                 |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & E. BALCOM ST. SITE

**Project Number:** B0239-016-001

**Lab Number:** L1804490

**Report Date:** 02/14/18

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1089110-3 WG1089110-4 |                  |      |                   |      |                     |     |      |               |
| Methylene chloride   | 70               |      | 68                | Q    | 70-130              | 3   |      | 30            |
| 1,1-Dichloroethane   | 92               |      | 91                |      | 70-130              | 1   |      | 30            |
| Chloroform   | 98               |      | 96                |      | 70-130              | 2   |      | 30            |
| Carbon tetrachloride   | 98               |      | 98                |      | 70-130              | 0   |      | 30            |
| 1,2-Dichloropropane  | 88               |      | 85                |      | 70-130              | 3   |      | 30            |
| Dibromochloromethane   | 98               |      | 95                |      | 70-130              | 3   |      | 30            |
| 1,1,2-Trichloroethane  | 105              |      | 103               |      | 70-130              | 2   |      | 30            |
| Tetrachloroethene  | 94               |      | 90                |      | 70-130              | 4   |      | 30            |
| Chlorobenzene  | 99               |      | 96                |      | 70-130              | 3   |      | 30            |
| Trichlorofluoromethane   | 93               |      | 92                |      | 70-139              | 1   |      | 30            |
| 1,2-Dichloroethane   | 108              |      | 106               |      | 70-130              | 2   |      | 30            |
| 1,1,1-Trichloroethane  | 102              |      | 100               |      | 70-130              | 2   |      | 30            |
| Bromodichloromethane   | 97               |      | 95                |      | 70-130              | 2   |      | 30            |
| trans-1,3-Dichloropropene  | 114              |      | 110               |      | 70-130              | 4   |      | 30            |
| cis-1,3-Dichloropropene  | 95               |      | 94                |      | 70-130              | 1   |      | 30            |
| Bromoform  | 100              |      | 95                |      | 70-130              | 5   |      | 30            |
| 1,1,2,2-Tetrachloroethane  | 123              |      | 110               |      | 70-130              | 11  |      | 30            |
| Benzene  | 88               |      | 86                |      | 70-130              | 2   |      | 30            |
| Toluene  | 102              |      | 98                |      | 70-130              | 4   |      | 30            |
| Ethylbenzene   | 106              |      | 104               |      | 70-130              | 2   |      | 30            |
| Chloromethane  | 87               |      | 73                |      | 52-130              | 18  |      | 30            |
| Bromomethane   | 88               |      | 80                |      | 57-147              | 10  |      | 30            |
| Vinyl chloride   | 78               |      | 72                |      | 67-130              | 8   |      | 30            |

# Lab Control Sample Analysis

## Batch Quality Control

Project Name: MAIN &amp; E. BALCOM ST. SITE

Project Number: B0239-016-001

Lab Number: L1804490

Report Date: 02/14/18

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1089110-3 WG1089110-4 |                  |      |                   |      |                     |     |      |               |
| Chloroethane   | 84               |      | 80                |      | 50-151              | 5   |      | 30            |
| 1,1-Dichloroethene   | 79               |      | 87                |      | 65-135              | 10  |      | 30            |
| trans-1,2-Dichloroethene   | 88               |      | 86                |      | 70-130              | 2   |      | 30            |
| Trichloroethene  | 90               |      | 90                |      | 70-130              | 0   |      | 30            |
| 1,2-Dichlorobenzene  | 100              |      | 99                |      | 70-130              | 1   |      | 30            |
| 1,3-Dichlorobenzene  | 100              |      | 99                |      | 70-130              | 1   |      | 30            |
| 1,4-Dichlorobenzene  | 100              |      | 97                |      | 70-130              | 3   |      | 30            |
| Methyl tert butyl ether  | 108              |      | 98                |      | 66-130              | 10  |      | 30            |
| p/m-Xylene   | 101              |      | 99                |      | 70-130              | 2   |      | 30            |
| o-Xylene   | 107              |      | 103               |      | 70-130              | 4   |      | 30            |
| cis-1,2-Dichloroethene   | 88               |      | 86                |      | 70-130              | 2   |      | 30            |
| Styrene  | 106              |      | 100               |      | 70-130              | 6   |      | 30            |
| Dichlorodifluoromethane  | 71               |      | 67                |      | 30-146              | 6   |      | 30            |
| Acetone  | 118              |      | 178               | Q    | 54-140              | 41  | Q    | 30            |
| Carbon disulfide   | 77               |      | 82                |      | 59-130              | 6   |      | 30            |
| 2-Butanone   | 107              |      | 122               |      | 70-130              | 13  |      | 30            |
| 4-Methyl-2-pentanone   | 105              |      | 98                |      | 70-130              | 7   |      | 30            |
| 2-Hexanone   | 139              | Q    | 123               |      | 70-130              | 12  |      | 30            |
| Bromochloromethane   | 87               |      | 85                |      | 70-130              | 2   |      | 30            |
| 1,2-Dibromoethane  | 101              |      | 97                |      | 70-130              | 4   |      | 30            |
| n-Butylbenzene   | 123              |      | 121               |      | 70-130              | 2   |      | 30            |
| sec-Butylbenzene   | 111              |      | 110               |      | 70-130              | 1   |      | 30            |
| 1,2-Dibromo-3-chloropropane  | 88               |      | 86                |      | 68-130              | 2   |      | 30            |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & E. BALCOM ST. SITE

**Lab Number:** L1804490

**Project Number:** B0239-016-001

**Report Date:** 02/14/18

| Parameter  | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|--|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1089110-3 WG1089110-4 |                  |      |                   |      |                     |     |      |               |
| Isopropylbenzene   | 120              |      | 108               |      | 70-130              | 11  |      | 30            |
| p-Isopropyltoluene   | 111              |      | 110               |      | 70-130              | 1   |      | 30            |
| n-Propylbenzene  | 126              |      | 115               |      | 70-130              | 9   |      | 30            |
| 1,2,3-Trichlorobenzene   | 97               |      | 95                |      | 70-130              | 2   |      | 30            |
| 1,2,4-Trichlorobenzene   | 99               |      | 96                |      | 70-130              | 3   |      | 30            |
| 1,3,5-Trimethylbenzene   | 121              |      | 107               |      | 70-130              | 12  |      | 30            |
| 1,2,4-Trimethylbenzene   | 109              |      | 107               |      | 70-130              | 2   |      | 30            |
| Methyl Acetate   | 102              |      | 101               |      | 51-146              | 1   |      | 30            |
| Cyclohexane  | 91               |      | 90                |      | 59-142              | 1   |      | 30            |
| 1,4-Dioxane  | 105              |      | 94                |      | 65-136              | 11  |      | 30            |
| Freon-113  | 90               |      | 96                |      | 50-139              | 6   |      | 30            |
| Methyl cyclohexane   | 100              |      | 97                |      | 70-130              | 3   |      | 30            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 121              |      | 122               |      | 70-130                 |
| Toluene-d8            | 108              |      | 107               |      | 70-130                 |
| 4-Bromofluorobenzene  | 124              |      | 116               |      | 70-130                 |
| Dibromofluoromethane  | 97               |      | 97                |      | 70-130                 |



# **INORGANICS & MISCELLANEOUS**

**Project Name:** MAIN & E. BALCOM ST. SITE**Project Number:** B0239-016-001**Lab Number:** L1804490**Report Date:** 02/14/18**SAMPLE RESULTS****Lab ID:** L1804490-01**Client ID:** MW-5 (20-24')**Sample Location:** BUFFALO, NY**Sample Depth:****Matrix:** Soil**Date Collected:** 02/08/18 10:00**Date Received:** 02/08/18**Field Prep:** Not Specified

| Parameter                           | Result | Qualifier | Units | RL    | MDL | Dilution<br>Factor | Date<br>Prepared | Date<br>Analyzed | Analytical<br>Method | Analyst |
|-------------------------------------|--------|-----------|-------|-------|-----|--------------------|------------------|------------------|----------------------|---------|
| General Chemistry - Westborough Lab |        |           |       |       |     |                    |                  |                  |                      |         |
| Solids, Total                       | 86.7   |           | %     | 0.100 | NA  | 1                  | -                | 02/09/18 10:27   | 121,2540G            | RI      |



**Project Name:** MAIN & E. BALCOM ST. SITE**Project Number:** B0239-016-001**Lab Duplicate Analysis****Batch Quality Control****Lab Number:** L1804490**Report Date:** 02/14/18

| Parameter  | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|--|---------------|------------------|-------|-----|------|------------|
| General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1087953-1 QC Sample: L1804457-01 Client ID: DUP Sample |               |                  |       |     |      |            |
| Solids, Total  | 91.7          | 91.7             | %     | 0   |      | 20         |

**Project Name:** MAIN & E. BALCOM ST. SITE**Lab Number:** L1804490**Project Number:** B0239-016-001**Report Date:** 02/14/18**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information****Cooler**                      **Custody Seal**

A                                  Absent

**Container Information**

| <b>Container ID</b> | <b>Container Type</b>              | <b>Cooler</b> | <b>Initial<br/>pH</b> | <b>Final<br/>pH</b> | <b>Temp<br/>deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen<br/>Date/Time</b> | <b>Analysis(*)</b>      |
|---------------------|------------------------------------|---------------|-----------------------|---------------------|-----------------------|-------------|-------------|-----------------------------|-------------------------|
| L1804490-01A        | Vial Large Septa unpreserved (4oz) | A             | NA                    |                     | 2.7                   | Y           | Absent      |                             | NYTCL-8260-R2(14),TS(7) |
| L1804490-01X        | Vial MeOH preserved split          | A             | NA                    |                     | 2.7                   | Y           | Absent      |                             | NYTCL-8260-R2(14)       |
| L1804490-01Y        | Vial Water preserved split         | A             | NA                    |                     | 2.7                   | Y           | Absent      | 09-FEB-18 12:11             | NYTCL-8260-R2(14)       |
| L1804490-01Z        | Vial Water preserved split         | A             | NA                    |                     | 2.7                   | Y           | Absent      | 09-FEB-18 12:11             | NYTCL-8260-R2(14)       |

**Project Name:** MAIN & E. BALCOM ST. SITE  
**Project Number:** B0239-016-001

**Lab Number:** L1804490  
**Report Date:** 02/14/18

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM ST. SITE  
**Project Number:** B0239-016-001

**Lab Number:** L1804490  
**Report Date:** 02/14/18

#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers



**Project Name:** MAIN & E. BALCOM ST. SITE  
**Project Number:** B0239-016-001

**Lab Number:** L1804490  
**Report Date:** 02/14/18

## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



**Alpha Analytical, Inc.**Facility: **Company-wide**Department: **Quality Assurance**Title: **Certificate/Approval Program Summary**ID No.: **17873**

Revision 11

Published Date: 1/8/2018 4:15:49 PM

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**Certification Information****The following analytes are not included in our Primary NELAP Scope of Accreditation:****Westborough Facility****EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.**Mansfield Facility****SM 2540D:** TSS**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.**Biological Tissue Matrix:** EPA 3050B**The following analytes are included in our Massachusetts DEP Scope of Accreditation****Westborough Facility:****Drinking Water****EPA 300.0:** Chloride, Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE,****EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH:** Ammonia-N and Kjeldahl-N, **EPA 350.1:**Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **EPA 351.1, SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E,****SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E, SM9222D.****Mansfield Facility:****Drinking Water****EPA 200.7:** Al, Ba, Be, Cd, Cr, Cu, Mn, Ni, Na, Ag, Ca, Zn. **EPA 200.8:** Al, Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn. **EPA 245.1 Hg.****EPA 522.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.



[illegible]



## ANALYTICAL REPORT

|                 |  |
|-----------------|--|
| Lab Number:     | L1804815   |
| Client:         | Benchmark & Turnkey Companies<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley  |
| Phone:          | (716) 856-0599   |
| Project Name:   | MAIN & EAST BALCOM ST. SITE  |
| Project Number: | B0234-016-001-004  |
| Report Date:    | 02/19/18   |

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Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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Eight Walkup Drive, Westborough, MA 01581-1019  
508-898-9220 (Fax) 508-898-9193 800-624-9220 - [www.alphalab.com](http://www.alphalab.com)



**Project Name:** MAIN & EAST BALCOM ST. SITE  
**Project Number:** B0234-016-001-004

**Lab Number:** L1804815  
**Report Date:** 02/19/18

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1804815-01                | MW-3             | WATER         | BUFFALO, NY                | 02/11/18 14:20                  | 02/12/18            |
| L1804815-02                | MW-4             | WATER         | BUFFALO, NY                | 02/12/18 07:55                  | 02/12/18            |
| L1804815-03                | MW-5             | WATER         | BUFFALO, NY                | 02/12/18 09:15                  | 02/12/18            |

**Project Name:** MAIN & EAST BALCOM ST. SITE  
**Project Number:** B0234-016-001-004

**Lab Number:** L1804815  
**Report Date:** 02/19/18

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

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**Project Name:** MAIN & EAST BALCOM ST. SITE  
**Project Number:** B0234-016-001-004

**Lab Number:** L1804815  
**Report Date:** 02/19/18

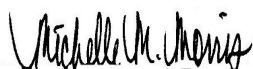
**Case Narrative (continued)**

Report Submission

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:



Michelle M. Morris

Title: Technical Director/Representative

Date: 02/19/18

# ORGANICS

# **VOLATILES**

**Project Name:** MAIN & EAST BALCOM ST. SITE**Lab Number:** L1804815**Project Number:** B0234-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

**Lab ID:** L1804815-01  
**Client ID:** MW-3  
**Sample Location:** BUFFALO, NY  
**Sample Depth:**  
**Matrix:** Water  
**Analytical Method:** 1,8260C  
**Analytical Date:** 02/13/18 10:51  
**Analyst:** PD

**Date Collected:** 02/11/18 14:20  
**Date Received:** 02/12/18  
**Field Prep:** Not Specified

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethane                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloroform                                   | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Carbon tetrachloride                         | ND     |           | ug/l  | 0.50 | 0.13 | 1               |
| 1,2-Dichloropropane                          | ND     |           | ug/l  | 1.0  | 0.14 | 1               |
| Dibromochloromethane                         | ND     |           | ug/l  | 0.50 | 0.15 | 1               |
| 1,1,2-Trichloroethane                        | ND     |           | ug/l  | 1.5  | 0.50 | 1               |
| Tetrachloroethene                            | ND     |           | ug/l  | 0.50 | 0.18 | 1               |
| Chlorobenzene                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichlorofluoromethane                       | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,2-Dichloroethane                           | ND     |           | ug/l  | 0.50 | 0.13 | 1               |
| 1,1,1-Trichloroethane                        | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromodichloromethane                         | ND     |           | ug/l  | 0.50 | 0.19 | 1               |
| trans-1,3-Dichloropropene                    | ND     |           | ug/l  | 0.50 | 0.16 | 1               |
| cis-1,3-Dichloropropene                      | ND     |           | ug/l  | 0.50 | 0.14 | 1               |
| Bromoform                                    | ND     |           | ug/l  | 2.0  | 0.65 | 1               |
| 1,1,2,2-Tetrachloroethane                    | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| Benzene                                      | ND     |           | ug/l  | 0.50 | 0.16 | 1               |
| Toluene                                      | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Ethylbenzene                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloromethane                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromomethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Vinyl chloride                               | ND     |           | ug/l  | 1.0  | 0.07 | 1               |
| Chloroethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethene                           | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| trans-1,2-Dichloroethene                     | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichloroethene                              | 10     |           | ug/l  | 0.50 | 0.18 | 1               |
| 1,2-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,3-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |



**Project Name:** MAIN & EAST BALCOM ST. SITE**Lab Number:** L1804815**Project Number:** B0234-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS****Lab ID:** L1804815-01**Date Collected:** 02/11/18 14:20**Client ID:** MW-3**Date Received:** 02/12/18**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified**Sample Depth:**

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| 1,4-Dichlorobenzene                          | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p/m-Xylene                                   | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| o-Xylene                                     | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| cis-1,2-Dichloroethene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Styrene                                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Dichlorodifluoromethane                      | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Acetone                                      | 4.5    | J         | ug/l  | 5.0 | 1.5  | 1               |
| Carbon disulfide                             | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Butanone                                   | ND     |           | ug/l  | 5.0 | 1.9  | 1               |
| 4-Methyl-2-pentanone                         | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Hexanone                                   | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Bromochloromethane                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromoethane                            | ND     |           | ug/l  | 2.0 | 0.65 | 1               |
| n-Butylbenzene                               | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromo-3-chloropropane                  | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Isopropylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| n-Propylbenzene                              | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,3-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl Acetate                               | ND     |           | ug/l  | 2.0 | 0.23 | 1               |
| Cyclohexane                                  | ND     |           | ug/l  | 10  | 0.27 | 1               |
| 1,4-Dioxane                                  | ND     |           | ug/l  | 250 | 61.  | 1               |
| Freon-113                                    | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl cyclohexane                           | ND     |           | ug/l  | 10  | 0.40 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 106        |           | 70-130              |
| Toluene-d8            | 103        |           | 70-130              |
| 4-Bromofluorobenzene  | 104        |           | 70-130              |
| Dibromofluoromethane  | 94         |           | 70-130              |

**Project Name:** MAIN & EAST BALCOM ST. SITE**Lab Number:** L1804815**Project Number:** B0234-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

**Lab ID:** L1804815-02  
**Client ID:** MW-4  
**Sample Location:** BUFFALO, NY  
**Sample Depth:**  
**Matrix:** Water  
**Analytical Method:** 1,8260C  
**Analytical Date:** 02/13/18 11:16  
**Analyst:** PD

**Date Collected:** 02/12/18 07:55  
**Date Received:** 02/12/18  
**Field Prep:** Not Specified

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethane                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloroform                                   | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Carbon tetrachloride                         | ND     |           | ug/l  | 0.50 | 0.13 | 1               |
| 1,2-Dichloropropane                          | ND     |           | ug/l  | 1.0  | 0.14 | 1               |
| Dibromochloromethane                         | ND     |           | ug/l  | 0.50 | 0.15 | 1               |
| 1,1,2-Trichloroethane                        | ND     |           | ug/l  | 1.5  | 0.50 | 1               |
| Tetrachloroethene                            | ND     |           | ug/l  | 0.50 | 0.18 | 1               |
| Chlorobenzene                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichlorofluoromethane                       | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,2-Dichloroethane                           | 0.16   | J         | ug/l  | 0.50 | 0.13 | 1               |
| 1,1,1-Trichloroethane                        | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromodichloromethane                         | ND     |           | ug/l  | 0.50 | 0.19 | 1               |
| trans-1,3-Dichloropropene                    | ND     |           | ug/l  | 0.50 | 0.16 | 1               |
| cis-1,3-Dichloropropene                      | ND     |           | ug/l  | 0.50 | 0.14 | 1               |
| Bromoform                                    | ND     |           | ug/l  | 2.0  | 0.65 | 1               |
| 1,1,2,2-Tetrachloroethane                    | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| Benzene                                      | 1.9    |           | ug/l  | 0.50 | 0.16 | 1               |
| Toluene                                      | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Ethylbenzene                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloromethane                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromomethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Vinyl chloride                               | 2.5    |           | ug/l  | 1.0  | 0.07 | 1               |
| Chloroethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethene                           | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| trans-1,2-Dichloroethene                     | 58     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichloroethene                              | 8.0    |           | ug/l  | 0.50 | 0.18 | 1               |
| 1,2-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,3-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |

**Project Name:** MAIN & EAST BALCOM ST. SITE**Lab Number:** L1804815**Project Number:** B0234-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS****Lab ID:** L1804815-02**Date Collected:** 02/12/18 07:55**Client ID:** MW-4**Date Received:** 02/12/18**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified**Sample Depth:**

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| 1,4-Dichlorobenzene                          | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p/m-Xylene                                   | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| o-Xylene                                     | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| cis-1,2-Dichloroethene                       | 21     |           | ug/l  | 2.5 | 0.70 | 1               |
| Styrene                                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Dichlorodifluoromethane                      | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Acetone                                      | 93     |           | ug/l  | 5.0 | 1.5  | 1               |
| Carbon disulfide                             | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Butanone                                   | 13     |           | ug/l  | 5.0 | 1.9  | 1               |
| 4-Methyl-2-pentanone                         | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Hexanone                                   | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Bromochloromethane                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromoethane                            | ND     |           | ug/l  | 2.0 | 0.65 | 1               |
| n-Butylbenzene                               | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromo-3-chloropropane                  | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Isopropylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| n-Propylbenzene                              | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,3-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl Acetate                               | ND     |           | ug/l  | 2.0 | 0.23 | 1               |
| Cyclohexane                                  | 0.29   | J         | ug/l  | 10  | 0.27 | 1               |
| 1,4-Dioxane                                  | ND     |           | ug/l  | 250 | 61.  | 1               |
| Freon-113                                    | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl cyclohexane                           | ND     |           | ug/l  | 10  | 0.40 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 108        |           | 70-130              |
| Toluene-d8            | 103        |           | 70-130              |
| 4-Bromofluorobenzene  | 105        |           | 70-130              |
| Dibromofluoromethane  | 95         |           | 70-130              |

**Project Name:** MAIN & EAST BALCOM ST. SITE**Lab Number:** L1804815**Project Number:** B0234-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

**Lab ID:** L1804815-03  
**Client ID:** MW-5  
**Sample Location:** BUFFALO, NY  
**Sample Depth:**  
**Matrix:** Water  
**Analytical Method:** 1,8260C  
**Analytical Date:** 02/13/18 11:41  
**Analyst:** PD

**Date Collected:** 02/12/18 09:15  
**Date Received:** 02/12/18  
**Field Prep:** Not Specified

| Parameter                                    | Result | Qualifier | Units | RL   | MDL  | Dilution Factor |
|--|--------|-----------|-------|------|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |      |      |                 |
| Methylene chloride                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethane                           | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloroform                                   | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Carbon tetrachloride                         | ND     |           | ug/l  | 0.50 | 0.13 | 1               |
| 1,2-Dichloropropane                          | ND     |           | ug/l  | 1.0  | 0.14 | 1               |
| Dibromochloromethane                         | ND     |           | ug/l  | 0.50 | 0.15 | 1               |
| 1,1,2-Trichloroethane                        | ND     |           | ug/l  | 1.5  | 0.50 | 1               |
| Tetrachloroethene                            | ND     |           | ug/l  | 0.50 | 0.18 | 1               |
| Chlorobenzene                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichlorofluoromethane                       | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,2-Dichloroethane                           | ND     |           | ug/l  | 0.50 | 0.13 | 1               |
| 1,1,1-Trichloroethane                        | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromodichloromethane                         | ND     |           | ug/l  | 0.50 | 0.19 | 1               |
| trans-1,3-Dichloropropene                    | ND     |           | ug/l  | 0.50 | 0.16 | 1               |
| cis-1,3-Dichloropropene                      | ND     |           | ug/l  | 0.50 | 0.14 | 1               |
| Bromoform                                    | ND     |           | ug/l  | 2.0  | 0.65 | 1               |
| 1,1,2,2-Tetrachloroethane                    | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| Benzene                                      | ND     |           | ug/l  | 0.50 | 0.16 | 1               |
| Toluene                                      | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Ethylbenzene                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Chloromethane                                | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Bromomethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Vinyl chloride                               | 0.50   | J         | ug/l  | 1.0  | 0.07 | 1               |
| Chloroethane                                 | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,1-Dichloroethene                           | ND     |           | ug/l  | 0.50 | 0.17 | 1               |
| trans-1,2-Dichloroethene                     | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| Trichloroethene                              | ND     |           | ug/l  | 0.50 | 0.18 | 1               |
| 1,2-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |
| 1,3-Dichlorobenzene                          | ND     |           | ug/l  | 2.5  | 0.70 | 1               |

**Project Name:** MAIN & EAST BALCOM ST. SITE**Lab Number:** L1804815**Project Number:** B0234-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS****Lab ID:** L1804815-03**Date Collected:** 02/12/18 09:15**Client ID:** MW-5**Date Received:** 02/12/18**Sample Location:** BUFFALO, NY**Field Prep:** Not Specified**Sample Depth:**

| Parameter                                    | Result | Qualifier | Units | RL  | MDL  | Dilution Factor |
|--|--------|-----------|-------|-----|------|-----------------|
| Volatile Organics by GC/MS - Westborough Lab |        |           |       |     |      |                 |
| 1,4-Dichlorobenzene                          | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl tert butyl ether                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p/m-Xylene                                   | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| o-Xylene                                     | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| cis-1,2-Dichloroethene                       | 5.2    |           | ug/l  | 2.5 | 0.70 | 1               |
| Styrene                                      | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Dichlorodifluoromethane                      | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Acetone                                      | 9.0    |           | ug/l  | 5.0 | 1.5  | 1               |
| Carbon disulfide                             | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Butanone                                   | ND     |           | ug/l  | 5.0 | 1.9  | 1               |
| 4-Methyl-2-pentanone                         | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| 2-Hexanone                                   | ND     |           | ug/l  | 5.0 | 1.0  | 1               |
| Bromochloromethane                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromoethane                            | ND     |           | ug/l  | 2.0 | 0.65 | 1               |
| n-Butylbenzene                               | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| sec-Butylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2-Dibromo-3-chloropropane                  | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Isopropylbenzene                             | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| p-Isopropyltoluene                           | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| n-Propylbenzene                              | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,3-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trichlorobenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,3,5-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| 1,2,4-Trimethylbenzene                       | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl Acetate                               | ND     |           | ug/l  | 2.0 | 0.23 | 1               |
| Cyclohexane                                  | ND     |           | ug/l  | 10  | 0.27 | 1               |
| 1,4-Dioxane                                  | ND     |           | ug/l  | 250 | 61.  | 1               |
| Freon-113                                    | ND     |           | ug/l  | 2.5 | 0.70 | 1               |
| Methyl cyclohexane                           | ND     |           | ug/l  | 10  | 0.40 | 1               |

| Surrogate             | % Recovery | Qualifier | Acceptance Criteria |
|-----------------------|------------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 108        |           | 70-130              |
| Toluene-d8            | 103        |           | 70-130              |
| 4-Bromofluorobenzene  | 104        |           | 70-130              |
| Dibromofluoromethane  | 95         |           | 70-130              |

Project Name: MAIN &amp; EAST BALCOM ST. SITE

Lab Number: L1804815

Project Number: B0234-016-001-004

Report Date: 02/19/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 02/13/18 07:56  
 Analyst: PD

| Parameter  | Result | Qualifier | Units | RL   | MDL  |
|--|--------|-----------|-------|------|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-03 Batch: WG1088799-5 |        |           |       |      |      |
| Methylene chloride   | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,1-Dichloroethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| Chloroform   | ND     |           | ug/l  | 2.5  | 0.70 |
| Carbon tetrachloride   | ND     |           | ug/l  | 0.50 | 0.13 |
| 1,2-Dichloropropane  | ND     |           | ug/l  | 1.0  | 0.14 |
| Dibromochloromethane   | ND     |           | ug/l  | 0.50 | 0.15 |
| 1,1,2-Trichloroethane  | ND     |           | ug/l  | 1.5  | 0.50 |
| Tetrachloroethene  | ND     |           | ug/l  | 0.50 | 0.18 |
| Chlorobenzene  | ND     |           | ug/l  | 2.5  | 0.70 |
| Trichlorofluoromethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,2-Dichloroethane   | ND     |           | ug/l  | 0.50 | 0.13 |
| 1,1,1-Trichloroethane  | ND     |           | ug/l  | 2.5  | 0.70 |
| Bromodichloromethane   | ND     |           | ug/l  | 0.50 | 0.19 |
| trans-1,3-Dichloropropene  | ND     |           | ug/l  | 0.50 | 0.16 |
| cis-1,3-Dichloropropene  | ND     |           | ug/l  | 0.50 | 0.14 |
| Bromoform  | ND     |           | ug/l  | 2.0  | 0.65 |
| 1,1,2,2-Tetrachloroethane  | ND     |           | ug/l  | 0.50 | 0.17 |
| Benzene  | ND     |           | ug/l  | 0.50 | 0.16 |
| Toluene  | ND     |           | ug/l  | 2.5  | 0.70 |
| Ethylbenzene   | ND     |           | ug/l  | 2.5  | 0.70 |
| Chloromethane  | ND     |           | ug/l  | 2.5  | 0.70 |
| Bromomethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| Vinyl chloride   | ND     |           | ug/l  | 1.0  | 0.07 |
| Chloroethane   | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,1-Dichloroethene   | ND     |           | ug/l  | 0.50 | 0.17 |
| trans-1,2-Dichloroethene   | ND     |           | ug/l  | 2.5  | 0.70 |
| Trichloroethene  | ND     |           | ug/l  | 0.50 | 0.18 |
| 1,2-Dichlorobenzene  | ND     |           | ug/l  | 2.5  | 0.70 |
| 1,3-Dichlorobenzene  | ND     |           | ug/l  | 2.5  | 0.70 |

Project Name: MAIN &amp; EAST BALCOM ST. SITE

Lab Number: L1804815

Project Number: B0234-016-001-004

Report Date: 02/19/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 1,8260C  
 Analytical Date: 02/13/18 07:56  
 Analyst: PD

| Parameter  | Result | Qualifier | Units | RL  | MDL  |
|--|--------|-----------|-------|-----|------|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-03 Batch: WG1088799-5 |        |           |       |     |      |
| 1,4-Dichlorobenzene  | ND     |           | ug/l  | 2.5 | 0.70 |
| Methyl tert butyl ether  | ND     |           | ug/l  | 2.5 | 0.70 |
| p/m-Xylene   | ND     |           | ug/l  | 2.5 | 0.70 |
| o-Xylene   | ND     |           | ug/l  | 2.5 | 0.70 |
| cis-1,2-Dichloroethene   | ND     |           | ug/l  | 2.5 | 0.70 |
| Styrene  | ND     |           | ug/l  | 2.5 | 0.70 |
| Dichlorodifluoromethane  | ND     |           | ug/l  | 5.0 | 1.0  |
| Acetone  | ND     |           | ug/l  | 5.0 | 1.5  |
| Carbon disulfide   | ND     |           | ug/l  | 5.0 | 1.0  |
| 2-Butanone   | ND     |           | ug/l  | 5.0 | 1.9  |
| 4-Methyl-2-pentanone   | ND     |           | ug/l  | 5.0 | 1.0  |
| 2-Hexanone   | ND     |           | ug/l  | 5.0 | 1.0  |
| Bromochloromethane   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2-Dibromoethane  | ND     |           | ug/l  | 2.0 | 0.65 |
| n-Butylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| sec-Butylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2-Dibromo-3-chloropropane  | ND     |           | ug/l  | 2.5 | 0.70 |
| Isopropylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| p-Isopropyltoluene   | ND     |           | ug/l  | 2.5 | 0.70 |
| n-Propylbenzene  | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2,3-Trichlorobenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2,4-Trichlorobenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,3,5-Trimethylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| 1,2,4-Trimethylbenzene   | ND     |           | ug/l  | 2.5 | 0.70 |
| Methyl Acetate   | ND     |           | ug/l  | 2.0 | 0.23 |
| Cyclohexane  | ND     |           | ug/l  | 10  | 0.27 |
| 1,4-Dioxane  | ND     |           | ug/l  | 250 | 61.  |
| Freon-113  | ND     |           | ug/l  | 2.5 | 0.70 |
| Methyl cyclohexane   | ND     |           | ug/l  | 10  | 0.40 |

**Project Name:** MAIN & EAST BALCOM ST. SITE**Lab Number:** L1804815**Project Number:** B0234-016-001-004**Report Date:** 02/19/18**Method Blank Analysis**  
**Batch Quality Control**

Analytical Method: 1,8260C

Analytical Date: 02/13/18 07:56

Analyst: PD

| Parameter  | Result | Qualifier | Units | RL | MDL |
|--|--------|-----------|-------|----|-----|
| Volatile Organics by GC/MS - Westborough Lab for sample(s): 01-03 Batch: WG1088799-5 |        |           |       |    |     |

## Tentatively Identified Compounds

No Tentatively Identified Compounds ND ug/l

| Surrogate             | %Recovery | Qualifier | Acceptance Criteria |
|-----------------------|-----------|-----------|---------------------|
| 1,2-Dichloroethane-d4 | 103       |           | 70-130              |
| Toluene-d8            | 103       |           | 70-130              |
| 4-Bromofluorobenzene  | 104       |           | 70-130              |
| Dibromofluoromethane  | 93        |           | 70-130              |



# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & EAST BALCOM ST. SITE

**Lab Number:** L1804815

**Project Number:** B0234-016-001-004

**Report Date:** 02/19/18

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 Batch: WG1088799-3 WG1088799-4 |                  |      |                   |      |                     |     |      |               |
| Methylene chloride  | 85               |      | 85                |      | 70-130              | 0   |      | 20            |
| 1,1-Dichloroethane  | 94               |      | 93                |      | 70-130              | 1   |      | 20            |
| Chloroform  | 91               |      | 91                |      | 70-130              | 0   |      | 20            |
| Carbon tetrachloride  | 78               |      | 76                |      | 63-132              | 3   |      | 20            |
| 1,2-Dichloropropane   | 93               |      | 93                |      | 70-130              | 0   |      | 20            |
| Dibromochloromethane  | 80               |      | 82                |      | 63-130              | 2   |      | 20            |
| 1,1,2-Trichloroethane   | 94               |      | 97                |      | 70-130              | 3   |      | 20            |
| Tetrachloroethene   | 86               |      | 83                |      | 70-130              | 4   |      | 20            |
| Chlorobenzene   | 90               |      | 89                |      | 75-130              | 1   |      | 20            |
| Trichlorofluoromethane  | 110              |      | 100               |      | 62-150              | 10  |      | 20            |
| 1,2-Dichloroethane  | 95               |      | 97                |      | 70-130              | 2   |      | 20            |
| 1,1,1-Trichloroethane   | 86               |      | 83                |      | 67-130              | 4   |      | 20            |
| Bromodichloromethane  | 86               |      | 87                |      | 67-130              | 1   |      | 20            |
| trans-1,3-Dichloropropene   | 87               |      | 88                |      | 70-130              | 1   |      | 20            |
| cis-1,3-Dichloropropene   | 84               |      | 86                |      | 70-130              | 2   |      | 20            |
| Bromoform   | 74               |      | 77                |      | 54-136              | 4   |      | 20            |
| 1,1,2,2-Tetrachloroethane   | 95               |      | 100               |      | 67-130              | 5   |      | 20            |
| Benzene   | 90               |      | 88                |      | 70-130              | 2   |      | 20            |
| Toluene   | 93               |      | 90                |      | 70-130              | 3   |      | 20            |
| Ethylbenzene  | 95               |      | 93                |      | 70-130              | 2   |      | 20            |
| Chloromethane   | 96               |      | 91                |      | 64-130              | 5   |      | 20            |
| Bromomethane  | 88               |      | 80                |      | 39-139              | 10  |      | 20            |
| Vinyl chloride  | 89               |      | 87                |      | 55-140              | 2   |      | 20            |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM ST. SITE

**Project Number:** B0234-016-001-004

**Lab Number:** L1804815

**Report Date:** 02/19/18

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 Batch: WG1088799-3 WG1088799-4 |                  |      |                   |      |                     |     |      |               |
| Chloroethane  | 100              |      | 97                |      | 55-138              | 3   |      | 20            |
| 1,1-Dichloroethene  | 84               |      | 82                |      | 61-145              | 2   |      | 20            |
| trans-1,2-Dichloroethene  | 87               |      | 84                |      | 70-130              | 4   |      | 20            |
| Trichloroethene   | 87               |      | 85                |      | 70-130              | 2   |      | 20            |
| 1,2-Dichlorobenzene   | 89               |      | 89                |      | 70-130              | 0   |      | 20            |
| 1,3-Dichlorobenzene   | 90               |      | 89                |      | 70-130              | 1   |      | 20            |
| 1,4-Dichlorobenzene   | 90               |      | 89                |      | 70-130              | 1   |      | 20            |
| Methyl tert butyl ether   | 76               |      | 80                |      | 63-130              | 5   |      | 20            |
| p/m-Xylene  | 95               |      | 90                |      | 70-130              | 5   |      | 20            |
| o-Xylene  | 95               |      | 90                |      | 70-130              | 5   |      | 20            |
| cis-1,2-Dichloroethene  | 86               |      | 84                |      | 70-130              | 2   |      | 20            |
| Styrene   | 95               |      | 95                |      | 70-130              | 0   |      | 20            |
| Dichlorodifluoromethane   | 74               |      | 71                |      | 36-147              | 4   |      | 20            |
| Acetone   | 100              |      | 100               |      | 58-148              | 0   |      | 20            |
| Carbon disulfide  | 83               |      | 80                |      | 51-130              | 4   |      | 20            |
| 2-Butanone  | 100              |      | 110               |      | 63-138              | 10  |      | 20            |
| 4-Methyl-2-pentanone  | 85               |      | 90                |      | 59-130              | 6   |      | 20            |
| 2-Hexanone  | 85               |      | 90                |      | 57-130              | 6   |      | 20            |
| Bromochloromethane  | 81               |      | 84                |      | 70-130              | 4   |      | 20            |
| 1,2-Dibromoethane   | 85               |      | 88                |      | 70-130              | 3   |      | 20            |
| n-Butylbenzene  | 100              |      | 100               |      | 53-136              | 0   |      | 20            |
| sec-Butylbenzene  | 99               |      | 97                |      | 70-130              | 2   |      | 20            |
| 1,2-Dibromo-3-chloropropane   | 72               |      | 75                |      | 41-144              | 4   |      | 20            |

# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM ST. SITE

**Lab Number:** L1804815

**Project Number:** B0234-016-001-004

**Report Date:** 02/19/18

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01-03 Batch: WG1088799-3 WG1088799-4 |                  |      |                   |      |                     |     |      |               |
| Isopropylbenzene  | 98               |      | 95                |      | 70-130              | 3   |      | 20            |
| p-Isopropyltoluene  | 96               |      | 94                |      | 70-130              | 2   |      | 20            |
| n-Propylbenzene   | 100              |      | 100               |      | 69-130              | 0   |      | 20            |
| 1,2,3-Trichlorobenzene  | 84               |      | 94                |      | 70-130              | 11  |      | 20            |
| 1,2,4-Trichlorobenzene  | 84               |      | 90                |      | 70-130              | 7   |      | 20            |
| 1,3,5-Trimethylbenzene  | 97               |      | 95                |      | 64-130              | 2   |      | 20            |
| 1,2,4-Trimethylbenzene  | 97               |      | 96                |      | 70-130              | 1   |      | 20            |
| Methyl Acetate  | 94               |      | 100               |      | 70-130              | 6   |      | 20            |
| Cyclohexane   | 98               |      | 96                |      | 70-130              | 2   |      | 20            |
| 1,4-Dioxane   | 70               |      | 70                |      | 56-162              | 0   |      | 20            |
| Freon-113   | 86               |      | 84                |      | 70-130              | 2   |      | 20            |
| Methyl cyclohexane  | 89               |      | 89                |      | 70-130              | 0   |      | 20            |

| Surrogate             | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | Acceptance<br>Criteria |
|-----------------------|------------------|------|-------------------|------|------------------------|
| 1,2-Dichloroethane-d4 | 108              |      | 110               |      | 70-130                 |
| Toluene-d8            | 105              |      | 103               |      | 70-130                 |
| 4-Bromofluorobenzene  | 105              |      | 103               |      | 70-130                 |
| Dibromofluoromethane  | 96               |      | 96                |      | 70-130                 |

**Project Name:** MAIN & EAST BALCOM ST. SITE**Lab Number:** L1804815**Project Number:** B0234-016-001-004**Report Date:** 02/19/18**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information**

|               |                     |
|---------------|---------------------|
| <b>Cooler</b> | <b>Custody Seal</b> |
| A             | Absent              |

**Container Information**

| <b>Container ID</b> | <b>Container Type</b> | <b>Cooler</b> | <b>Initial<br/>pH</b> | <b>Final<br/>pH</b> | <b>Temp<br/>deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen<br/>Date/Time</b> | <b>Analysis(*)</b> |
|---------------------|-----------------------|---------------|-----------------------|---------------------|-----------------------|-------------|-------------|-----------------------------|--------------------|
| L1804815-01A        | Vial HCl preserved    | A             | NA                    |                     | 3.1                   | Y           | Absent      |                             | NYTCL-8260-R2(14)  |
| L1804815-01B        | Vial HCl preserved    | A             | NA                    |                     | 3.1                   | Y           | Absent      |                             | NYTCL-8260-R2(14)  |
| L1804815-01C        | Vial HCl preserved    | A             | NA                    |                     | 3.1                   | Y           | Absent      |                             | NYTCL-8260-R2(14)  |
| L1804815-02A        | Vial HCl preserved    | A             | NA                    |                     | 3.1                   | Y           | Absent      |                             | NYTCL-8260-R2(14)  |
| L1804815-02B        | Vial HCl preserved    | A             | NA                    |                     | 3.1                   | Y           | Absent      |                             | NYTCL-8260-R2(14)  |
| L1804815-02C        | Vial HCl preserved    | A             | NA                    |                     | 3.1                   | Y           | Absent      |                             | NYTCL-8260-R2(14)  |
| L1804815-03A        | Vial HCl preserved    | A             | NA                    |                     | 3.1                   | Y           | Absent      |                             | NYTCL-8260-R2(14)  |
| L1804815-03B        | Vial HCl preserved    | A             | NA                    |                     | 3.1                   | Y           | Absent      |                             | NYTCL-8260-R2(14)  |
| L1804815-03C        | Vial HCl preserved    | A             | NA                    |                     | 3.1                   | Y           | Absent      |                             | NYTCL-8260-R2(14)  |

**Project Name:** MAIN & EAST BALCOM ST. SITE**Lab Number:** L1804815**Project Number:** B0234-016-001-004**Report Date:** 02/19/18

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** DU Report with 'J' Qualifiers



**Project Name:** MAIN & EAST BALCOM ST. SITE**Lab Number:** L1804815**Project Number:** B0234-016-001-004**Report Date:** 02/19/18**Data Qualifiers**

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.

Report Format: DU Report with 'J' Qualifiers



**Project Name:** MAIN & EAST BALCOM ST. SITE  
**Project Number:** B0234-016-001-004

**Lab Number:** L1804815  
**Report Date:** 02/19/18

## REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



## Certification Information

The following analytes are not included in our Primary NELAP Scope of Accreditation:

### Westborough Facility

**EPA 624:** m/p-xylene, o-xylene

**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.

**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.

**EPA 300:** DW: Bromide

**EPA 6860:** SCM: Perchlorate

**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation

**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.

### Mansfield Facility

**SM 2540D:** TSS

**EPA 8082A:** NPW: PCB: 1, 5, 31, 87,101, 110, 141, 151, 153, 180, 183, 187.

**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.

**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

### Westborough Facility:

#### Drinking Water

**EPA 300.0:** Chloride, Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE,**

**EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B**

**EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.

**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.**

#### Non-Potable Water

**SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH:** Ammonia-N and Kjeldahl-N, **EPA 350.1:**

Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **EPA 351.1, SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E,**

**SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.**

**EPA 624:** Volatile Halocarbons & Aromatics,

**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs

**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.

**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E, SM9222D.**

### Mansfield Facility:

#### Drinking Water

**EPA 200.7:** Al, Ba, Be, Cd, Cr, Cu, Mn, Ni, Na, Ag, Ca, Zn. **EPA 200.8:** Al, Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn. **EPA 245.1 Hg.**

**EPA 522.**

#### Non-Potable Water

**EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.

**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.

**EPA 245.1 Hg.**

**SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.



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2/12/18 13:30  
2/13/18 0100

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## ANALYTICAL REPORT

|                 |   |
|-----------------|---|
| Lab Number:     | L1804819  |
| Client:         | Turnkey Environmental Restoration, LLC<br>2558 Hamburg Turnpike<br>Suite 300<br>Buffalo, NY 14218 |
| ATTN:           | Nate Munley   |
| Phone:          | (716) 856-0599  |
| Project Name:   | MAIN & EAST BALCOM STREET SITE  |
| Project Number: | B0239-016-001-004   |
| Report Date:    | 02/19/18  |

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Certifications & Approvals: MA (M-MA086), NH NELAP (2064), NJ NELAP (MA935), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-14-00197).

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**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1804819  
**Report Date:** 02/19/18

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1804819-01                | SSV-1            | SOIL_VAPOR    | BUFFALO, NY                | 02/12/18 05:46                  | 02/12/18            |
| L1804819-02                | BD               | SOIL_VAPOR    | BUFFALO, NY                | 02/12/18 05:47                  | 02/12/18            |
| L1804819-03                | AMBIENT-1        | AIR           | BUFFALO, NY                | 02/12/18 05:47                  | 02/12/18            |
| L1804819-04                | SSV-2            | SOIL_VAPOR    | BUFFALO, NY                | 02/12/18 05:50                  | 02/12/18            |
| L1804819-05                | AMBIENT-2        | AIR           | BUFFALO, NY                | 02/12/18 05:49                  | 02/12/18            |
| L1804819-06                | AMBIENT-3        | AIR           | BUFFALO, NY                | 02/12/18 05:43                  | 02/12/18            |
| L1804819-07                | OUTDOOR-1        | AIR           | BUFFALO, NY                | 02/12/18 05:50                  | 02/12/18            |
| L1804819-08                | UNUSED CAN #160  | AIR           | BUFFALO, NY                |                                 | 02/12/18            |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1804819  
**Report Date:** 02/19/18

### Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

#### HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

---

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1804819  
**Report Date:** 02/19/18

### Case Narrative (continued)

#### Volatile Organics in Air

Canisters were released from the laboratory on February 2, 2018. The canister certification results are provided as an addendum.

The WG1089689-3 LCS recoveries for bromoform (136%), 4-ethyltoluene (142%) and 1,2,4-trimethylbenzene (132%) are above the upper 130% acceptance limit. All samples associated with this LCS do not have reportable amounts of these analytes.

L1804819-01 and -02: The samples have elevated detection limits due to the dilution required by the elevated concentrations of target compounds in the samples.

L1804819-01, -02 and -04 The presence of 2,2,4-Triethylpentane could not be determined in these samples due to a non-target compound interfering with the identification and quantification of this compound.

L1804819-01 and -02 The presence of Acetone could not be determined in these samples due to a non-target compound interfering with the identification and quantification of this compound.

L1804819-04 and -07 results for Acetone should be considered estimated due to co-elution with a non-target peak.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:  Christopher J. Anderson

Title: Technical Director/Representative

Date: 02/19/18

**AIR**

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-01 D

Client ID: SSV-1

Sample Location: BUFFALO, NY

Sample Depth:

Matrix: Soil\_Vapor

Analytical Method: 48,TO-15

Analytical Date: 02/15/18 20:55

Analyst: MB

Date Collected: 02/12/18 05:46

Date Received: 02/12/18

Field Prep: Not Specified

| Parameter                                | ppbV    |      |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL   | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |      |     |         |      |     |           |                 |
| Dichlorodifluoromethane                  | ND      | 1.00 | --  | ND      | 4.94 | --  |           | 5               |
| Chloromethane                            | ND      | 1.00 | --  | ND      | 2.07 | --  |           | 5               |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane   | ND      | 1.00 | --  | ND      | 6.99 | --  |           | 5               |
| Vinyl chloride                           | ND      | 1.00 | --  | ND      | 2.56 | --  |           | 5               |
| 1,3-Butadiene                            | ND      | 1.00 | --  | ND      | 2.21 | --  |           | 5               |
| Bromomethane                             | ND      | 1.00 | --  | ND      | 3.88 | --  |           | 5               |
| Chloroethane                             | ND      | 1.00 | --  | ND      | 2.64 | --  |           | 5               |
| Ethyl Alcohol                            | 81.6    | 25.0 | --  | 154     | 47.1 | --  |           | 5               |
| Vinyl bromide                            | ND      | 1.00 | --  | ND      | 4.37 | --  |           | 5               |
| Acetone                                  | ND      | 5.00 | --  | ND      | 11.9 | --  |           | 5               |
| Trichlorofluoromethane                   | ND      | 1.00 | --  | ND      | 5.62 | --  |           | 5               |
| iso-Propyl Alcohol                       | 5.39    | 2.50 | --  | 13.2    | 6.15 | --  |           | 5               |
| 1,1-Dichloroethene                       | ND      | 1.00 | --  | ND      | 3.96 | --  |           | 5               |
| tert-Butyl Alcohol                       | ND      | 2.50 | --  | ND      | 7.58 | --  |           | 5               |
| Methylene chloride                       | ND      | 2.50 | --  | ND      | 8.69 | --  |           | 5               |
| 3-Chloropropene                          | ND      | 1.00 | --  | ND      | 3.13 | --  |           | 5               |
| Carbon disulfide                         | 30.7    | 1.00 | --  | 95.6    | 3.11 | --  |           | 5               |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane    | 1.22    | 1.00 | --  | 9.35    | 7.66 | --  |           | 5               |
| trans-1,2-Dichloroethene                 | ND      | 1.00 | --  | ND      | 3.96 | --  |           | 5               |
| 1,1-Dichloroethane                       | ND      | 1.00 | --  | ND      | 4.05 | --  |           | 5               |
| Methyl tert butyl ether                  | ND      | 1.00 | --  | ND      | 3.61 | --  |           | 5               |
| 2-Butanone                               | 3.88    | 2.50 | --  | 11.4    | 7.37 | --  |           | 5               |
| cis-1,2-Dichloroethene                   | ND      | 1.00 | --  | ND      | 3.96 | --  |           | 5               |
| Ethyl Acetate                            | ND      | 2.50 | --  | ND      | 9.01 | --  |           | 5               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-01 D

Date Collected: 02/12/18 05:46

Client ID: SSV-1

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |      |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL   | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |      |     |         |      |     |           |                 |
| Chloroform                               | ND      | 1.00 | --  | ND      | 4.88 | --  |           | 5               |
| Tetrahydrofuran                          | ND      | 2.50 | --  | ND      | 7.37 | --  |           | 5               |
| 1,2-Dichloroethane                       | ND      | 1.00 | --  | ND      | 4.05 | --  |           | 5               |
| n-Hexane                                 | 328     | 1.00 | --  | 1160    | 3.52 | --  |           | 5               |
| 1,1,1-Trichloroethane                    | ND      | 1.00 | --  | ND      | 5.46 | --  |           | 5               |
| Benzene                                  | 28.9    | 1.00 | --  | 92.3    | 3.19 | --  |           | 5               |
| Carbon tetrachloride                     | ND      | 1.00 | --  | ND      | 6.29 | --  |           | 5               |
| Cyclohexane                              | 454     | 1.00 | --  | 1560    | 3.44 | --  |           | 5               |
| 1,2-Dichloropropane                      | ND      | 1.00 | --  | ND      | 4.62 | --  |           | 5               |
| Bromodichloromethane                     | ND      | 1.00 | --  | ND      | 6.70 | --  |           | 5               |
| 1,4-Dioxane                              | ND      | 1.00 | --  | ND      | 3.60 | --  |           | 5               |
| Trichloroethene                          | ND      | 1.00 | --  | ND      | 5.37 | --  |           | 5               |
| 2,2,4-Trimethylpentane                   | ND      | 1.00 | --  | ND      | 4.67 | --  |           | 5               |
| Heptane                                  | 54.9    | 1.00 | --  | 225     | 4.10 | --  |           | 5               |
| cis-1,3-Dichloropropene                  | ND      | 1.00 | --  | ND      | 4.54 | --  |           | 5               |
| 4-Methyl-2-pentanone                     | ND      | 2.50 | --  | ND      | 10.2 | --  |           | 5               |
| trans-1,3-Dichloropropene                | ND      | 1.00 | --  | ND      | 4.54 | --  |           | 5               |
| 1,1,2-Trichloroethane                    | ND      | 1.00 | --  | ND      | 5.46 | --  |           | 5               |
| Toluene                                  | 5.92    | 1.00 | --  | 22.3    | 3.77 | --  |           | 5               |
| 2-Hexanone                               | ND      | 1.00 | --  | ND      | 4.10 | --  |           | 5               |
| Dibromochloromethane                     | ND      | 1.00 | --  | ND      | 8.52 | --  |           | 5               |
| 1,2-Dibromoethane                        | ND      | 1.00 | --  | ND      | 7.69 | --  |           | 5               |
| Tetrachloroethene                        | ND      | 1.00 | --  | ND      | 6.78 | --  |           | 5               |
| Chlorobenzene                            | ND      | 1.00 | --  | ND      | 4.61 | --  |           | 5               |
| Ethylbenzene                             | ND      | 1.00 | --  | ND      | 4.34 | --  |           | 5               |
| p/m-Xylene                               | 3.68    | 2.00 | --  | 16.0    | 8.69 | --  |           | 5               |
| Bromoform                                | ND      | 1.00 | --  | ND      | 10.3 | --  |           | 5               |





**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-01 D

Date Collected: 02/12/18 05:46

Client ID: SSV-1

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |      |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL   | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |      |     |         |      |     |           |                 |
| Styrene                                  | ND      | 1.00 | --  | ND      | 4.26 | --  |           | 5               |
| 1,1,2,2-Tetrachloroethane                | ND      | 1.00 | --  | ND      | 6.87 | --  |           | 5               |
| o-Xylene                                 | 1.10    | 1.00 | --  | 4.78    | 4.34 | --  |           | 5               |
| 4-Ethyltoluene                           | ND      | 1.00 | --  | ND      | 4.92 | --  |           | 5               |
| 1,3,5-Trimethylbenzene                   | ND      | 1.00 | --  | ND      | 4.92 | --  |           | 5               |
| 1,2,4-Trimethylbenzene                   | ND      | 1.00 | --  | ND      | 4.92 | --  |           | 5               |
| Benzyl chloride                          | ND      | 1.00 | --  | ND      | 5.18 | --  |           | 5               |
| 1,3-Dichlorobenzene                      | ND      | 1.00 | --  | ND      | 6.01 | --  |           | 5               |
| 1,4-Dichlorobenzene                      | ND      | 1.00 | --  | ND      | 6.01 | --  |           | 5               |
| 1,2-Dichlorobenzene                      | ND      | 1.00 | --  | ND      | 6.01 | --  |           | 5               |
| 1,2,4-Trichlorobenzene                   | ND      | 1.00 | --  | ND      | 7.42 | --  |           | 5               |
| Hexachlorobutadiene                      | ND      | 1.00 | --  | ND      | 10.7 | --  |           | 5               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-Difluorobenzene | 95         |           | 60-140              |
| Bromochloromethane  | 95         |           | 60-140              |
| chlorobenzene-d5    | 91         |           | 60-140              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-02 D

Client ID: BD

Sample Location: BUFFALO, NY

Sample Depth:

Matrix: Soil\_Vapor

Analytical Method: 48,TO-15

Analytical Date: 02/15/18 21:27

Analyst: MB

Date Collected: 02/12/18 05:47

Date Received: 02/12/18

Field Prep: Not Specified

| Parameter                                | ppbV    |      |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL   | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |      |     |         |      |     |           |                 |
| Dichlorodifluoromethane                  | ND      | 2.00 | --  | ND      | 9.89 | --  |           | 10              |
| Chloromethane                            | ND      | 2.00 | --  | ND      | 4.13 | --  |           | 10              |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane   | ND      | 2.00 | --  | ND      | 14.0 | --  |           | 10              |
| Vinyl chloride                           | ND      | 2.00 | --  | ND      | 5.11 | --  |           | 10              |
| 1,3-Butadiene                            | ND      | 2.00 | --  | ND      | 4.42 | --  |           | 10              |
| Bromomethane                             | ND      | 2.00 | --  | ND      | 7.77 | --  |           | 10              |
| Chloroethane                             | ND      | 2.00 | --  | ND      | 5.28 | --  |           | 10              |
| Ethyl Alcohol                            | 62.9    | 50.0 | --  | 119     | 94.2 | --  |           | 10              |
| Vinyl bromide                            | ND      | 2.00 | --  | ND      | 8.74 | --  |           | 10              |
| Acetone                                  | ND      | 10.0 | --  | ND      | 23.8 | --  |           | 10              |
| Trichlorofluoromethane                   | ND      | 2.00 | --  | ND      | 11.2 | --  |           | 10              |
| iso-Propyl Alcohol                       | ND      | 5.00 | --  | ND      | 12.3 | --  |           | 10              |
| 1,1-Dichloroethene                       | ND      | 2.00 | --  | ND      | 7.93 | --  |           | 10              |
| tert-Butyl Alcohol                       | ND      | 5.00 | --  | ND      | 15.2 | --  |           | 10              |
| Methylene chloride                       | ND      | 5.00 | --  | ND      | 17.4 | --  |           | 10              |
| 3-Chloropropene                          | ND      | 2.00 | --  | ND      | 6.26 | --  |           | 10              |
| Carbon disulfide                         | 52.4    | 2.00 | --  | 163     | 6.23 | --  |           | 10              |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane    | ND      | 2.00 | --  | ND      | 15.3 | --  |           | 10              |
| trans-1,2-Dichloroethene                 | ND      | 2.00 | --  | ND      | 7.93 | --  |           | 10              |
| 1,1-Dichloroethane                       | ND      | 2.00 | --  | ND      | 8.09 | --  |           | 10              |
| Methyl tert butyl ether                  | ND      | 2.00 | --  | ND      | 7.21 | --  |           | 10              |
| 2-Butanone                               | 5.71    | 5.00 | --  | 16.8    | 14.7 | --  |           | 10              |
| cis-1,2-Dichloroethene                   | ND      | 2.00 | --  | ND      | 7.93 | --  |           | 10              |
| Ethyl Acetate                            | ND      | 5.00 | --  | ND      | 18.0 | --  |           | 10              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-02 D

Date Collected: 02/12/18 05:47

Client ID: BD

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |      |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL   | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |      |     |         |      |     |           |                 |
| Chloroform                               | ND      | 2.00 | --  | ND      | 9.77 | --  |           | 10              |
| Tetrahydrofuran                          | ND      | 5.00 | --  | ND      | 14.7 | --  |           | 10              |
| 1,2-Dichloroethane                       | ND      | 2.00 | --  | ND      | 8.09 | --  |           | 10              |
| n-Hexane                                 | 538     | 2.00 | --  | 1900    | 7.05 | --  |           | 10              |
| 1,1,1-Trichloroethane                    | ND      | 2.00 | --  | ND      | 10.9 | --  |           | 10              |
| Benzene                                  | 71.8    | 2.00 | --  | 229     | 6.39 | --  |           | 10              |
| Carbon tetrachloride                     | ND      | 2.00 | --  | ND      | 12.6 | --  |           | 10              |
| Cyclohexane                              | 834     | 2.00 | --  | 2870    | 6.88 | --  |           | 10              |
| 1,2-Dichloropropane                      | ND      | 2.00 | --  | ND      | 9.24 | --  |           | 10              |
| Bromodichloromethane                     | ND      | 2.00 | --  | ND      | 13.4 | --  |           | 10              |
| 1,4-Dioxane                              | ND      | 2.00 | --  | ND      | 7.21 | --  |           | 10              |
| Trichloroethene                          | ND      | 2.00 | --  | ND      | 10.7 | --  |           | 10              |
| 2,2,4-Trimethylpentane                   | ND      | 2.00 | --  | ND      | 9.34 | --  |           | 10              |
| Heptane                                  | 204     | 2.00 | --  | 836     | 8.20 | --  |           | 10              |
| cis-1,3-Dichloropropene                  | ND      | 2.00 | --  | ND      | 9.08 | --  |           | 10              |
| 4-Methyl-2-pentanone                     | ND      | 5.00 | --  | ND      | 20.5 | --  |           | 10              |
| trans-1,3-Dichloropropene                | ND      | 2.00 | --  | ND      | 9.08 | --  |           | 10              |
| 1,1,2-Trichloroethane                    | ND      | 2.00 | --  | ND      | 10.9 | --  |           | 10              |
| Toluene                                  | 6.36    | 2.00 | --  | 24.0    | 7.54 | --  |           | 10              |
| 2-Hexanone                               | ND      | 2.00 | --  | ND      | 8.20 | --  |           | 10              |
| Dibromochloromethane                     | ND      | 2.00 | --  | ND      | 17.0 | --  |           | 10              |
| 1,2-Dibromoethane                        | ND      | 2.00 | --  | ND      | 15.4 | --  |           | 10              |
| Tetrachloroethene                        | ND      | 2.00 | --  | ND      | 13.6 | --  |           | 10              |
| Chlorobenzene                            | ND      | 2.00 | --  | ND      | 9.21 | --  |           | 10              |
| Ethylbenzene                             | ND      | 2.00 | --  | ND      | 8.69 | --  |           | 10              |
| p/m-Xylene                               | 4.17    | 4.00 | --  | 18.1    | 17.4 | --  |           | 10              |
| Bromoform                                | ND      | 2.00 | --  | ND      | 20.7 | --  |           | 10              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-02 D

Date Collected: 02/12/18 05:47

Client ID: BD

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |      |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL   | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |      |     |         |      |     |           |                 |
| Styrene                                  | ND      | 2.00 | --  | ND      | 8.52 | --  |           | 10              |
| 1,1,2,2-Tetrachloroethane                | ND      | 2.00 | --  | ND      | 13.7 | --  |           | 10              |
| o-Xylene                                 | ND      | 2.00 | --  | ND      | 8.69 | --  |           | 10              |
| 4-Ethyltoluene                           | ND      | 2.00 | --  | ND      | 9.83 | --  |           | 10              |
| 1,3,5-Trimethylbenzene                   | ND      | 2.00 | --  | ND      | 9.83 | --  |           | 10              |
| 1,2,4-Trimethylbenzene                   | ND      | 2.00 | --  | ND      | 9.83 | --  |           | 10              |
| Benzyl chloride                          | ND      | 2.00 | --  | ND      | 10.4 | --  |           | 10              |
| 1,3-Dichlorobenzene                      | ND      | 2.00 | --  | ND      | 12.0 | --  |           | 10              |
| 1,4-Dichlorobenzene                      | ND      | 2.00 | --  | ND      | 12.0 | --  |           | 10              |
| 1,2-Dichlorobenzene                      | ND      | 2.00 | --  | ND      | 12.0 | --  |           | 10              |
| 1,2,4-Trichlorobenzene                   | ND      | 2.00 | --  | ND      | 14.8 | --  |           | 10              |
| Hexachlorobutadiene                      | ND      | 2.00 | --  | ND      | 21.3 | --  |           | 10              |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-Difluorobenzene | 97         |           | 60-140              |
| Bromochloromethane  | 94         |           | 60-140              |
| chlorobenzene-d5    | 90         |           | 60-140              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-03

Client ID: AMBIENT-1

Sample Location: BUFFALO, NY

Sample Depth:

Matrix: Air

Analytical Method: 48,TO-15

Analytical Date: 02/15/18 18:39

Analyst: MB

Date Collected: 02/12/18 05:47

Date Received: 02/12/18

Field Prep: Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Dichlorodifluoromethane                  | 0.393   | 0.200 | --  | 1.94    | 0.989 | --  |           | 1               |
| Chloromethane                            | 0.384   | 0.200 | --  | 0.793   | 0.413 | --  |           | 1               |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane   | ND      | 0.200 | --  | ND      | 1.40  | --  |           | 1               |
| 1,3-Butadiene                            | ND      | 0.200 | --  | ND      | 0.442 | --  |           | 1               |
| Bromomethane                             | ND      | 0.200 | --  | ND      | 0.777 | --  |           | 1               |
| Chloroethane                             | ND      | 0.200 | --  | ND      | 0.528 | --  |           | 1               |
| Ethyl Alcohol                            | ND      | 5.00  | --  | ND      | 9.42  | --  |           | 1               |
| Vinyl bromide                            | ND      | 0.200 | --  | ND      | 0.874 | --  |           | 1               |
| Acetone                                  | 10.7    | 1.00  | --  | 25.4    | 2.38  | --  |           | 1               |
| Trichlorofluoromethane                   | ND      | 0.200 | --  | ND      | 1.12  | --  |           | 1               |
| iso-Propyl Alcohol                       | 0.656   | 0.500 | --  | 1.61    | 1.23  | --  |           | 1               |
| tert-Butyl Alcohol                       | 2.12    | 0.500 | --  | 6.43    | 1.52  | --  |           | 1               |
| Methylene chloride                       | ND      | 0.500 | --  | ND      | 1.74  | --  |           | 1               |
| 3-Chloropropene                          | ND      | 0.200 | --  | ND      | 0.626 | --  |           | 1               |
| Carbon disulfide                         | ND      | 0.200 | --  | ND      | 0.623 | --  |           | 1               |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane    | ND      | 0.200 | --  | ND      | 1.53  | --  |           | 1               |
| trans-1,2-Dichloroethene                 | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 1,1-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| Methyl tert butyl ether                  | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| 2-Butanone                               | 5.19    | 0.500 | --  | 15.3    | 1.47  | --  |           | 1               |
| Ethyl Acetate                            | ND      | 0.500 | --  | ND      | 1.80  | --  |           | 1               |
| Chloroform                               | ND      | 0.200 | --  | ND      | 0.977 | --  |           | 1               |
| Tetrahydrofuran                          | 4.65    | 0.500 | --  | 13.7    | 1.47  | --  |           | 1               |
| 1,2-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-03

Date Collected: 02/12/18 05:47

Client ID: AMBIENT-1

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| n-Hexane                                 | 0.338   | 0.200 | --  | 1.19    | 0.705 | --  |           | 1               |
| Benzene                                  | 0.200   | 0.200 | --  | 0.639   | 0.639 | --  |           | 1               |
| Cyclohexane                              | ND      | 0.200 | --  | ND      | 0.688 | --  |           | 1               |
| 1,2-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| Bromodichloromethane                     | ND      | 0.200 | --  | ND      | 1.34  | --  |           | 1               |
| 1,4-Dioxane                              | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| 2,2,4-Trimethylpentane                   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Heptane                                  | 0.214   | 0.200 | --  | 0.877   | 0.820 | --  |           | 1               |
| cis-1,3-Dichloropropene                  | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 4-Methyl-2-pentanone                     | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene                | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 1,1,2-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| Toluene                                  | 1.31    | 0.200 | --  | 4.94    | 0.754 | --  |           | 1               |
| 2-Hexanone                               | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| Dibromochloromethane                     | ND      | 0.200 | --  | ND      | 1.70  | --  |           | 1               |
| 1,2-Dibromoethane                        | ND      | 0.200 | --  | ND      | 1.54  | --  |           | 1               |
| Chlorobenzene                            | ND      | 0.200 | --  | ND      | 0.921 | --  |           | 1               |
| Ethylbenzene                             | 0.998   | 0.200 | --  | 4.33    | 0.869 | --  |           | 1               |
| p/m-Xylene                               | 5.80    | 0.400 | --  | 25.2    | 1.74  | --  |           | 1               |
| Bromoform                                | ND      | 0.200 | --  | ND      | 2.07  | --  |           | 1               |
| Styrene                                  | ND      | 0.200 | --  | ND      | 0.852 | --  |           | 1               |
| 1,1,2,2-Tetrachloroethane                | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |
| o-Xylene                                 | 1.88    | 0.200 | --  | 8.17    | 0.869 | --  |           | 1               |
| 4-Ethyltoluene                           | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,3,5-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,2,4-Trimethylbenzene                   | 0.273   | 0.200 | --  | 1.34    | 0.983 | --  |           | 1               |
| Benzyl chloride                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-03

Date Collected: 02/12/18 05:47

Client ID: AMBIENT-1

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |       |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |      |     |           |                 |
| 1,3-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,4-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,2-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,2,4-Trichlorobenzene                   | ND      | 0.200 | --  | ND      | 1.48 | --  |           | 1               |
| Hexachlorobutadiene                      | ND      | 0.200 | --  | ND      | 2.13 | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-Difluorobenzene | 83         |           | 60-140              |
| Bromochloromethane  | 89         |           | 60-140              |
| chlorobenzene-d5    | 91         |           | 60-140              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-03  
 Client ID: AMBIENT-1  
 Sample Location: BUFFALO, NY  
 Sample Depth:  
 Matrix: Air  
 Analytical Method: 48,TO-15-SIM  
 Analytical Date: 02/15/18 18:39  
 Analyst: MB

Date Collected: 02/12/18 05:47  
 Date Received: 02/12/18  
 Field Prep: Not Specified

| Parameter                                       | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|---|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|   | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Vinyl chloride                                  | ND      | 0.020 | --  | ND      | 0.051 | --  |           | 1               |
| 1,1-Dichloroethene                              | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| cis-1,2-Dichloroethene                          | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| 1,1,1-Trichloroethane                           | ND      | 0.020 | --  | ND      | 0.109 | --  |           | 1               |
| Carbon tetrachloride                            | 0.059   | 0.020 | --  | 0.371   | 0.126 | --  |           | 1               |
| Trichloroethene                                 | ND      | 0.020 | --  | ND      | 0.107 | --  |           | 1               |
| Tetrachloroethene                               | ND      | 0.020 | --  | ND      | 0.136 | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-difluorobenzene | 84         |           | 60-140              |
| bromochloromethane  | 90         |           | 60-140              |
| chlorobenzene-d5    | 92         |           | 60-140              |





**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1804819  
**Report Date:** 02/19/18

### SAMPLE RESULTS

Lab ID: L1804819-04  
 Client ID: SSV-2  
 Sample Location: BUFFALO, NY  
 Sample Depth:  
 Matrix: Soil\_Vapor  
 Analytical Method: 48,TO-15  
 Analytical Date: 02/15/18 22:02  
 Analyst: MB

Date Collected: 02/12/18 05:50  
 Date Received: 02/12/18  
 Field Prep: Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Dichlorodifluoromethane                  | 0.202   | 0.200 | --  | 0.999   | 0.989 | --  |           | 1               |
| Chloromethane                            | ND      | 0.200 | --  | ND      | 0.413 | --  |           | 1               |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane   | ND      | 0.200 | --  | ND      | 1.40  | --  |           | 1               |
| Vinyl chloride                           | ND      | 0.200 | --  | ND      | 0.511 | --  |           | 1               |
| 1,3-Butadiene                            | 0.617   | 0.200 | --  | 1.36    | 0.442 | --  |           | 1               |
| Bromomethane                             | ND      | 0.200 | --  | ND      | 0.777 | --  |           | 1               |
| Chloroethane                             | ND      | 0.200 | --  | ND      | 0.528 | --  |           | 1               |
| Ethyl Alcohol                            | 15.1    | 5.00  | --  | 28.5    | 9.42  | --  |           | 1               |
| Vinyl bromide                            | ND      | 0.200 | --  | ND      | 0.874 | --  |           | 1               |
| Acetone                                  | 31.0    | 1.00  | --  | 73.6    | 2.38  | --  |           | 1               |
| Trichlorofluoromethane                   | ND      | 0.200 | --  | ND      | 1.12  | --  |           | 1               |
| iso-Propyl Alcohol                       | 1.53    | 0.500 | --  | 3.76    | 1.23  | --  |           | 1               |
| 1,1-Dichloroethene                       | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| tert-Butyl Alcohol                       | 0.561   | 0.500 | --  | 1.70    | 1.52  | --  |           | 1               |
| Methylene chloride                       | ND      | 0.500 | --  | ND      | 1.74  | --  |           | 1               |
| 3-Chloropropene                          | ND      | 0.200 | --  | ND      | 0.626 | --  |           | 1               |
| Carbon disulfide                         | 3.44    | 0.200 | --  | 10.7    | 0.623 | --  |           | 1               |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane    | ND      | 0.200 | --  | ND      | 1.53  | --  |           | 1               |
| trans-1,2-Dichloroethene                 | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 1,1-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| Methyl tert butyl ether                  | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| 2-Butanone                               | 2.78    | 0.500 | --  | 8.20    | 1.47  | --  |           | 1               |
| cis-1,2-Dichloroethene                   | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| Ethyl Acetate                            | ND      | 0.500 | --  | ND      | 1.80  | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-04

Date Collected: 02/12/18 05:50

Client ID: SSV-2

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Chloroform                               | 0.389   | 0.200 | --  | 1.90    | 0.977 | --  |           | 1               |
| Tetrahydrofuran                          | 0.596   | 0.500 | --  | 1.76    | 1.47  | --  |           | 1               |
| 1,2-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| n-Hexane                                 | 14.6    | 0.200 | --  | 51.5    | 0.705 | --  |           | 1               |
| 1,1,1-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| Benzene                                  | 6.12    | 0.200 | --  | 19.6    | 0.639 | --  |           | 1               |
| Carbon tetrachloride                     | ND      | 0.200 | --  | ND      | 1.26  | --  |           | 1               |
| Cyclohexane                              | 8.56    | 0.200 | --  | 29.5    | 0.688 | --  |           | 1               |
| 1,2-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| Bromodichloromethane                     | ND      | 0.200 | --  | ND      | 1.34  | --  |           | 1               |
| 1,4-Dioxane                              | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| Trichloroethene                          | ND      | 0.200 | --  | ND      | 1.07  | --  |           | 1               |
| 2,2,4-Trimethylpentane                   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Heptane                                  | 7.34    | 0.200 | --  | 30.1    | 0.820 | --  |           | 1               |
| cis-1,3-Dichloropropene                  | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 4-Methyl-2-pentanone                     | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene                | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 1,1,2-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| Toluene                                  | 11.7    | 0.200 | --  | 44.1    | 0.754 | --  |           | 1               |
| 2-Hexanone                               | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| Dibromochloromethane                     | ND      | 0.200 | --  | ND      | 1.70  | --  |           | 1               |
| 1,2-Dibromoethane                        | ND      | 0.200 | --  | ND      | 1.54  | --  |           | 1               |
| Tetrachloroethene                        | ND      | 0.200 | --  | ND      | 1.36  | --  |           | 1               |
| Chlorobenzene                            | ND      | 0.200 | --  | ND      | 0.921 | --  |           | 1               |
| Ethylbenzene                             | 1.18    | 0.200 | --  | 5.13    | 0.869 | --  |           | 1               |
| p/m-Xylene                               | 4.68    | 0.400 | --  | 20.3    | 1.74  | --  |           | 1               |
| Bromoform                                | ND      | 0.200 | --  | ND      | 2.07  | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-04

Date Collected: 02/12/18 05:50

Client ID: SSV-2

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Styrene                                  | ND      | 0.200 | --  | ND      | 0.852 | --  |           | 1               |
| 1,1,2,2-Tetrachloroethane                | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |
| o-Xylene                                 | 1.68    | 0.200 | --  | 7.30    | 0.869 | --  |           | 1               |
| 4-Ethyltoluene                           | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,3,5-Trimethylbenzene                   | 0.281   | 0.200 | --  | 1.38    | 0.983 | --  |           | 1               |
| 1,2,4-Trimethylbenzene                   | 0.654   | 0.200 | --  | 3.22    | 0.983 | --  |           | 1               |
| Benzyl chloride                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| 1,3-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| 1,4-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| 1,2-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| 1,2,4-Trichlorobenzene                   | ND      | 0.200 | --  | ND      | 1.48  | --  |           | 1               |
| Hexachlorobutadiene                      | ND      | 0.200 | --  | ND      | 2.13  | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-Difluorobenzene | 89         |           | 60-140              |
| Bromochloromethane  | 91         |           | 60-140              |
| chlorobenzene-d5    | 104        |           | 60-140              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-05

Client ID: AMBIENT-2

Sample Location: BUFFALO, NY

Sample Depth:

Matrix: Air

Analytical Method: 48,TO-15

Analytical Date: 02/15/18 19:48

Analyst: MB

Date Collected: 02/12/18 05:49

Date Received: 02/12/18

Field Prep: Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Dichlorodifluoromethane                  | 0.447   | 0.200 | --  | 2.21    | 0.989 | --  |           | 1               |
| Chloromethane                            | 0.352   | 0.200 | --  | 0.727   | 0.413 | --  |           | 1               |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane   | ND      | 0.200 | --  | ND      | 1.40  | --  |           | 1               |
| 1,3-Butadiene                            | ND      | 0.200 | --  | ND      | 0.442 | --  |           | 1               |
| Bromomethane                             | ND      | 0.200 | --  | ND      | 0.777 | --  |           | 1               |
| Chloroethane                             | ND      | 0.200 | --  | ND      | 0.528 | --  |           | 1               |
| Ethyl Alcohol                            | ND      | 5.00  | --  | ND      | 9.42  | --  |           | 1               |
| Vinyl bromide                            | ND      | 0.200 | --  | ND      | 0.874 | --  |           | 1               |
| Acetone                                  | 8.34    | 1.00  | --  | 19.8    | 2.38  | --  |           | 1               |
| Trichlorofluoromethane                   | ND      | 0.200 | --  | ND      | 1.12  | --  |           | 1               |
| iso-Propyl Alcohol                       | 0.545   | 0.500 | --  | 1.34    | 1.23  | --  |           | 1               |
| tert-Butyl Alcohol                       | 1.82    | 0.500 | --  | 5.52    | 1.52  | --  |           | 1               |
| Methylene chloride                       | ND      | 0.500 | --  | ND      | 1.74  | --  |           | 1               |
| 3-Chloropropene                          | ND      | 0.200 | --  | ND      | 0.626 | --  |           | 1               |
| Carbon disulfide                         | ND      | 0.200 | --  | ND      | 0.623 | --  |           | 1               |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane    | ND      | 0.200 | --  | ND      | 1.53  | --  |           | 1               |
| trans-1,2-Dichloroethene                 | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 1,1-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| Methyl tert butyl ether                  | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| 2-Butanone                               | 4.26    | 0.500 | --  | 12.6    | 1.47  | --  |           | 1               |
| Ethyl Acetate                            | ND      | 0.500 | --  | ND      | 1.80  | --  |           | 1               |
| Chloroform                               | ND      | 0.200 | --  | ND      | 0.977 | --  |           | 1               |
| Tetrahydrofuran                          | 4.26    | 0.500 | --  | 12.6    | 1.47  | --  |           | 1               |
| 1,2-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-05

Date Collected: 02/12/18 05:49

Client ID: AMBIENT-2

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| n-Hexane                                 | 0.310   | 0.200 | --  | 1.09    | 0.705 | --  |           | 1               |
| Benzene                                  | ND      | 0.200 | --  | ND      | 0.639 | --  |           | 1               |
| Cyclohexane                              | ND      | 0.200 | --  | ND      | 0.688 | --  |           | 1               |
| 1,2-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| Bromodichloromethane                     | ND      | 0.200 | --  | ND      | 1.34  | --  |           | 1               |
| 1,4-Dioxane                              | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| 2,2,4-Trimethylpentane                   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Heptane                                  | 0.209   | 0.200 | --  | 0.857   | 0.820 | --  |           | 1               |
| cis-1,3-Dichloropropene                  | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 4-Methyl-2-pentanone                     | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene                | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 1,1,2-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| Toluene                                  | 1.19    | 0.200 | --  | 4.48    | 0.754 | --  |           | 1               |
| 2-Hexanone                               | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| Dibromochloromethane                     | ND      | 0.200 | --  | ND      | 1.70  | --  |           | 1               |
| 1,2-Dibromoethane                        | ND      | 0.200 | --  | ND      | 1.54  | --  |           | 1               |
| Chlorobenzene                            | ND      | 0.200 | --  | ND      | 0.921 | --  |           | 1               |
| Ethylbenzene                             | 1.05    | 0.200 | --  | 4.56    | 0.869 | --  |           | 1               |
| p/m-Xylene                               | 5.78    | 0.400 | --  | 25.1    | 1.74  | --  |           | 1               |
| Bromoform                                | ND      | 0.200 | --  | ND      | 2.07  | --  |           | 1               |
| Styrene                                  | ND      | 0.200 | --  | ND      | 0.852 | --  |           | 1               |
| 1,1,2,2-Tetrachloroethane                | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |
| o-Xylene                                 | 1.93    | 0.200 | --  | 8.38    | 0.869 | --  |           | 1               |
| 4-Ethyltoluene                           | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,3,5-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,2,4-Trimethylbenzene                   | 0.238   | 0.200 | --  | 1.17    | 0.983 | --  |           | 1               |
| Benzyl chloride                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-05

Date Collected: 02/12/18 05:49

Client ID: AMBIENT-2

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |       |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |      |     |           |                 |
| 1,3-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,4-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,2-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,2,4-Trichlorobenzene                   | ND      | 0.200 | --  | ND      | 1.48 | --  |           | 1               |
| Hexachlorobutadiene                      | ND      | 0.200 | --  | ND      | 2.13 | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-Difluorobenzene | 85         |           | 60-140              |
| Bromochloromethane  | 96         |           | 60-140              |
| chlorobenzene-d5    | 94         |           | 60-140              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-05  
 Client ID: AMBIENT-2  
 Sample Location: BUFFALO, NY  
 Sample Depth:  
 Matrix: Air  
 Analytical Method: 48,TO-15-SIM  
 Analytical Date: 02/15/18 19:48  
 Analyst: MB

Date Collected: 02/12/18 05:49  
 Date Received: 02/12/18  
 Field Prep: Not Specified

| Parameter                                       | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|---|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|   | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Vinyl chloride                                  | ND      | 0.020 | --  | ND      | 0.051 | --  |           | 1               |
| 1,1-Dichloroethene                              | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| cis-1,2-Dichloroethene                          | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| 1,1,1-Trichloroethane                           | ND      | 0.020 | --  | ND      | 0.109 | --  |           | 1               |
| Carbon tetrachloride                            | 0.058   | 0.020 | --  | 0.365   | 0.126 | --  |           | 1               |
| Trichloroethene                                 | ND      | 0.020 | --  | ND      | 0.107 | --  |           | 1               |
| Tetrachloroethene                               | ND      | 0.020 | --  | ND      | 0.136 | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-difluorobenzene | 85         |           | 60-140              |
| bromochloromethane  | 95         |           | 60-140              |
| chlorobenzene-d5    | 94         |           | 60-140              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-06

Client ID: AMBIENT-3

Sample Location: BUFFALO, NY

Sample Depth:

Matrix: Air

Analytical Method: 48,TO-15

Analytical Date: 02/15/18 20:23

Analyst: MB

Date Collected: 02/12/18 05:43

Date Received: 02/12/18

Field Prep: Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Dichlorodifluoromethane                  | 0.320   | 0.200 | --  | 1.58    | 0.989 | --  |           | 1               |
| Chloromethane                            | 0.326   | 0.200 | --  | 0.673   | 0.413 | --  |           | 1               |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane   | ND      | 0.200 | --  | ND      | 1.40  | --  |           | 1               |
| 1,3-Butadiene                            | ND      | 0.200 | --  | ND      | 0.442 | --  |           | 1               |
| Bromomethane                             | ND      | 0.200 | --  | ND      | 0.777 | --  |           | 1               |
| Chloroethane                             | ND      | 0.200 | --  | ND      | 0.528 | --  |           | 1               |
| Ethyl Alcohol                            | ND      | 5.00  | --  | ND      | 9.42  | --  |           | 1               |
| Vinyl bromide                            | ND      | 0.200 | --  | ND      | 0.874 | --  |           | 1               |
| Acetone                                  | 7.54    | 1.00  | --  | 17.9    | 2.38  | --  |           | 1               |
| Trichlorofluoromethane                   | ND      | 0.200 | --  | ND      | 1.12  | --  |           | 1               |
| iso-Propyl Alcohol                       | ND      | 0.500 | --  | ND      | 1.23  | --  |           | 1               |
| tert-Butyl Alcohol                       | 0.952   | 0.500 | --  | 2.89    | 1.52  | --  |           | 1               |
| Methylene chloride                       | ND      | 0.500 | --  | ND      | 1.74  | --  |           | 1               |
| 3-Chloropropene                          | ND      | 0.200 | --  | ND      | 0.626 | --  |           | 1               |
| Carbon disulfide                         | ND      | 0.200 | --  | ND      | 0.623 | --  |           | 1               |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane    | ND      | 0.200 | --  | ND      | 1.53  | --  |           | 1               |
| trans-1,2-Dichloroethene                 | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 1,1-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| Methyl tert butyl ether                  | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| 2-Butanone                               | 2.63    | 0.500 | --  | 7.76    | 1.47  | --  |           | 1               |
| Ethyl Acetate                            | ND      | 0.500 | --  | ND      | 1.80  | --  |           | 1               |
| Chloroform                               | ND      | 0.200 | --  | ND      | 0.977 | --  |           | 1               |
| Tetrahydrofuran                          | 2.75    | 0.500 | --  | 8.11    | 1.47  | --  |           | 1               |
| 1,2-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |





**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-06

Date Collected: 02/12/18 05:43

Client ID: AMBIENT-3

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| n-Hexane                                 | 0.288   | 0.200 | --  | 1.02    | 0.705 | --  |           | 1               |
| Benzene                                  | 0.201   | 0.200 | --  | 0.642   | 0.639 | --  |           | 1               |
| Cyclohexane                              | ND      | 0.200 | --  | ND      | 0.688 | --  |           | 1               |
| 1,2-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| Bromodichloromethane                     | ND      | 0.200 | --  | ND      | 1.34  | --  |           | 1               |
| 1,4-Dioxane                              | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| 2,2,4-Trimethylpentane                   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Heptane                                  | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| cis-1,3-Dichloropropene                  | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 4-Methyl-2-pentanone                     | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene                | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 1,1,2-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| Toluene                                  | 0.977   | 0.200 | --  | 3.68    | 0.754 | --  |           | 1               |
| 2-Hexanone                               | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| Dibromochloromethane                     | ND      | 0.200 | --  | ND      | 1.70  | --  |           | 1               |
| 1,2-Dibromoethane                        | ND      | 0.200 | --  | ND      | 1.54  | --  |           | 1               |
| Chlorobenzene                            | ND      | 0.200 | --  | ND      | 0.921 | --  |           | 1               |
| Ethylbenzene                             | 0.359   | 0.200 | --  | 1.56    | 0.869 | --  |           | 1               |
| p/m-Xylene                               | 1.97    | 0.400 | --  | 8.56    | 1.74  | --  |           | 1               |
| Bromoform                                | ND      | 0.200 | --  | ND      | 2.07  | --  |           | 1               |
| Styrene                                  | ND      | 0.200 | --  | ND      | 0.852 | --  |           | 1               |
| 1,1,2,2-Tetrachloroethane                | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |
| o-Xylene                                 | 0.662   | 0.200 | --  | 2.88    | 0.869 | --  |           | 1               |
| 4-Ethyltoluene                           | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,3,5-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,2,4-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| Benzyl chloride                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-06

Date Collected: 02/12/18 05:43

Client ID: AMBIENT-3

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |       |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |      |     |           |                 |
| 1,3-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,4-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,2-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,2,4-Trichlorobenzene                   | ND      | 0.200 | --  | ND      | 1.48 | --  |           | 1               |
| Hexachlorobutadiene                      | ND      | 0.200 | --  | ND      | 2.13 | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-Difluorobenzene | 85         |           | 60-140              |
| Bromochloromethane  | 93         |           | 60-140              |
| chlorobenzene-d5    | 89         |           | 60-140              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-06  
 Client ID: AMBIENT-3  
 Sample Location: BUFFALO, NY  
 Sample Depth:  
 Matrix: Air  
 Analytical Method: 48,TO-15-SIM  
 Analytical Date: 02/15/18 20:23  
 Analyst: MB

Date Collected: 02/12/18 05:43  
 Date Received: 02/12/18  
 Field Prep: Not Specified

| Parameter                                       | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|---|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|   | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Vinyl chloride                                  | ND      | 0.020 | --  | ND      | 0.051 | --  |           | 1               |
| 1,1-Dichloroethene                              | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| cis-1,2-Dichloroethene                          | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| 1,1,1-Trichloroethane                           | ND      | 0.020 | --  | ND      | 0.109 | --  |           | 1               |
| Carbon tetrachloride                            | 0.057   | 0.020 | --  | 0.359   | 0.126 | --  |           | 1               |
| Trichloroethene                                 | ND      | 0.020 | --  | ND      | 0.107 | --  |           | 1               |
| Tetrachloroethene                               | ND      | 0.020 | --  | ND      | 0.136 | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-difluorobenzene | 85         |           | 60-140              |
| bromochloromethane  | 90         |           | 60-140              |
| chlorobenzene-d5    | 90         |           | 60-140              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

**Lab ID:** L1804819-07  
**Client ID:** OUTDOOR-1  
**Sample Location:** BUFFALO, NY  
**Sample Depth:**  
**Matrix:** Air  
**Anaytical Method:** 48,TO-15  
**Analytical Date:** 02/15/18 18:05  
**Analyst:** MB

**Date Collected:** 02/12/18 05:50  
**Date Received:** 02/12/18  
**Field Prep:** Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Dichlorodifluoromethane                  | 0.311   | 0.200 | --  | 1.54    | 0.989 | --  |           | 1               |
| Chloromethane                            | 0.316   | 0.200 | --  | 0.653   | 0.413 | --  |           | 1               |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane   | ND      | 0.200 | --  | ND      | 1.40  | --  |           | 1               |
| 1,3-Butadiene                            | ND      | 0.200 | --  | ND      | 0.442 | --  |           | 1               |
| Bromomethane                             | ND      | 0.200 | --  | ND      | 0.777 | --  |           | 1               |
| Chloroethane                             | ND      | 0.200 | --  | ND      | 0.528 | --  |           | 1               |
| Ethyl Alcohol                            | ND      | 5.00  | --  | ND      | 9.42  | --  |           | 1               |
| Vinyl bromide                            | ND      | 0.200 | --  | ND      | 0.874 | --  |           | 1               |
| Acetone                                  | 1.02    | 1.00  | --  | 2.42    | 2.38  | --  |           | 1               |
| Trichlorofluoromethane                   | ND      | 0.200 | --  | ND      | 1.12  | --  |           | 1               |
| iso-Propyl Alcohol                       | ND      | 0.500 | --  | ND      | 1.23  | --  |           | 1               |
| tert-Butyl Alcohol                       | ND      | 0.500 | --  | ND      | 1.52  | --  |           | 1               |
| Methylene chloride                       | ND      | 0.500 | --  | ND      | 1.74  | --  |           | 1               |
| 3-Chloropropene                          | ND      | 0.200 | --  | ND      | 0.626 | --  |           | 1               |
| Carbon disulfide                         | ND      | 0.200 | --  | ND      | 0.623 | --  |           | 1               |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane    | ND      | 0.200 | --  | ND      | 1.53  | --  |           | 1               |
| trans-1,2-Dichloroethene                 | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 1,1-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| Methyl tert butyl ether                  | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| 2-Butanone                               | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| Ethyl Acetate                            | ND      | 0.500 | --  | ND      | 1.80  | --  |           | 1               |
| Chloroform                               | ND      | 0.200 | --  | ND      | 0.977 | --  |           | 1               |
| Tetrahydrofuran                          | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| 1,2-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-07

Date Collected: 02/12/18 05:50

Client ID: OUTDOOR-1

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| n-Hexane                                 | ND      | 0.200 | --  | ND      | 0.705 | --  |           | 1               |
| Benzene                                  | ND      | 0.200 | --  | ND      | 0.639 | --  |           | 1               |
| Cyclohexane                              | ND      | 0.200 | --  | ND      | 0.688 | --  |           | 1               |
| 1,2-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| Bromodichloromethane                     | ND      | 0.200 | --  | ND      | 1.34  | --  |           | 1               |
| 1,4-Dioxane                              | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| 2,2,4-Trimethylpentane                   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Heptane                                  | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| cis-1,3-Dichloropropene                  | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 4-Methyl-2-pentanone                     | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene                | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 1,1,2-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| Toluene                                  | ND      | 0.200 | --  | ND      | 0.754 | --  |           | 1               |
| 2-Hexanone                               | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| Dibromochloromethane                     | ND      | 0.200 | --  | ND      | 1.70  | --  |           | 1               |
| 1,2-Dibromoethane                        | ND      | 0.200 | --  | ND      | 1.54  | --  |           | 1               |
| Chlorobenzene                            | ND      | 0.200 | --  | ND      | 0.921 | --  |           | 1               |
| Ethylbenzene                             | ND      | 0.200 | --  | ND      | 0.869 | --  |           | 1               |
| p/m-Xylene                               | ND      | 0.400 | --  | ND      | 1.74  | --  |           | 1               |
| Bromoform                                | ND      | 0.200 | --  | ND      | 2.07  | --  |           | 1               |
| Styrene                                  | ND      | 0.200 | --  | ND      | 0.852 | --  |           | 1               |
| 1,1,2,2-Tetrachloroethane                | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |
| o-Xylene                                 | ND      | 0.200 | --  | ND      | 0.869 | --  |           | 1               |
| 4-Ethyltoluene                           | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,3,5-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,2,4-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| Benzyl chloride                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

Lab ID: L1804819-07

Date Collected: 02/12/18 05:50

Client ID: OUTDOOR-1

Date Received: 02/12/18

Sample Location: BUFFALO, NY

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |       |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |      |     |           |                 |
| 1,3-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,4-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,2-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20 | --  |           | 1               |
| 1,2,4-Trichlorobenzene                   | ND      | 0.200 | --  | ND      | 1.48 | --  |           | 1               |
| Hexachlorobutadiene                      | ND      | 0.200 | --  | ND      | 2.13 | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-Difluorobenzene | 88         |           | 60-140              |
| Bromochloromethane  | 102        |           | 60-140              |
| chlorobenzene-d5    | 99         |           | 60-140              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**SAMPLE RESULTS**

**Lab ID:** L1804819-07  
**Client ID:** OUTDOOR-1  
**Sample Location:** BUFFALO, NY  
**Sample Depth:**  
**Matrix:** Air  
**Analytical Method:** 48,TO-15-SIM  
**Analytical Date:** 02/15/18 18:05  
**Analyst:** MB

**Date Collected:** 02/12/18 05:50  
**Date Received:** 02/12/18  
**Field Prep:** Not Specified

| Parameter                                       | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|---|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|   | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Vinyl chloride                                  | ND      | 0.020 | --  | ND      | 0.051 | --  |           | 1               |
| 1,1-Dichloroethene                              | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| cis-1,2-Dichloroethene                          | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| 1,1,1-Trichloroethane                           | ND      | 0.020 | --  | ND      | 0.109 | --  |           | 1               |
| Carbon tetrachloride                            | 0.050   | 0.020 | --  | 0.315   | 0.126 | --  |           | 1               |
| Trichloroethene                                 | ND      | 0.020 | --  | ND      | 0.107 | --  |           | 1               |
| Tetrachloroethene                               | ND      | 0.020 | --  | ND      | 0.136 | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-difluorobenzene | 89         |           | 60-140              |
| bromochloromethane  | 101        |           | 60-140              |
| chlorobenzene-d5    | 102        |           | 60-140              |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 48,TO-15-SIM

Analytical Date: 02/15/18 16:34

| Parameter  | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab for sample(s): 03,05-07 Batch: WG1089689-4 |         |       |     |         |       |     |           |                 |
| Propylene  | ND      | 0.500 | --  | ND      | 0.861 | --  |           | 1               |
| Dichlorodifluoromethane  | ND      | 0.200 | --  | ND      | 0.989 | --  |           | 1               |
| Chloromethane  | ND      | 0.200 | --  | ND      | 0.413 | --  |           | 1               |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane   | ND      | 0.050 | --  | ND      | 0.349 | --  |           | 1               |
| Vinyl chloride   | ND      | 0.020 | --  | ND      | 0.051 | --  |           | 1               |
| 1,3-Butadiene  | ND      | 0.020 | --  | ND      | 0.044 | --  |           | 1               |
| Bromomethane   | ND      | 0.020 | --  | ND      | 0.078 | --  |           | 1               |
| Chloroethane   | ND      | 0.100 | --  | ND      | 0.264 | --  |           | 1               |
| Ethyl Alcohol  | ND      | 5.00  | --  | ND      | 9.42  | --  |           | 1               |
| Vinyl bromide  | ND      | 0.200 | --  | ND      | 0.874 | --  |           | 1               |
| Acetone  | ND      | 1.00  | --  | ND      | 2.38  | --  |           | 1               |
| Trichlorofluoromethane   | ND      | 0.050 | --  | ND      | 0.281 | --  |           | 1               |
| iso-Propyl Alcohol   | ND      | 0.500 | --  | ND      | 1.23  | --  |           | 1               |
| Acrylonitrile  | ND      | 0.500 | --  | ND      | 1.09  | --  |           | 1               |
| 1,1-Dichloroethene   | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| tert-Butyl Alcohol   | ND      | 0.500 | --  | ND      | 1.52  | --  |           | 1               |
| Methylene chloride   | ND      | 0.500 | --  | ND      | 1.74  | --  |           | 1               |
| 3-Chloropropene  | ND      | 0.200 | --  | ND      | 0.626 | --  |           | 1               |
| Carbon disulfide   | ND      | 0.200 | --  | ND      | 0.623 | --  |           | 1               |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane  | ND      | 0.050 | --  | ND      | 0.383 | --  |           | 1               |
| trans-1,2-Dichloroethene   | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| 1,1-Dichloroethane   | ND      | 0.020 | --  | ND      | 0.081 | --  |           | 1               |
| Methyl tert butyl ether  | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| Vinyl acetate  | ND      | 1.00  | --  | ND      | 3.52  | --  |           | 1               |
| 2-Butanone   | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |





**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 48,TO-15-SIM

Analytical Date: 02/15/18 16:34

| Parameter  | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab for sample(s): 03,05-07 Batch: WG1089689-4 |         |       |     |         |       |     |           |                 |
| cis-1,2-Dichloroethene   | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| Ethyl Acetate  | ND      | 0.500 | --  | ND      | 1.80  | --  |           | 1               |
| Chloroform   | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| Tetrahydrofuran  | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| 1,2-Dichloroethane   | ND      | 0.020 | --  | ND      | 0.081 | --  |           | 1               |
| n-Hexane   | ND      | 0.200 | --  | ND      | 0.705 | --  |           | 1               |
| 1,1,1-Trichloroethane  | ND      | 0.020 | --  | ND      | 0.109 | --  |           | 1               |
| Benzene  | ND      | 0.100 | --  | ND      | 0.319 | --  |           | 1               |
| Carbon tetrachloride   | ND      | 0.020 | --  | ND      | 0.126 | --  |           | 1               |
| Cyclohexane  | ND      | 0.200 | --  | ND      | 0.688 | --  |           | 1               |
| Dibromomethane   | ND      | 0.200 | --  | ND      | 1.42  | --  |           | 1               |
| 1,2-Dichloropropane  | ND      | 0.020 | --  | ND      | 0.092 | --  |           | 1               |
| Bromodichloromethane   | ND      | 0.020 | --  | ND      | 0.134 | --  |           | 1               |
| 1,4-Dioxane  | ND      | 0.100 | --  | ND      | 0.360 | --  |           | 1               |
| Trichloroethene  | ND      | 0.020 | --  | ND      | 0.107 | --  |           | 1               |
| 2,2,4-Trimethylpentane   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Heptane  | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| cis-1,3-Dichloropropene  | ND      | 0.020 | --  | ND      | 0.091 | --  |           | 1               |
| 4-Methyl-2-pentanone   | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene  | ND      | 0.020 | --  | ND      | 0.091 | --  |           | 1               |
| 1,1,2-Trichloroethane  | ND      | 0.020 | --  | ND      | 0.109 | --  |           | 1               |
| Toluene  | ND      | 0.050 | --  | ND      | 0.188 | --  |           | 1               |
| 2-Hexanone   | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| Dibromochloromethane   | ND      | 0.020 | --  | ND      | 0.170 | --  |           | 1               |
| 1,2-Dibromoethane  | ND      | 0.020 | --  | ND      | 0.154 | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 48,TO-15-SIM

Analytical Date: 02/15/18 16:34

| Parameter  | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab for sample(s): 03,05-07 Batch: WG1089689-4 |         |       |     |         |       |     |           |                 |
| Tetrachloroethene  | ND      | 0.020 | --  | ND      | 0.136 | --  |           | 1               |
| 1,1,1,2-Tetrachloroethane  | ND      | 0.020 | --  | ND      | 0.137 | --  |           | 1               |
| Chlorobenzene  | ND      | 0.100 | --  | ND      | 0.461 | --  |           | 1               |
| Ethylbenzene   | ND      | 0.020 | --  | ND      | 0.087 | --  |           | 1               |
| p/m-Xylene   | ND      | 0.040 | --  | ND      | 0.174 | --  |           | 1               |
| Bromoform  | ND      | 0.020 | --  | ND      | 0.207 | --  |           | 1               |
| Styrene  | ND      | 0.020 | --  | ND      | 0.085 | --  |           | 1               |
| 1,1,2,2-Tetrachloroethane  | ND      | 0.020 | --  | ND      | 0.137 | --  |           | 1               |
| o-Xylene   | ND      | 0.020 | --  | ND      | 0.087 | --  |           | 1               |
| 1,2,3-Trichloropropane   | ND      | 0.020 | --  | ND      | 0.121 | --  |           | 1               |
| Isopropylbenzene   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| Bromobenzene   | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 4-Ethyltoluene   | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| 1,3,5-Trimethylbenzene   | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| 1,2,4-Trimethylbenzene   | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| Benzyl chloride  | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| 1,3-Dichlorobenzene  | ND      | 0.020 | --  | ND      | 0.120 | --  |           | 1               |
| 1,4-Dichlorobenzene  | ND      | 0.020 | --  | ND      | 0.120 | --  |           | 1               |
| sec-Butylbenzene   | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| p-Isopropyltoluene   | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2-Dichlorobenzene  | ND      | 0.020 | --  | ND      | 0.120 | --  |           | 1               |
| n-Butylbenzene   | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2,4-Trichlorobenzene   | ND      | 0.050 | --  | ND      | 0.371 | --  |           | 1               |
| Naphthalene  | ND      | 0.050 | --  | ND      | 0.262 | --  |           | 1               |
| 1,2,3-Trichlorobenzene   | ND      | 0.050 | --  | ND      | 0.371 | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18

### Method Blank Analysis

#### Batch Quality Control

Analytical Method: 48,TO-15-SIM

Analytical Date: 02/15/18 16:34

| Parameter  | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab for sample(s): 03,05-07 Batch: WG1089689-4 |         |       |     |         |       |     |           |                 |
| Hexachlorobutadiene  | ND      | 0.050 | --  | ND      | 0.533 | --  |           | 1               |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 48,TO-15

Analytical Date: 02/15/18 16:00

| Parameter  | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab for sample(s): 01-07 Batch: WG1089690-4 |         |       |     |         |       |     |           |                 |
| Chlorodifluoromethane  | ND      | 0.200 | --  | ND      | 0.707 | --  |           | 1               |
| Propylene  | ND      | 0.500 | --  | ND      | 0.861 | --  |           | 1               |
| Propane  | ND      | 0.500 | --  | ND      | 0.902 | --  |           | 1               |
| Dichlorodifluoromethane  | ND      | 0.200 | --  | ND      | 0.989 | --  |           | 1               |
| Chloromethane  | ND      | 0.200 | --  | ND      | 0.413 | --  |           | 1               |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane   | ND      | 0.200 | --  | ND      | 1.40  | --  |           | 1               |
| Methanol   | ND      | 5.00  | --  | ND      | 6.55  | --  |           | 1               |
| Vinyl chloride   | ND      | 0.200 | --  | ND      | 0.511 | --  |           | 1               |
| 1,3-Butadiene  | ND      | 0.200 | --  | ND      | 0.442 | --  |           | 1               |
| Butane   | ND      | 0.200 | --  | ND      | 0.475 | --  |           | 1               |
| Bromomethane   | ND      | 0.200 | --  | ND      | 0.777 | --  |           | 1               |
| Chloroethane   | ND      | 0.200 | --  | ND      | 0.528 | --  |           | 1               |
| Ethyl Alcohol  | ND      | 5.00  | --  | ND      | 9.42  | --  |           | 1               |
| Dichlorofluoromethane  | ND      | 0.200 | --  | ND      | 0.842 | --  |           | 1               |
| Vinyl bromide  | ND      | 0.200 | --  | ND      | 0.874 | --  |           | 1               |
| Acrolein   | ND      | 0.500 | --  | ND      | 1.15  | --  |           | 1               |
| Acetone  | ND      | 1.00  | --  | ND      | 2.38  | --  |           | 1               |
| Acetonitrile   | ND      | 0.200 | --  | ND      | 0.336 | --  |           | 1               |
| Trichlorofluoromethane   | ND      | 0.200 | --  | ND      | 1.12  | --  |           | 1               |
| iso-Propyl Alcohol   | ND      | 0.500 | --  | ND      | 1.23  | --  |           | 1               |
| Acrylonitrile  | ND      | 0.500 | --  | ND      | 1.09  | --  |           | 1               |
| Pentane  | ND      | 0.200 | --  | ND      | 0.590 | --  |           | 1               |
| 1,1-Dichloroethene   | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| tert-Butyl Alcohol   | ND      | 0.500 | --  | ND      | 1.52  | --  |           | 1               |
| Methylene chloride   | ND      | 0.500 | --  | ND      | 1.74  | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 48,TO-15

Analytical Date: 02/15/18 16:00

| Parameter  | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab for sample(s): 01-07 Batch: WG1089690-4 |         |       |     |         |       |     |           |                 |
| 3-Chloropropene  | ND      | 0.200 | --  | ND      | 0.626 | --  |           | 1               |
| Carbon disulfide   | ND      | 0.200 | --  | ND      | 0.623 | --  |           | 1               |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane  | ND      | 0.200 | --  | ND      | 1.53  | --  |           | 1               |
| trans-1,2-Dichloroethene   | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 1,1-Dichloroethane   | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| Methyl tert butyl ether  | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| Vinyl acetate  | ND      | 1.00  | --  | ND      | 3.52  | --  |           | 1               |
| 2-Butanone   | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| cis-1,2-Dichloroethene   | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| Ethyl Acetate  | ND      | 0.500 | --  | ND      | 1.80  | --  |           | 1               |
| Chloroform   | ND      | 0.200 | --  | ND      | 0.977 | --  |           | 1               |
| Tetrahydrofuran  | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| 2,2-Dichloropropane  | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| 1,2-Dichloroethane   | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| n-Hexane   | ND      | 0.200 | --  | ND      | 0.705 | --  |           | 1               |
| Isopropyl Ether  | ND      | 0.200 | --  | ND      | 0.836 | --  |           | 1               |
| Ethyl-Tert-Butyl-Ether   | ND      | 0.200 | --  | ND      | 0.836 | --  |           | 1               |
| 1,1,1-Trichloroethane  | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| 1,1-Dichloropropene  | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| Benzene  | ND      | 0.200 | --  | ND      | 0.639 | --  |           | 1               |
| Carbon tetrachloride   | ND      | 0.200 | --  | ND      | 1.26  | --  |           | 1               |
| Cyclohexane  | ND      | 0.200 | --  | ND      | 0.688 | --  |           | 1               |
| Tertiary-Amyl Methyl Ether   | ND      | 0.200 | --  | ND      | 0.836 | --  |           | 1               |
| Dibromomethane   | ND      | 0.200 | --  | ND      | 1.42  | --  |           | 1               |
| 1,2-Dichloropropane  | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 48,TO-15

Analytical Date: 02/15/18 16:00

| Parameter  | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab for sample(s): 01-07 Batch: WG1089690-4 |         |       |     |         |       |     |           |                 |
| Bromodichloromethane   | ND      | 0.200 | --  | ND      | 1.34  | --  |           | 1               |
| 1,4-Dioxane  | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| Trichloroethene  | ND      | 0.200 | --  | ND      | 1.07  | --  |           | 1               |
| 2,2,4-Trimethylpentane   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Methyl Methacrylate  | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| Heptane  | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| cis-1,3-Dichloropropene  | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 4-Methyl-2-pentanone   | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene  | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 1,1,2-Trichloroethane  | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| Toluene  | ND      | 0.200 | --  | ND      | 0.754 | --  |           | 1               |
| 1,3-Dichloropropane  | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| 2-Hexanone   | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| Dibromochloromethane   | ND      | 0.200 | --  | ND      | 1.70  | --  |           | 1               |
| 1,2-Dibromoethane  | ND      | 0.200 | --  | ND      | 1.54  | --  |           | 1               |
| Butyl Acetate  | ND      | 0.500 | --  | ND      | 2.38  | --  |           | 1               |
| Octane   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Tetrachloroethene  | ND      | 0.200 | --  | ND      | 1.36  | --  |           | 1               |
| 1,1,1,2-Tetrachloroethane  | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |
| Chlorobenzene  | ND      | 0.200 | --  | ND      | 0.921 | --  |           | 1               |
| Ethylbenzene   | ND      | 0.200 | --  | ND      | 0.869 | --  |           | 1               |
| p/m-Xylene   | ND      | 0.400 | --  | ND      | 1.74  | --  |           | 1               |
| Bromoform  | ND      | 0.200 | --  | ND      | 2.07  | --  |           | 1               |
| Styrene  | ND      | 0.200 | --  | ND      | 0.852 | --  |           | 1               |
| 1,1,2,2-Tetrachloroethane  | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 48,TO-15

Analytical Date: 02/15/18 16:00

| Parameter  | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab for sample(s): 01-07 Batch: WG1089690-4 |         |       |     |         |       |     |           |                 |
| o-Xylene   | ND      | 0.200 | --  | ND      | 0.869 | --  |           | 1               |
| 1,2,3-Trichloropropane   | ND      | 0.200 | --  | ND      | 1.21  | --  |           | 1               |
| Nonane (C9)  | ND      | 0.200 | --  | ND      | 1.05  | --  |           | 1               |
| Isopropylbenzene   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| Bromobenzene   | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| o-Chlorotoluene  | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| n-Propylbenzene  | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| p-Chlorotoluene  | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| 4-Ethyltoluene   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,3,5-Trimethylbenzene   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| tert-Butylbenzene  | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2,4-Trimethylbenzene   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| Decane (C10)   | ND      | 0.200 | --  | ND      | 1.16  | --  |           | 1               |
| Benzyl chloride  | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| 1,3-Dichlorobenzene  | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| 1,4-Dichlorobenzene  | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| sec-Butylbenzene   | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| p-Isopropyltoluene   | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2-Dichlorobenzene  | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| n-Butylbenzene   | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2-Dibromo-3-chloropropane  | ND      | 0.200 | --  | ND      | 1.93  | --  |           | 1               |
| Undecane   | ND      | 0.200 | --  | ND      | 1.28  | --  |           | 1               |
| Dodecane (C12)   | ND      | 0.200 | --  | ND      | 1.39  | --  |           | 1               |
| 1,2,4-Trichlorobenzene   | ND      | 0.200 | --  | ND      | 1.48  | --  |           | 1               |
| Naphthalene  | ND      | 0.200 | --  | ND      | 1.05  | --  |           | 1               |



**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18

### Method Blank Analysis Batch Quality Control

Analytical Method: 48,TO-15

Analytical Date: 02/15/18 16:00

| Parameter  | ppbV    |       |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab for sample(s): 01-07 Batch: WG1089690-4 |         |       |     |         |      |     |           |                 |
| 1,2,3-Trichlorobenzene   | ND      | 0.200 | --  | ND      | 1.48 | --  |           | 1               |
| Hexachlorobutadiene  | ND      | 0.200 | --  | ND      | 2.13 | --  |           | 1               |

| Results                          | Qualifier | Units | RDL | Dilution Factor |
|----------------------------------|-----------|-------|-----|-----------------|
| Tentatively Identified Compounds |           |       |     |                 |

No Tentatively Identified Compounds



## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Project Number:** B0239-016-001-004

**Lab Number:** L1804819

**Report Date:** 02/19/18

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics in Air by SIM - Mansfield Lab Associated sample(s): 03,05-07 Batch: WG1089689-3 |                  |      |                   |      |                     |     |      |               |
| Propylene   | 91               |      | -                 |      | 70-130              | -   |      | 25            |
| Dichlorodifluoromethane   | 104              |      | -                 |      | 70-130              | -   |      | 25            |
| Chloromethane   | 81               |      | -                 |      | 70-130              | -   |      | 25            |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane  | 103              |      | -                 |      | 70-130              | -   |      | 25            |
| Vinyl chloride  | 90               |      | -                 |      | 70-130              | -   |      | 25            |
| 1,3-Butadiene   | 99               |      | -                 |      | 70-130              | -   |      | 25            |
| Bromomethane  | 101              |      | -                 |      | 70-130              | -   |      | 25            |
| Chloroethane  | 89               |      | -                 |      | 70-130              | -   |      | 25            |
| Ethyl Alcohol   | 74               |      | -                 |      | 70-130              | -   |      | 25            |
| Vinyl bromide   | 112              |      | -                 |      | 70-130              | -   |      | 25            |
| Acetone   | 96               |      | -                 |      | 70-130              | -   |      | 25            |
| Trichlorofluoromethane  | 105              |      | -                 |      | 70-130              | -   |      | 25            |
| iso-Propyl Alcohol  | 92               |      | -                 |      | 70-130              | -   |      | 25            |
| Acrylonitrile   | 87               |      | -                 |      | 70-130              | -   |      | 25            |
| 1,1-Dichloroethene  | 93               |      | -                 |      | 70-130              | -   |      | 25            |
| tert-Butyl Alcohol <sup>1</sup>   | 100              |      | -                 |      | 70-130              | -   |      | 25            |
| Methylene chloride  | 88               |      | -                 |      | 70-130              | -   |      | 25            |
| 3-Chloropropene   | 92               |      | -                 |      | 70-130              | -   |      | 25            |
| Carbon disulfide  | 101              |      | -                 |      | 70-130              | -   |      | 25            |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane   | 108              |      | -                 |      | 70-130              | -   |      | 25            |
| trans-1,2-Dichloroethene  | 95               |      | -                 |      | 70-130              | -   |      | 25            |
| 1,1-Dichloroethane  | 93               |      | -                 |      | 70-130              | -   |      | 25            |
| Methyl tert butyl ether   | 109              |      | -                 |      | 70-130              | -   |      | 25            |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Project Number:** B0239-016-001-004

**Lab Number:** L1804819

**Report Date:** 02/19/18

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics in Air by SIM - Mansfield Lab Associated sample(s): 03,05-07 Batch: WG1089689-3 |                  |      |                   |      |                     |     |      |               |
| Vinyl acetate   | 97               |      | -                 |      | 70-130              | -   |      | 25            |
| 2-Butanone  | 86               |      | -                 |      | 70-130              | -   |      | 25            |
| cis-1,2-Dichloroethene  | 96               |      | -                 |      | 70-130              | -   |      | 25            |
| Ethyl Acetate   | 121              |      | -                 |      | 70-130              | -   |      | 25            |
| Chloroform  | 110              |      | -                 |      | 70-130              | -   |      | 25            |
| Tetrahydrofuran   | 90               |      | -                 |      | 70-130              | -   |      | 25            |
| 1,2-Dichloroethane  | 97               |      | -                 |      | 70-130              | -   |      | 25            |
| n-Hexane  | 84               |      | -                 |      | 70-130              | -   |      | 25            |
| 1,1,1-Trichloroethane   | 90               |      | -                 |      | 70-130              | -   |      | 25            |
| Benzene   | 84               |      | -                 |      | 70-130              | -   |      | 25            |
| Carbon tetrachloride  | 91               |      | -                 |      | 70-130              | -   |      | 25            |
| Cyclohexane   | 84               |      | -                 |      | 70-130              | -   |      | 25            |
| Dibromomethane <sup>1</sup>   | 74               |      | -                 |      | 70-130              | -   |      | 25            |
| 1,2-Dichloropropane   | 80               |      | -                 |      | 70-130              | -   |      | 25            |
| Bromodichloromethane  | 92               |      | -                 |      | 70-130              | -   |      | 25            |
| 1,4-Dioxane   | 103              |      | -                 |      | 70-130              | -   |      | 25            |
| Trichloroethene   | 91               |      | -                 |      | 70-130              | -   |      | 25            |
| 2,2,4-Trimethylpentane  | 89               |      | -                 |      | 70-130              | -   |      | 25            |
| cis-1,3-Dichloropropene   | 89               |      | -                 |      | 70-130              | -   |      | 25            |
| 4-Methyl-2-pentanone  | 82               |      | -                 |      | 70-130              | -   |      | 25            |
| trans-1,3-Dichloropropene   | 77               |      | -                 |      | 70-130              | -   |      | 25            |
| 1,1,2-Trichloroethane   | 91               |      | -                 |      | 70-130              | -   |      | 25            |
| Toluene   | 108              |      | -                 |      | 70-130              | -   |      | 25            |

# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1804819  
**Report Date:** 02/19/18

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics in Air by SIM - Mansfield Lab Associated sample(s): 03,05-07 Batch: WG1089689-3 |                  |      |                   |      |                     |     |      |               |
| 2-Hexanone  | 99               |      | -                 |      | 70-130              | -   |      | 25            |
| Dibromochloromethane  | 129              |      | -                 |      | 70-130              | -   |      | 25            |
| 1,2-Dibromoethane   | 114              |      | -                 |      | 70-130              | -   |      | 25            |
| Tetrachloroethene   | 119              |      | -                 |      | 70-130              | -   |      | 25            |
| 1,1,1,2-Tetrachloroethane   | 110              |      | -                 |      | 70-130              | -   |      | 25            |
| Chlorobenzene   | 113              |      | -                 |      | 70-130              | -   |      | 25            |
| Ethylbenzene  | 117              |      | -                 |      | 70-130              | -   |      | 25            |
| p/m-Xylene  | 122              |      | -                 |      | 70-130              | -   |      | 25            |
| Bromoform   | 136              | Q    | -                 |      | 70-130              | -   |      | 25            |
| Styrene   | 125              |      | -                 |      | 70-130              | -   |      | 25            |
| 1,1,2,2-Tetrachloroethane   | 116              |      | -                 |      | 70-130              | -   |      | 25            |
| o-Xylene  | 123              |      | -                 |      | 70-130              | -   |      | 25            |
| 1,2,3-Trichloropropane <sup>1</sup>   | 108              |      | -                 |      | 70-130              | -   |      | 25            |
| Isopropylbenzene  | 112              |      | -                 |      | 70-130              | -   |      | 25            |
| Bromobenzene <sup>1</sup>   | 106              |      | -                 |      | 70-130              | -   |      | 25            |
| 4-Ethyltoluene  | 142              | Q    | -                 |      | 70-130              | -   |      | 25            |
| 1,3,5-Trimethylbenzene  | 130              |      | -                 |      | 70-130              | -   |      | 25            |
| 1,2,4-Trimethylbenzene  | 132              | Q    | -                 |      | 70-130              | -   |      | 25            |
| Benzyl chloride   | 125              |      | -                 |      | 70-130              | -   |      | 25            |
| 1,3-Dichlorobenzene   | 126              |      | -                 |      | 70-130              | -   |      | 25            |
| 1,4-Dichlorobenzene   | 120              |      | -                 |      | 70-130              | -   |      | 25            |
| sec-Butylbenzene  | 110              |      | -                 |      | 70-130              | -   |      | 25            |
| p-Isopropyltoluene  | 106              |      | -                 |      | 70-130              | -   |      | 25            |

# **Lab Control Sample Analysis** Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1804819

**Project Number:** B0239-016-001-004

**Report Date:** 02/19/18

| <b>Parameter</b>  | <b>LCS<br/>%Recovery</b> | <b>Qual</b> | <b>LCSD<br/>%Recovery</b> | <b>Qual</b> | <b>%Recovery<br/>Limits</b> | <b>RPD</b> | <b>Qual</b> | <b>RPD<br/>Limits</b> |
|---|--------------------------|-------------|---------------------------|-------------|-----------------------------|------------|-------------|-----------------------|
| Volatile Organics in Air by SIM - Mansfield Lab Associated sample(s): 03,05-07 Batch: WG1089689-3 |                          |             |                           |             |                             |            |             |                       |
| 1,2-Dichlorobenzene   | 123                      |             | -                         |             | 70-130                      | -          |             | 25                    |
| n-Butylbenzene  | 112                      |             | -                         |             | 70-130                      | -          |             | 25                    |
| 1,2,4-Trichlorobenzene  | 130                      |             | -                         |             | 70-130                      | -          |             | 25                    |
| Naphthalene   | 118                      |             | -                         |             | 70-130                      | -          |             | 25                    |
| 1,2,3-Trichlorobenzene  | 118                      |             | -                         |             | 70-130                      | -          |             | 25                    |
| Hexachlorobutadiene   | 125                      |             | -                         |             | 70-130                      | -          |             | 25                    |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Project Number:** B0239-016-001-004

**Lab Number:** L1804819

**Report Date:** 02/19/18

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics in Air - Mansfield Lab Associated sample(s): 01-07 Batch: WG1089690-3 |                  |      |                   |      |                     |     |      |               |
| Chlorodifluoromethane   | 84               |      | -                 |      | 70-130              | -   |      |               |
| Propylene   | 94               |      | -                 |      | 70-130              | -   |      |               |
| Propane   | 72               |      | -                 |      | 70-130              | -   |      |               |
| Dichlorodifluoromethane   | 119              |      | -                 |      | 70-130              | -   |      |               |
| Chloromethane   | 89               |      | -                 |      | 70-130              | -   |      |               |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane  | 129              |      | -                 |      | 70-130              | -   |      |               |
| Methanol  | 72               |      | -                 |      | 70-130              | -   |      |               |
| Vinyl chloride  | 94               |      | -                 |      | 70-130              | -   |      |               |
| 1,3-Butadiene   | 100              |      | -                 |      | 70-130              | -   |      |               |
| Butane  | 78               |      | -                 |      | 70-130              | -   |      |               |
| Bromomethane  | 109              |      | -                 |      | 70-130              | -   |      |               |
| Chloroethane  | 94               |      | -                 |      | 70-130              | -   |      |               |
| Ethyl Alcohol   | 72               |      | -                 |      | 70-130              | -   |      |               |
| Dichlorofluoromethane   | 92               |      | -                 |      | 70-130              | -   |      |               |
| Vinyl bromide   | 111              |      | -                 |      | 70-130              | -   |      |               |
| Acrolein  | 86               |      | -                 |      | 70-130              | -   |      |               |
| Acetone   | 101              |      | -                 |      | 70-130              | -   |      |               |
| Acetonitrile  | 76               |      | -                 |      | 70-130              | -   |      |               |
| Trichlorofluoromethane  | 107              |      | -                 |      | 70-130              | -   |      |               |
| iso-Propyl Alcohol  | 88               |      | -                 |      | 70-130              | -   |      |               |
| Acrylonitrile   | 90               |      | -                 |      | 70-130              | -   |      |               |
| Pentane   | 78               |      | -                 |      | 70-130              | -   |      |               |
| 1,1-Dichloroethene  | 94               |      | -                 |      | 70-130              | -   |      |               |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1804819  
**Report Date:** 02/19/18

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics in Air - Mansfield Lab Associated sample(s): 01-07 Batch: WG1089690-3 |                  |      |                   |      |                     |     |      |               |
| tert-Butyl Alcohol  | 94               |      | -                 |      | 70-130              | -   |      |               |
| Methylene chloride  | 90               |      | -                 |      | 70-130              | -   |      |               |
| 3-Chloropropene   | 91               |      | -                 |      | 70-130              | -   |      |               |
| Carbon disulfide  | 103              |      | -                 |      | 70-130              | -   |      |               |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane   | 109              |      | -                 |      | 70-130              | -   |      |               |
| trans-1,2-Dichloroethene  | 99               |      | -                 |      | 70-130              | -   |      |               |
| 1,1-Dichloroethane  | 93               |      | -                 |      | 70-130              | -   |      |               |
| Methyl tert butyl ether   | 107              |      | -                 |      | 70-130              | -   |      |               |
| Vinyl acetate   | 99               |      | -                 |      | 70-130              | -   |      |               |
| 2-Butanone  | 85               |      | -                 |      | 70-130              | -   |      |               |
| cis-1,2-Dichloroethene  | 83               |      | -                 |      | 70-130              | -   |      |               |
| Ethyl Acetate   | 112              |      | -                 |      | 70-130              | -   |      |               |
| Chloroform  | 107              |      | -                 |      | 70-130              | -   |      |               |
| Tetrahydrofuran   | 93               |      | -                 |      | 70-130              | -   |      |               |
| 2,2-Dichloropropane   | 100              |      | -                 |      | 70-130              | -   |      |               |
| 1,2-Dichloroethane  | 98               |      | -                 |      | 70-130              | -   |      |               |
| n-Hexane  | 80               |      | -                 |      | 70-130              | -   |      |               |
| Isopropyl Ether   | 85               |      | -                 |      | 70-130              | -   |      |               |
| Ethyl-Tert-Butyl-Ether  | 78               |      | -                 |      | 70-130              | -   |      |               |
| 1,1,1-Trichloroethane   | 87               |      | -                 |      | 70-130              | -   |      |               |
| 1,1-Dichloropropene   | 80               |      | -                 |      | 70-130              | -   |      |               |
| Benzene   | 85               |      | -                 |      | 70-130              | -   |      |               |
| Carbon tetrachloride  | 88               |      | -                 |      | 70-130              | -   |      |               |

# **Lab Control Sample Analysis** **Batch Quality Control**

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1804819

**Project Number:** B0239-016-001-004

**Report Date:** 02/19/18

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics in Air - Mansfield Lab Associated sample(s): 01-07 Batch: WG1089690-3 |                  |      |                   |      |                     |     |      |               |
| Cyclohexane   | 85               |      | -                 |      | 70-130              | -   |      |               |
| Tertiary-Amyl Methyl Ether  | 82               |      | -                 |      | 70-130              | -   |      |               |
| Dibromomethane  | 81               |      | -                 |      | 70-130              | -   |      |               |
| 1,2-Dichloropropane   | 80               |      | -                 |      | 70-130              | -   |      |               |
| Bromodichloromethane  | 87               |      | -                 |      | 70-130              | -   |      |               |
| 1,4-Dioxane   | 98               |      | -                 |      | 70-130              | -   |      |               |
| Trichloroethene   | 88               |      | -                 |      | 70-130              | -   |      |               |
| 2,2,4-Trimethylpentane  | 90               |      | -                 |      | 70-130              | -   |      |               |
| Methyl Methacrylate   | 88               |      | -                 |      | 70-130              | -   |      |               |
| Heptane   | 79               |      | -                 |      | 70-130              | -   |      |               |
| cis-1,3-Dichloropropene   | 89               |      | -                 |      | 70-130              | -   |      |               |
| 4-Methyl-2-pentanone  | 83               |      | -                 |      | 70-130              | -   |      |               |
| trans-1,3-Dichloropropene   | 73               |      | -                 |      | 70-130              | -   |      |               |
| 1,1,2-Trichloroethane   | 87               |      | -                 |      | 70-130              | -   |      |               |
| Toluene   | 107              |      | -                 |      | 70-130              | -   |      |               |
| 1,3-Dichloropropane   | 98               |      | -                 |      | 70-130              | -   |      |               |
| 2-Hexanone  | 97               |      | -                 |      | 70-130              | -   |      |               |
| Dibromochloromethane  | 126              |      | -                 |      | 70-130              | -   |      |               |
| 1,2-Dibromoethane   | 108              |      | -                 |      | 70-130              | -   |      |               |
| Butyl Acetate   | 104              |      | -                 |      | 70-130              | -   |      |               |
| Octane  | 105              |      | -                 |      | 70-130              | -   |      |               |
| Tetrachloroethene   | 110              |      | -                 |      | 70-130              | -   |      |               |
| 1,1,1,2-Tetrachloroethane   | 103              |      | -                 |      | 70-130              | -   |      |               |

## Lab Control Sample Analysis

### Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Lab Number:** L1804819

**Project Number:** B0239-016-001-004

**Report Date:** 02/19/18

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics in Air - Mansfield Lab Associated sample(s): 01-07 Batch: WG1089690-3 |                  |      |                   |      |                     |     |      |               |
| Chlorobenzene   | 108              |      | -                 |      | 70-130              | -   |      |               |
| Ethylbenzene  | 111              |      | -                 |      | 70-130              | -   |      |               |
| p/m-Xylene  | 110              |      | -                 |      | 70-130              | -   |      |               |
| Bromoform   | 127              |      | -                 |      | 70-130              | -   |      |               |
| Styrene   | 115              |      | -                 |      | 70-130              | -   |      |               |
| 1,1,2,2-Tetrachloroethane   | 108              |      | -                 |      | 70-130              | -   |      |               |
| o-Xylene  | 114              |      | -                 |      | 70-130              | -   |      |               |
| 1,2,3-Trichloropropane  | 99               |      | -                 |      | 70-130              | -   |      |               |
| Nonane (C9)   | 90               |      | -                 |      | 70-130              | -   |      |               |
| Isopropylbenzene  | 112              |      | -                 |      | 70-130              | -   |      |               |
| Bromobenzene  | 100              |      | -                 |      | 70-130              | -   |      |               |
| o-Chlorotoluene   | 110              |      | -                 |      | 70-130              | -   |      |               |
| n-Propylbenzene   | 114              |      | -                 |      | 70-130              | -   |      |               |
| p-Chlorotoluene   | 103              |      | -                 |      | 70-130              | -   |      |               |
| 4-Ethyltoluene  | 121              |      | -                 |      | 70-130              | -   |      |               |
| 1,3,5-Trimethylbenzene  | 106              |      | -                 |      | 70-130              | -   |      |               |
| tert-Butylbenzene   | 112              |      | -                 |      | 70-130              | -   |      |               |
| 1,2,4-Trimethylbenzene  | 116              |      | -                 |      | 70-130              | -   |      |               |
| Decane (C10)  | 104              |      | -                 |      | 70-130              | -   |      |               |
| Benzyl chloride   | 124              |      | -                 |      | 70-130              | -   |      |               |
| 1,3-Dichlorobenzene   | 114              |      | -                 |      | 70-130              | -   |      |               |
| 1,4-Dichlorobenzene   | 117              |      | -                 |      | 70-130              | -   |      |               |
| sec-Butylbenzene  | 112              |      | -                 |      | 70-130              | -   |      |               |



# Lab Control Sample Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Project Number:** B0239-016-001-004

**Lab Number:** L1804819

**Report Date:** 02/19/18

| Parameter   | LCS<br>%Recovery | Qual | LCSD<br>%Recovery | Qual | %Recovery<br>Limits | RPD | Qual | RPD<br>Limits |
|---|------------------|------|-------------------|------|---------------------|-----|------|---------------|
| Volatile Organics in Air - Mansfield Lab Associated sample(s): 01-07 Batch: WG1089690-3 |                  |      |                   |      |                     |     |      |               |
| p-Isopropyltoluene  | 106              |      | -                 |      | 70-130              | -   |      |               |
| 1,2-Dichlorobenzene   | 116              |      | -                 |      | 70-130              | -   |      |               |
| n-Butylbenzene  | 110              |      | -                 |      | 70-130              | -   |      |               |
| 1,2-Dibromo-3-chloropropane   | 96               |      | -                 |      | 70-130              | -   |      |               |
| Undecane  | 109              |      | -                 |      | 70-130              | -   |      |               |
| Dodecane (C12)  | 101              |      | -                 |      | 70-130              | -   |      |               |
| 1,2,4-Trichlorobenzene  | 120              |      | -                 |      | 70-130              | -   |      |               |
| Naphthalene   | 108              |      | -                 |      | 70-130              | -   |      |               |
| 1,2,3-Trichlorobenzene  | 106              |      | -                 |      | 70-130              | -   |      |               |
| Hexachlorobutadiene   | 117              |      | -                 |      | 70-130              | -   |      |               |

# Lab Duplicate Analysis

## Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Project Number:** B0239-016-001-00

**Lab Number:** L1804819

**Report Date:** 02/19/18

| Parameter   | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|---|---------------|------------------|-------|-----|------|------------|
| Volatile Organics in Air by SIM - Mansfield Lab Associated sample(s): 03,05-07 QC Batch ID: WG1089689-5 QC Sample: L1804819-03 Client ID: AMBIENT-1 |               |                  |       |     |      |            |
| Vinyl chloride  | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,1-Dichloroethene  | ND            | ND               | ppbV  | NC  |      | 25         |
| cis-1,2-Dichloroethene  | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,1,1-Trichloroethane   | ND            | ND               | ppbV  | NC  |      | 25         |
| Carbon tetrachloride  | 0.059         | 0.058            | ppbV  | 2   |      | 25         |
| Trichloroethene   | ND            | ND               | ppbV  | NC  |      | 25         |
| Tetrachloroethene   | ND            | ND               | ppbV  | NC  |      | 25         |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-00

**Lab Duplicate Analysis**  
**Batch Quality Control**

**Lab Number:** L1804819  
**Report Date:** 02/19/18

| Parameter   | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|---|---------------|------------------|-------|-----|------|------------|
| Volatile Organics in Air - Mansfield Lab Associated sample(s): 01-07 QC Batch ID: WG1089690-5 QC Sample: L1804819-03 Client ID: AMBIENT-1 |               |                  |       |     |      |            |
| Dichlorodifluoromethane   | 0.393         | 0.481            | ppbV  | 20  |      | 25         |
| Chloromethane   | 0.384         | 0.402            | ppbV  | 5   |      | 25         |
| 1,2-Dichloro-1,1,2,2-tetrafluoroethane  | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,3-Butadiene   | ND            | ND               | ppbV  | NC  |      | 25         |
| Bromomethane  | ND            | ND               | ppbV  | NC  |      | 25         |
| Chloroethane  | ND            | ND               | ppbV  | NC  |      | 25         |
| Ethyl Alcohol   | ND            | ND               | ppbV  | NC  |      | 25         |
| Vinyl bromide   | ND            | ND               | ppbV  | NC  |      | 25         |
| Acetone   | 10.7          | 9.92             | ppbV  | 8   |      | 25         |
| Trichlorofluoromethane  | ND            | ND               | ppbV  | NC  |      | 25         |
| iso-Propyl Alcohol  | 0.656         | 0.630            | ppbV  | 4   |      | 25         |
| tert-Butyl Alcohol  | 2.12          | 2.03             | ppbV  | 4   |      | 25         |
| Methylene chloride  | ND            | ND               | ppbV  | NC  |      | 25         |
| 3-Chloropropene   | ND            | ND               | ppbV  | NC  |      | 25         |
| Carbon disulfide  | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,1,2-Trichloro-1,2,2-Trifluoroethane   | ND            | ND               | ppbV  | NC  |      | 25         |
| trans-1,2-Dichloroethene  | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,1-Dichloroethane  | ND            | ND               | ppbV  | NC  |      | 25         |
| Methyl tert butyl ether   | ND            | ND               | ppbV  | NC  |      | 25         |
| 2-Butanone  | 5.19          | 5.11             | ppbV  | 2   |      | 25         |
| Ethyl Acetate   | ND            | ND               | ppbV  | NC  |      | 25         |

# **Lab Duplicate Analysis** Batch Quality Control

**Project Name:** MAIN & EAST BALCOM STREET SITE

**Project Number:** B0239-016-001-00

**Lab Number:** L1804819

**Report Date:** 02/19/18

| Parameter   | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|---|---------------|------------------|-------|-----|------|------------|
| Volatile Organics in Air - Mansfield Lab Associated sample(s): 01-07 QC Batch ID: WG1089690-5 QC Sample: L1804819-03 Client ID: AMBIENT-1 |               |                  |       |     |      |            |
| Chloroform  | ND            | ND               | ppbV  | NC  |      | 25         |
| Tetrahydrofuran   | 4.65          | 4.67             | ppbV  | 0   |      | 25         |
| 1,2-Dichloroethane  | ND            | ND               | ppbV  | NC  |      | 25         |
| n-Hexane  | 0.338         | 0.371            | ppbV  | 9   |      | 25         |
| Benzene   | 0.200         | ND               | ppbV  | NC  |      | 25         |
| Cyclohexane   | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,2-Dichloropropane   | ND            | ND               | ppbV  | NC  |      | 25         |
| Bromodichloromethane  | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,4-Dioxane   | ND            | ND               | ppbV  | NC  |      | 25         |
| 2,2,4-Trimethylpentane  | ND            | ND               | ppbV  | NC  |      | 25         |
| Heptane   | 0.214         | 0.230            | ppbV  | 7   |      | 25         |
| cis-1,3-Dichloropropene   | ND            | ND               | ppbV  | NC  |      | 25         |
| 4-Methyl-2-pentanone  | ND            | ND               | ppbV  | NC  |      | 25         |
| trans-1,3-Dichloropropene   | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,1,2-Trichloroethane   | ND            | ND               | ppbV  | NC  |      | 25         |
| Toluene   | 1.31          | 1.30             | ppbV  | 1   |      | 25         |
| 2-Hexanone  | ND            | ND               | ppbV  | NC  |      | 25         |
| Dibromochloromethane  | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,2-Dibromoethane   | ND            | ND               | ppbV  | NC  |      | 25         |
| Chlorobenzene   | ND            | ND               | ppbV  | NC  |      | 25         |
| Ethylbenzene  | 0.998         | 1.02             | ppbV  | 2   |      | 25         |

# Lab Duplicate Analysis

## Batch Quality Control

Project Name: MAIN &amp; EAST BALCOM STREET SITE

Project Number: B0239-016-001-00

Lab Number: L1804819

Report Date: 02/19/18

| Parameter   | Native Sample | Duplicate Sample | Units | RPD | Qual | RPD Limits |
|---|---------------|------------------|-------|-----|------|------------|
| Volatile Organics in Air - Mansfield Lab Associated sample(s): 01-07 QC Batch ID: WG1089690-5 QC Sample: L1804819-03 Client ID: AMBIENT-1 |               |                  |       |     |      |            |
| p/m-Xylene  | 5.80          | 5.54             | ppbV  | 5   |      | 25         |
| Bromoform   | ND            | ND               | ppbV  | NC  |      | 25         |
| Styrene   | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,1,2,2-Tetrachloroethane   | ND            | ND               | ppbV  | NC  |      | 25         |
| o-Xylene  | 1.88          | 1.83             | ppbV  | 3   |      | 25         |
| 4-Ethyltoluene  | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,3,5-Trimethylbenzene  | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,2,4-Trimethylbenzene  | 0.273         | 0.288            | ppbV  | 5   |      | 25         |
| Benzyl chloride   | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,3-Dichlorobenzene   | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,4-Dichlorobenzene   | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,2-Dichlorobenzene   | ND            | ND               | ppbV  | NC  |      | 25         |
| 1,2,4-Trichlorobenzene  | ND            | ND               | ppbV  | NC  |      | 25         |
| Hexachlorobutadiene   | ND            | ND               | ppbV  | NC  |      | 25         |

**Project Name:** MAIN & EAST BALCOM STREET SITE

Serial\_No:02191816:35  
**Lab Number:** L1804819

**Project Number:** B0239-016-001-004

**Report Date:** 02/19/18

**Canister and Flow Controller Information**

| Samplenum   | Client ID | Media ID | Media Type | Date Prepared | Bottle Order | Cleaning Batch ID | Can Leak Check | Initial Pressure (in. Hg) | Pressure on Receipt (in. Hg) | Flow Controller Leak Chk | Flow Out mL/min | Flow In mL/min | % RPD |
|-------------|-----------|----------|------------|---------------|--------------|-------------------|----------------|---------------------------|------------------------------|--------------------------|-----------------|----------------|-------|
| L1804819-01 | SSV-1     | 0635     | Flow 5     | 02/02/18      | 258701       |                   | -              | -                         | -                            | Pass                     | 3.3             | 3.9            | 17    |
| L1804819-01 | SSV-1     | 2270     | 6.0L Can   | 02/02/18      | 258701       | L1803067-02       | Pass           | -30.0                     | -8.5                         | -                        | -               | -              | -     |
| L1804819-02 | BD        | 0334     | Flow 5     | 02/02/18      | 258701       |                   | -              | -                         | -                            | Pass                     | 3.3             | 3.8            | 14    |
| L1804819-02 | BD        | 2129     | 6.0L Can   | 02/02/18      | 258701       | L1803067-02       | Pass           | -30.0                     | -8.3                         | -                        | -               | -              | -     |
| L1804819-03 | AMBIENT-1 | 0868     | Flow 5     | 02/02/18      | 258701       |                   | -              | -                         | -                            | Pass                     | 3.3             | 3.8            | 14    |
| L1804819-03 | AMBIENT-1 | 649      | 6.0L Can   | 02/02/18      | 258701       | L1803067-02       | Pass           | -30.0                     | -8.5                         | -                        | -               | -              | -     |
| L1804819-04 | SSV-2     | 0037     | Flow 5     | 02/02/18      | 258701       |                   | -              | -                         | -                            | Pass                     | 3.3             | 3.8            | 14    |
| L1804819-04 | SSV-2     | 1709     | 6.0L Can   | 02/02/18      | 258701       | L1803067-02       | Pass           | -30.0                     | -12.0                        | -                        | -               | -              | -     |
| L1804819-05 | AMBIENT-2 | 0150     | Flow 5     | 02/02/18      | 258701       |                   | -              | -                         | -                            | Pass                     | 3.3             | 3.7            | 11    |
| L1804819-05 | AMBIENT-2 | 1780     | 6.0L Can   | 02/02/18      | 258701       | L1803067-02       | Pass           | -30.0                     | -12.3                        | -                        | -               | -              | -     |
| L1804819-06 | AMBIENT-3 | 0408     | Flow 5     | 02/02/18      | 258701       |                   | -              | -                         | -                            | Pass                     | 3.3             | 3.5            | 6     |
| L1804819-06 | AMBIENT-3 | 2275     | 6.0L Can   | 02/02/18      | 258701       | L1803067-02       | Pass           | -30.0                     | -13.4                        | -                        | -               | -              | -     |
| L1804819-07 | OUTDOOR-1 | 0237     | Flow 5     | 02/02/18      | 258701       |                   | -              | -                         | -                            | Pass                     | 3.3             | 3.5            | 6     |
| L1804819-07 | OUTDOOR-1 | 1988     | 6.0L Can   | 02/02/18      | 258701       | L1803067-02       | Pass           | -30.0                     | -12.9                        | -                        | -               | -              | -     |

**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1728360  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1728360-01  
**Client ID:** CAN 149 SHELF 1  
**Sample Location:**  
**Sample Depth:**  
**Matrix:** Air  
**Analytical Method:** 48,TO-15  
**Analytical Date:** 08/15/17 09:49  
**Analyst:** MB

**Date Collected:** 08/14/17 16:00  
**Date Received:** 08/15/17  
**Field Prep:** Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Dichlorodifluoromethane                  | ND      | 0.200 | --  | ND      | 0.989 | --  |           | 1               |
| Chloromethane                            | ND      | 0.200 | --  | ND      | 0.413 | --  |           | 1               |
| Freon-114                                | ND      | 0.200 | --  | ND      | 1.40  | --  |           | 1               |
| Vinyl chloride                           | ND      | 0.200 | --  | ND      | 0.511 | --  |           | 1               |
| 1,3-Butadiene                            | ND      | 0.200 | --  | ND      | 0.442 | --  |           | 1               |
| Butane                                   | ND      | 0.200 | --  | ND      | 0.475 | --  |           | 1               |
| Acetaldehyde                             | ND      | 2.50  | --  | ND      | 4.50  | --  |           | 1               |
| Bromomethane                             | ND      | 0.200 | --  | ND      | 0.777 | --  |           | 1               |
| Chloroethane                             | ND      | 0.200 | --  | ND      | 0.528 | --  |           | 1               |
| Ethanol                                  | ND      | 2.50  | --  | ND      | 4.71  | --  |           | 1               |
| Vinyl bromide                            | ND      | 0.200 | --  | ND      | 0.874 | --  |           | 1               |
| Acrolein                                 | ND      | 0.500 | --  | ND      | 1.15  | --  |           | 1               |
| Acetone                                  | ND      | 1.00  | --  | ND      | 2.38  | --  |           | 1               |
| Trichlorofluoromethane                   | ND      | 0.200 | --  | ND      | 1.12  | --  |           | 1               |
| Isopropanol                              | ND      | 0.500 | --  | ND      | 1.23  | --  |           | 1               |
| Pentane                                  | ND      | 0.200 | --  | ND      | 0.590 | --  |           | 1               |
| 1,1-Dichloroethene                       | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| tert-Butyl Alcohol                       | ND      | 0.500 | --  | ND      | 1.52  | --  |           | 1               |
| Methylene chloride                       | ND      | 1.00  | --  | ND      | 1.74  | --  |           | 1               |
| 3-Chloropropene                          | ND      | 0.200 | --  | ND      | 0.626 | --  |           | 1               |
| Carbon disulfide                         | ND      | 0.200 | --  | ND      | 0.623 | --  |           | 1               |
| Freon-113                                | ND      | 0.200 | --  | ND      | 1.53  | --  |           | 1               |
| trans-1,2-Dichloroethene                 | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 1,1-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| Methyl tert butyl ether                  | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |



**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1728360  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1728360-01  
**Client ID:** CAN 149 SHELF 1  
**Sample Location:**  
**Sample Depth:**

**Date Collected:** 08/14/17 16:00  
**Date Received:** 08/15/17  
**Field Prep:** Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| 2-Butanone                               | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| cis-1,2-Dichloroethene                   | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| Chloroform                               | ND      | 0.200 | --  | ND      | 0.977 | --  |           | 1               |
| 1,2-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| n-Hexane                                 | ND      | 0.200 | --  | ND      | 0.705 | --  |           | 1               |
| 1,1,1-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| Benzene                                  | ND      | 0.200 | --  | ND      | 0.639 | --  |           | 1               |
| Thiophene                                | ND      | 0.200 | --  | ND      | 0.688 | --  |           | 1               |
| Carbon tetrachloride                     | ND      | 0.200 | --  | ND      | 1.26  | --  |           | 1               |
| Cyclohexane                              | ND      | 0.200 | --  | ND      | 0.688 | --  |           | 1               |
| 1,2-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| Bromodichloromethane                     | ND      | 0.200 | --  | ND      | 1.34  | --  |           | 1               |
| 1,4-Dioxane                              | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| Trichloroethene                          | ND      | 0.200 | --  | ND      | 1.07  | --  |           | 1               |
| 2,2,4-Trimethylpentane                   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Heptane                                  | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| cis-1,3-Dichloropropene                  | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 4-Methyl-2-pentanone                     | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene                | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 1,1,2-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| Toluene                                  | ND      | 0.200 | --  | ND      | 0.754 | --  |           | 1               |
| 2-Methylthiophene                        | ND      | 0.200 | --  | ND      | 0.803 | --  |           | 1               |
| 2-Hexanone                               | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| 3-Methylthiophene                        | ND      | 0.200 | --  | ND      | 0.803 | --  |           | 1               |
| Dibromochloromethane                     | ND      | 0.200 | --  | ND      | 1.70  | --  |           | 1               |
| 1,2-Dibromoethane                        | ND      | 0.200 | --  | ND      | 1.54  | --  |           | 1               |
| Octane                                   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Tetrachloroethene                        | ND      | 0.200 | --  | ND      | 1.36  | --  |           | 1               |





**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1728360  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1728360-01  
**Client ID:** CAN 149 SHELF 1  
**Sample Location:**  
**Sample Depth:**

**Date Collected:** 08/14/17 16:00  
**Date Received:** 08/15/17  
**Field Prep:** Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Chlorobenzene                            | ND      | 0.200 | --  | ND      | 0.921 | --  |           | 1               |
| Ethylbenzene                             | ND      | 0.200 | --  | ND      | 0.869 | --  |           | 1               |
| 2-Ethylthiophene                         | ND      | 0.200 | --  | ND      | 0.918 | --  |           | 1               |
| p/m-Xylene                               | ND      | 0.400 | --  | ND      | 1.74  | --  |           | 1               |
| Bromoform                                | ND      | 0.200 | --  | ND      | 2.07  | --  |           | 1               |
| Styrene                                  | ND      | 0.200 | --  | ND      | 0.852 | --  |           | 1               |
| 1,1,2,2-Tetrachloroethane                | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |
| o-Xylene                                 | ND      | 0.200 | --  | ND      | 0.869 | --  |           | 1               |
| Nonane                                   | ND      | 0.200 | --  | ND      | 1.05  | --  |           | 1               |
| 2-Chlorotoluene                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| 4-Ethyltoluene                           | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,3,5-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,2,4-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| Decane                                   | ND      | 0.200 | --  | ND      | 1.16  | --  |           | 1               |
| 1,3-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| 1,4-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| 1,2,3-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,2-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| Indane                                   | ND      | 0.200 | --  | ND      | 0.967 | --  |           | 1               |
| Indene                                   | ND      | 0.200 | --  | ND      | 0.951 | --  |           | 1               |
| Undecane                                 | ND      | 0.200 | --  | ND      | 1.28  | --  |           | 1               |
| 1,2,4,5-Tetramethylbenzene               | ND      | 0.500 | --  | ND      | 2.74  | --  |           | 1               |
| Dodecane                                 | ND      | 0.200 | --  | ND      | 1.39  | --  |           | 1               |
| 1,2,4-Trichlorobenzene                   | ND      | 0.200 | --  | ND      | 1.48  | --  |           | 1               |
| Naphthalene                              | ND      | 0.200 | --  | ND      | 1.05  | --  |           | 1               |
| Benzothiophene                           | ND      | 0.500 | --  | ND      | 2.74  | --  |           | 1               |
| Hexachlorobutadiene                      | ND      | 0.200 | --  | ND      | 2.13  | --  |           | 1               |
| 2-Methylnaphthalene                      | ND      | 1.00  | --  | ND      | 5.82  | --  |           | 1               |



**Project Name:** BATCH CANISTER CERTIFICATION**Lab Number:** L1728360**Project Number:** CANISTER QC BAT**Report Date:** 02/19/18**Air Canister Certification Results**

Lab ID: L1728360-01

Date Collected: 08/14/17 16:00

Client ID: CAN 149 SHELF 1

Date Received: 08/15/17

Sample Location:

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |      |     | ug/m3   |      |     | Qualifier | Dilution Factor |
|--|---------|------|-----|---------|------|-----|-----------|-----------------|
|  | Results | RL   | MDL | Results | RL   | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |      |     |         |      |     |           |                 |
| 1-Methylnaphthalene                      | ND      | 1.00 | --  | ND      | 5.82 | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-Difluorobenzene | 99         |           | 60-140              |
| Bromochloromethane  | 102        |           | 60-140              |
| chlorobenzene-d5    | 102        |           | 60-140              |

**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1728360  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1728360-01  
**Client ID:** CAN 149 SHELF 1  
**Sample Location:**  
**Sample Depth:**  
**Matrix:** Air  
**Analytical Method:** 48,TO-15  
**Analytical Date:** 08/15/17 11:44  
**Analyst:** MB

**Date Collected:** 08/14/17 16:00  
**Date Received:** 08/15/17  
**Field Prep:** Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Chlorodifluoromethane                    | ND      | 0.200 | --  | ND      | 0.707 | --  |           | 1               |
| Propylene                                | ND      | 0.500 | --  | ND      | 0.861 | --  |           | 1               |
| Dichlorodifluoromethane                  | ND      | 0.200 | --  | ND      | 0.989 | --  |           | 1               |
| Chloromethane                            | ND      | 0.200 | --  | ND      | 0.413 | --  |           | 1               |
| Freon-114                                | ND      | 0.200 | --  | ND      | 1.40  | --  |           | 1               |
| Methanol                                 | ND      | 5.00  | --  | ND      | 6.55  | --  |           | 1               |
| Vinyl chloride                           | ND      | 0.200 | --  | ND      | 0.511 | --  |           | 1               |
| 1,3-Butadiene                            | ND      | 0.200 | --  | ND      | 0.442 | --  |           | 1               |
| Butane                                   | ND      | 0.200 | --  | ND      | 0.475 | --  |           | 1               |
| Bromomethane                             | ND      | 0.200 | --  | ND      | 0.777 | --  |           | 1               |
| Chloroethane                             | ND      | 0.200 | --  | ND      | 0.528 | --  |           | 1               |
| Ethanol                                  | ND      | 5.00  | --  | ND      | 9.42  | --  |           | 1               |
| Dichlorofluoromethane                    | ND      | 0.200 | --  | ND      | 0.842 | --  |           | 1               |
| Vinyl bromide                            | ND      | 0.200 | --  | ND      | 0.874 | --  |           | 1               |
| Acrolein                                 | ND      | 0.500 | --  | ND      | 1.15  | --  |           | 1               |
| Acetone                                  | ND      | 1.00  | --  | ND      | 2.38  | --  |           | 1               |
| Acetonitrile                             | ND      | 0.200 | --  | ND      | 0.336 | --  |           | 1               |
| Trichlorofluoromethane                   | ND      | 0.200 | --  | ND      | 1.12  | --  |           | 1               |
| Isopropanol                              | ND      | 0.500 | --  | ND      | 1.23  | --  |           | 1               |
| Acrylonitrile                            | ND      | 0.500 | --  | ND      | 1.09  | --  |           | 1               |
| Pentane                                  | ND      | 0.200 | --  | ND      | 0.590 | --  |           | 1               |
| Ethyl ether                              | ND      | 0.200 | --  | ND      | 0.606 | --  |           | 1               |
| 1,1-Dichloroethene                       | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| Tertiary butyl Alcohol                   | ND      | 0.500 | --  | ND      | 1.52  | --  |           | 1               |
| Methylene chloride                       | ND      | 0.500 | --  | ND      | 1.74  | --  |           | 1               |



**Project Name:** BATCH CANISTER CERTIFICATION**Lab Number:** L1728360**Project Number:** CANISTER QC BAT**Report Date:** 02/19/18**Air Canister Certification Results**

Lab ID: L1728360-01

Date Collected: 08/14/17 16:00

Client ID: CAN 149 SHELF 1

Date Received: 08/15/17

Sample Location:

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| 3-Chloropropene                          | ND      | 0.200 | --  | ND      | 0.626 | --  |           | 1               |
| Carbon disulfide                         | ND      | 0.200 | --  | ND      | 0.623 | --  |           | 1               |
| Freon-113                                | ND      | 0.200 | --  | ND      | 1.53  | --  |           | 1               |
| trans-1,2-Dichloroethene                 | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 1,1-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| Methyl tert butyl ether                  | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| Vinyl acetate                            | ND      | 1.00  | --  | ND      | 3.52  | --  |           | 1               |
| 2-Butanone                               | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| cis-1,2-Dichloroethene                   | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| Ethyl Acetate                            | ND      | 0.500 | --  | ND      | 1.80  | --  |           | 1               |
| Chloroform                               | ND      | 0.200 | --  | ND      | 0.977 | --  |           | 1               |
| Tetrahydrofuran                          | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| 2,2-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| 1,2-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| n-Hexane                                 | ND      | 0.200 | --  | ND      | 0.705 | --  |           | 1               |
| Diisopropyl ether                        | ND      | 0.200 | --  | ND      | 0.836 | --  |           | 1               |
| tert-Butyl Ethyl Ether                   | ND      | 0.200 | --  | ND      | 0.836 | --  |           | 1               |
| 1,1,1-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| 1,1-Dichloropropene                      | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| Benzene                                  | ND      | 0.200 | --  | ND      | 0.639 | --  |           | 1               |
| Carbon tetrachloride                     | ND      | 0.200 | --  | ND      | 1.26  | --  |           | 1               |
| Cyclohexane                              | ND      | 0.200 | --  | ND      | 0.688 | --  |           | 1               |
| tert-Amyl Methyl Ether                   | ND      | 0.200 | --  | ND      | 0.836 | --  |           | 1               |
| Dibromomethane                           | ND      | 0.200 | --  | ND      | 1.42  | --  |           | 1               |
| 1,2-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| Bromodichloromethane                     | ND      | 0.200 | --  | ND      | 1.34  | --  |           | 1               |
| 1,4-Dioxane                              | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| Trichloroethene                          | ND      | 0.200 | --  | ND      | 1.07  | --  |           | 1               |



**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1728360  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1728360-01  
**Client ID:** CAN 149 SHELF 1  
**Sample Location:**  
**Sample Depth:**

**Date Collected:** 08/14/17 16:00  
**Date Received:** 08/15/17  
**Field Prep:** Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| 2,2,4-Trimethylpentane                   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Methyl Methacrylate                      | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| Heptane                                  | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| cis-1,3-Dichloropropene                  | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 4-Methyl-2-pentanone                     | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene                | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 1,1,2-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| Toluene                                  | ND      | 0.200 | --  | ND      | 0.754 | --  |           | 1               |
| 1,3-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| 2-Hexanone                               | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| Dibromochloromethane                     | ND      | 0.200 | --  | ND      | 1.70  | --  |           | 1               |
| 1,2-Dibromoethane                        | ND      | 0.200 | --  | ND      | 1.54  | --  |           | 1               |
| Butyl acetate                            | ND      | 0.500 | --  | ND      | 2.38  | --  |           | 1               |
| Octane                                   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Tetrachloroethene                        | ND      | 0.200 | --  | ND      | 1.36  | --  |           | 1               |
| 1,1,1,2-Tetrachloroethane                | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |
| Chlorobenzene                            | ND      | 0.200 | --  | ND      | 0.921 | --  |           | 1               |
| Ethylbenzene                             | ND      | 0.200 | --  | ND      | 0.869 | --  |           | 1               |
| p/m-Xylene                               | ND      | 0.400 | --  | ND      | 1.74  | --  |           | 1               |
| Bromoform                                | ND      | 0.200 | --  | ND      | 2.07  | --  |           | 1               |
| Styrene                                  | ND      | 0.200 | --  | ND      | 0.852 | --  |           | 1               |
| 1,1,2,2-Tetrachloroethane                | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |
| o-Xylene                                 | ND      | 0.200 | --  | ND      | 0.869 | --  |           | 1               |
| 1,2,3-Trichloropropane                   | ND      | 0.200 | --  | ND      | 1.21  | --  |           | 1               |
| Nonane                                   | ND      | 0.200 | --  | ND      | 1.05  | --  |           | 1               |
| Isopropylbenzene                         | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| Bromobenzene                             | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 2-Chlorotoluene                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |



**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1728360  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1728360-01  
**Client ID:** CAN 149 SHELF 1  
**Sample Location:**  
**Sample Depth:**

**Date Collected:** 08/14/17 16:00  
**Date Received:** 08/15/17  
**Field Prep:** Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| n-Propylbenzene                          | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 4-Chlorotoluene                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| 4-Ethyltoluene                           | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,3,5-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| tert-Butylbenzene                        | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2,4-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| Decane                                   | ND      | 0.200 | --  | ND      | 1.16  | --  |           | 1               |
| Benzyl chloride                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| 1,3-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| 1,4-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| sec-Butylbenzene                         | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| p-Isopropyltoluene                       | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| n-Butylbenzene                           | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2-Dibromo-3-chloropropane              | ND      | 0.200 | --  | ND      | 1.93  | --  |           | 1               |
| Undecane                                 | ND      | 0.200 | --  | ND      | 1.28  | --  |           | 1               |
| Dodecane                                 | ND      | 0.200 | --  | ND      | 1.39  | --  |           | 1               |
| 1,2,4-Trichlorobenzene                   | ND      | 0.200 | --  | ND      | 1.48  | --  |           | 1               |
| Naphthalene                              | ND      | 0.200 | --  | ND      | 1.05  | --  |           | 1               |
| 1,2,3-Trichlorobenzene                   | ND      | 0.200 | --  | ND      | 1.48  | --  |           | 1               |
| Hexachlorobutadiene                      | ND      | 0.200 | --  | ND      | 2.13  | --  |           | 1               |

| Results                             | Qualifier | Units | RDL | Dilution Factor |
|-------------------------------------|-----------|-------|-----|-----------------|
| Tentatively Identified Compounds    |           |       |     |                 |
| No Tentatively Identified Compounds |           |       |     |                 |



**Project Name:** BATCH CANISTER CERTIFICATION**Lab Number:** L1728360**Project Number:** CANISTER QC BAT**Report Date:** 02/19/18**Air Canister Certification Results**

Lab ID: L1728360-01

Date Collected: 08/14/17 16:00

Client ID: CAN 149 SHELF 1

Date Received: 08/15/17

Sample Location:

Field Prep: Not Specified

Sample Depth:

| Parameter                                | ppbV    |    |     | ug/m3   |    |     | Qualifier | Dilution Factor |
|--|---------|----|-----|---------|----|-----|-----------|-----------------|
|  | Results | RL | MDL | Results | RL | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |    |     |         |    |     |           |                 |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-Difluorobenzene | 87         |           | 60-140              |
| Bromochloromethane  | 90         |           | 60-140              |
| chlorobenzene-d5    | 90         |           | 60-140              |

**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1728360  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1728360-01  
**Client ID:** CAN 149 SHELF 1  
**Sample Location:**  
**Sample Depth:**  
**Matrix:** Air  
**Analytical Method:** 48,TO-15-SIM  
**Analytical Date:** 08/15/17 11:44  
**Analyst:** MB

**Date Collected:** 08/14/17 16:00  
**Date Received:** 08/15/17  
**Field Prep:** Not Specified

| Parameter                                       | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|---|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|   | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Dichlorodifluoromethane                         | ND      | 0.200 | --  | ND      | 0.989 | --  |           | 1               |
| Chloromethane                                   | ND      | 0.200 | --  | ND      | 0.413 | --  |           | 1               |
| Freon-114                                       | ND      | 0.050 | --  | ND      | 0.349 | --  |           | 1               |
| Vinyl chloride                                  | ND      | 0.020 | --  | ND      | 0.051 | --  |           | 1               |
| 1,3-Butadiene                                   | ND      | 0.020 | --  | ND      | 0.044 | --  |           | 1               |
| Bromomethane                                    | ND      | 0.020 | --  | ND      | 0.078 | --  |           | 1               |
| Chloroethane                                    | ND      | 0.020 | --  | ND      | 0.053 | --  |           | 1               |
| Acetone   | ND      | 1.00  | --  | ND      | 2.38  | --  |           | 1               |
| Trichlorofluoromethane                          | ND      | 0.050 | --  | ND      | 0.281 | --  |           | 1               |
| Acrylonitrile                                   | ND      | 0.500 | --  | ND      | 1.09  | --  |           | 1               |
| 1,1-Dichloroethene                              | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| Methylene chloride                              | ND      | 0.500 | --  | ND      | 1.74  | --  |           | 1               |
| Freon-113                                       | ND      | 0.050 | --  | ND      | 0.383 | --  |           | 1               |
| Halothane                                       | ND      | 0.050 | --  | ND      | 0.404 | --  |           | 1               |
| trans-1,2-Dichloroethene                        | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| 1,1-Dichloroethane                              | ND      | 0.020 | --  | ND      | 0.081 | --  |           | 1               |
| Methyl tert butyl ether                         | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| 2-Butanone                                      | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| cis-1,2-Dichloroethene                          | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| Chloroform                                      | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| 1,2-Dichloroethane                              | ND      | 0.020 | --  | ND      | 0.081 | --  |           | 1               |
| 1,1,1-Trichloroethane                           | ND      | 0.020 | --  | ND      | 0.109 | --  |           | 1               |
| Benzene   | ND      | 0.100 | --  | ND      | 0.319 | --  |           | 1               |
| Carbon tetrachloride                            | ND      | 0.020 | --  | ND      | 0.126 | --  |           | 1               |
| 1,2-Dichloropropane                             | ND      | 0.020 | --  | ND      | 0.092 | --  |           | 1               |





**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1728360  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1728360-01  
**Client ID:** CAN 149 SHELF 1  
**Sample Location:**  
**Sample Depth:**

**Date Collected:** 08/14/17 16:00  
**Date Received:** 08/15/17  
**Field Prep:** Not Specified

| Parameter                                       | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|---|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|   | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Bromodichloromethane                            | ND      | 0.020 | --  | ND      | 0.134 | --  |           | 1               |
| 1,4-Dioxane                                     | ND      | 0.100 | --  | ND      | 0.360 | --  |           | 1               |
| Trichloroethene                                 | ND      | 0.020 | --  | ND      | 0.107 | --  |           | 1               |
| cis-1,3-Dichloropropene                         | ND      | 0.020 | --  | ND      | 0.091 | --  |           | 1               |
| 4-Methyl-2-pentanone                            | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene                       | ND      | 0.020 | --  | ND      | 0.091 | --  |           | 1               |
| 1,1,2-Trichloroethane                           | ND      | 0.020 | --  | ND      | 0.109 | --  |           | 1               |
| Toluene   | ND      | 0.050 | --  | ND      | 0.188 | --  |           | 1               |
| Dibromochloromethane                            | ND      | 0.020 | --  | ND      | 0.170 | --  |           | 1               |
| 1,2-Dibromoethane                               | ND      | 0.020 | --  | ND      | 0.154 | --  |           | 1               |
| Tetrachloroethene                               | ND      | 0.020 | --  | ND      | 0.136 | --  |           | 1               |
| 1,1,1,2-Tetrachloroethane                       | ND      | 0.020 | --  | ND      | 0.137 | --  |           | 1               |
| Chlorobenzene                                   | ND      | 0.100 | --  | ND      | 0.461 | --  |           | 1               |
| Ethylbenzene                                    | ND      | 0.020 | --  | ND      | 0.087 | --  |           | 1               |
| p/m-Xylene                                      | ND      | 0.040 | --  | ND      | 0.174 | --  |           | 1               |
| Bromoform                                       | ND      | 0.020 | --  | ND      | 0.207 | --  |           | 1               |
| Styrene   | ND      | 0.020 | --  | ND      | 0.085 | --  |           | 1               |
| 1,1,2,2-Tetrachloroethane                       | ND      | 0.020 | --  | ND      | 0.137 | --  |           | 1               |
| o-Xylene  | ND      | 0.020 | --  | ND      | 0.087 | --  |           | 1               |
| Isopropylbenzene                                | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 4-Ethyltoluene                                  | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| 1,3,5-Trimethybenzene                           | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| 1,2,4-Trimethylbenzene                          | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| Benzyl chloride                                 | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| 1,3-Dichlorobenzene                             | ND      | 0.020 | --  | ND      | 0.120 | --  |           | 1               |
| 1,4-Dichlorobenzene                             | ND      | 0.020 | --  | ND      | 0.120 | --  |           | 1               |
| sec-Butylbenzene                                | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| p-Isopropyltoluene                              | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |



**Project Name:** BATCH CANISTER CERTIFICATION**Lab Number:** L1728360**Project Number:** CANISTER QC BAT**Report Date:** 02/19/18**Air Canister Certification Results**

Lab ID: L1728360-01

Date Collected: 08/14/17 16:00

Client ID: CAN 149 SHELF 1

Date Received: 08/15/17

Sample Location:

Field Prep: Not Specified

Sample Depth:

| Parameter                                       | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|---|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|   | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab |         |       |     |         |       |     |           |                 |
| 1,2-Dichlorobenzene                             | ND      | 0.020 | --  | ND      | 0.120 | --  |           | 1               |
| n-Butylbenzene                                  | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2,4-Trichlorobenzene                          | ND      | 0.050 | --  | ND      | 0.371 | --  |           | 1               |
| Naphthalene                                     | ND      | 0.050 | --  | ND      | 0.262 | --  |           | 1               |
| 1,2,3-Trichlorobenzene                          | ND      | 0.050 | --  | ND      | 0.371 | --  |           | 1               |
| Hexachlorobutadiene                             | ND      | 0.050 | --  | ND      | 0.533 | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-difluorobenzene | 84         |           | 60-140              |
| bromochloromethane  | 86         |           | 60-140              |
| chlorobenzene-d5    | 86         |           | 60-140              |



**Project Name:** BATCH CANISTER CERTIFICATION**Lab Number:** L1803067**Project Number:** CANISTER QC BAT**Report Date:** 02/19/18**Air Canister Certification Results**

**Lab ID:** L1803067-02  
**Client ID:** CAN 2274 SHELF 43  
**Sample Location:**  
**Sample Depth:**  
**Matrix:** Air  
**Analytical Method:** 48,TO-15  
**Analytical Date:** 01/29/18 15:20  
**Analyst:** MB

**Date Collected:** 01/26/18 16:00  
**Date Received:** 01/29/18  
**Field Prep:** Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Chlorodifluoromethane                    | ND      | 0.200 | --  | ND      | 0.707 | --  |           | 1               |
| Propylene                                | ND      | 0.500 | --  | ND      | 0.861 | --  |           | 1               |
| Propane                                  | ND      | 0.500 | --  | ND      | 0.902 | --  |           | 1               |
| Dichlorodifluoromethane                  | ND      | 0.200 | --  | ND      | 0.989 | --  |           | 1               |
| Chloromethane                            | ND      | 0.200 | --  | ND      | 0.413 | --  |           | 1               |
| Freon-114                                | ND      | 0.200 | --  | ND      | 1.40  | --  |           | 1               |
| Methanol                                 | ND      | 5.00  | --  | ND      | 6.55  | --  |           | 1               |
| Vinyl chloride                           | ND      | 0.200 | --  | ND      | 0.511 | --  |           | 1               |
| 1,3-Butadiene                            | ND      | 0.200 | --  | ND      | 0.442 | --  |           | 1               |
| Butane                                   | ND      | 0.200 | --  | ND      | 0.475 | --  |           | 1               |
| Bromomethane                             | ND      | 0.200 | --  | ND      | 0.777 | --  |           | 1               |
| Chloroethane                             | ND      | 0.200 | --  | ND      | 0.528 | --  |           | 1               |
| Ethanol                                  | ND      | 5.00  | --  | ND      | 9.42  | --  |           | 1               |
| Dichlorofluoromethane                    | ND      | 0.200 | --  | ND      | 0.842 | --  |           | 1               |
| Vinyl bromide                            | ND      | 0.200 | --  | ND      | 0.874 | --  |           | 1               |
| Acrolein                                 | ND      | 0.500 | --  | ND      | 1.15  | --  |           | 1               |
| Acetone                                  | ND      | 1.00  | --  | ND      | 2.38  | --  |           | 1               |
| Acetonitrile                             | ND      | 0.200 | --  | ND      | 0.336 | --  |           | 1               |
| Trichlorofluoromethane                   | ND      | 0.200 | --  | ND      | 1.12  | --  |           | 1               |
| Isopropanol                              | ND      | 0.500 | --  | ND      | 1.23  | --  |           | 1               |
| Acrylonitrile                            | ND      | 0.500 | --  | ND      | 1.09  | --  |           | 1               |
| Pentane                                  | ND      | 0.200 | --  | ND      | 0.590 | --  |           | 1               |
| Ethyl ether                              | ND      | 0.200 | --  | ND      | 0.606 | --  |           | 1               |
| 1,1-Dichloroethene                       | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| Tertiary butyl Alcohol                   | ND      | 0.500 | --  | ND      | 1.52  | --  |           | 1               |



**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1803067  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1803067-02  
**Client ID:** CAN 2274 SHELF 43  
**Sample Location:**  
**Sample Depth:**

**Date Collected:** 01/26/18 16:00  
**Date Received:** 01/29/18  
**Field Prep:** Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Methylene chloride                       | ND      | 0.500 | --  | ND      | 1.74  | --  |           | 1               |
| 3-Chloropropene                          | ND      | 0.200 | --  | ND      | 0.626 | --  |           | 1               |
| Carbon disulfide                         | ND      | 0.200 | --  | ND      | 0.623 | --  |           | 1               |
| Freon-113                                | ND      | 0.200 | --  | ND      | 1.53  | --  |           | 1               |
| trans-1,2-Dichloroethene                 | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 1,1-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| Methyl tert butyl ether                  | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| Vinyl acetate                            | ND      | 1.00  | --  | ND      | 3.52  | --  |           | 1               |
| 2-Butanone                               | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| cis-1,2-Dichloroethene                   | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| Ethyl Acetate                            | ND      | 0.500 | --  | ND      | 1.80  | --  |           | 1               |
| Chloroform                               | ND      | 0.200 | --  | ND      | 0.977 | --  |           | 1               |
| Tetrahydrofuran                          | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| 2,2-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| 1,2-Dichloroethane                       | ND      | 0.200 | --  | ND      | 0.809 | --  |           | 1               |
| n-Hexane                                 | ND      | 0.200 | --  | ND      | 0.705 | --  |           | 1               |
| Diisopropyl ether                        | ND      | 0.200 | --  | ND      | 0.836 | --  |           | 1               |
| 1,1,1-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| 1,1-Dichloropropene                      | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| Benzene                                  | ND      | 0.200 | --  | ND      | 0.639 | --  |           | 1               |
| Carbon tetrachloride                     | ND      | 0.200 | --  | ND      | 1.26  | --  |           | 1               |
| Cyclohexane                              | ND      | 0.200 | --  | ND      | 0.688 | --  |           | 1               |
| Dibromomethane                           | ND      | 0.200 | --  | ND      | 1.42  | --  |           | 1               |
| 1,2-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| Bromodichloromethane                     | ND      | 0.200 | --  | ND      | 1.34  | --  |           | 1               |
| 1,4-Dioxane                              | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| Trichloroethene                          | ND      | 0.200 | --  | ND      | 1.07  | --  |           | 1               |
| 2,2,4-Trimethylpentane                   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |



**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1803067  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1803067-02  
**Client ID:** CAN 2274 SHELF 43  
**Sample Location:**  
**Sample Depth:**

**Date Collected:** 01/26/18 16:00  
**Date Received:** 01/29/18  
**Field Prep:** Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Methyl Methacrylate                      | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| Heptane                                  | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| cis-1,3-Dichloropropene                  | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 4-Methyl-2-pentanone                     | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene                | ND      | 0.200 | --  | ND      | 0.908 | --  |           | 1               |
| 1,1,2-Trichloroethane                    | ND      | 0.200 | --  | ND      | 1.09  | --  |           | 1               |
| Toluene                                  | ND      | 0.200 | --  | ND      | 0.754 | --  |           | 1               |
| 1,3-Dichloropropane                      | ND      | 0.200 | --  | ND      | 0.924 | --  |           | 1               |
| 2-Hexanone                               | ND      | 0.200 | --  | ND      | 0.820 | --  |           | 1               |
| Dibromochloromethane                     | ND      | 0.200 | --  | ND      | 1.70  | --  |           | 1               |
| 1,2-Dibromoethane                        | ND      | 0.200 | --  | ND      | 1.54  | --  |           | 1               |
| Butyl acetate                            | ND      | 0.500 | --  | ND      | 2.38  | --  |           | 1               |
| Octane                                   | ND      | 0.200 | --  | ND      | 0.934 | --  |           | 1               |
| Tetrachloroethene                        | ND      | 0.200 | --  | ND      | 1.36  | --  |           | 1               |
| 1,1,1,2-Tetrachloroethane                | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |
| Chlorobenzene                            | ND      | 0.200 | --  | ND      | 0.921 | --  |           | 1               |
| Ethylbenzene                             | ND      | 0.200 | --  | ND      | 0.869 | --  |           | 1               |
| p/m-Xylene                               | ND      | 0.400 | --  | ND      | 1.74  | --  |           | 1               |
| Bromoform                                | ND      | 0.200 | --  | ND      | 2.07  | --  |           | 1               |
| Styrene                                  | ND      | 0.200 | --  | ND      | 0.852 | --  |           | 1               |
| 1,1,1,2-Tetrachloroethane                | ND      | 0.200 | --  | ND      | 1.37  | --  |           | 1               |
| o-Xylene                                 | ND      | 0.200 | --  | ND      | 0.869 | --  |           | 1               |
| 1,2,3-Trichloropropane                   | ND      | 0.200 | --  | ND      | 1.21  | --  |           | 1               |
| Nonane                                   | ND      | 0.200 | --  | ND      | 1.05  | --  |           | 1               |
| Isopropylbenzene                         | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| Bromobenzene                             | ND      | 0.200 | --  | ND      | 0.793 | --  |           | 1               |
| 2-Chlorotoluene                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| n-Propylbenzene                          | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |



**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1803067  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1803067-02  
**Client ID:** CAN 2274 SHELF 43  
**Sample Location:**  
**Sample Depth:**

**Date Collected:** 01/26/18 16:00  
**Date Received:** 01/29/18  
**Field Prep:** Not Specified

| Parameter                                | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|--|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|  | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air - Mansfield Lab |         |       |     |         |       |     |           |                 |
| 4-Chlorotoluene                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| 4-Ethyltoluene                           | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 1,3,5-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| tert-Butylbenzene                        | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2,4-Trimethylbenzene                   | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| Decane                                   | ND      | 0.200 | --  | ND      | 1.16  | --  |           | 1               |
| Benzyl chloride                          | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| 1,3-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| 1,4-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| sec-Butylbenzene                         | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| p-Isopropyltoluene                       | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2-Dichlorobenzene                      | ND      | 0.200 | --  | ND      | 1.20  | --  |           | 1               |
| n-Butylbenzene                           | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2-Dibromo-3-chloropropane              | ND      | 0.200 | --  | ND      | 1.93  | --  |           | 1               |
| Undecane                                 | ND      | 0.200 | --  | ND      | 1.28  | --  |           | 1               |
| Dodecane                                 | ND      | 0.200 | --  | ND      | 1.39  | --  |           | 1               |
| 1,2,4-Trichlorobenzene                   | ND      | 0.200 | --  | ND      | 1.48  | --  |           | 1               |
| Naphthalene                              | ND      | 0.200 | --  | ND      | 1.05  | --  |           | 1               |
| 1,2,3-Trichlorobenzene                   | ND      | 0.200 | --  | ND      | 1.48  | --  |           | 1               |
| Hexachlorobutadiene                      | ND      | 0.200 | --  | ND      | 2.13  | --  |           | 1               |

| Results                          | Qualifier | Units | RDL | Dilution Factor |
|----------------------------------|-----------|-------|-----|-----------------|
| Tentatively Identified Compounds |           |       |     |                 |

No Tentatively Identified Compounds

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-Difluorobenzene | 92         |           | 60-140              |



**Project Name:** BATCH CANISTER CERTIFICATION**Lab Number:** L1803067**Project Number:** CANISTER QC BAT**Report Date:** 02/19/18**Air Canister Certification Results**

**Lab ID:** L1803067-02  
**Client ID:** CAN 2274 SHELF 43  
**Sample Location:**  
**Sample Depth:**  
**Matrix:** Air  
**Analytical Method:** 48,TO-15-SIM  
**Analytical Date:** 01/29/18 15:20  
**Analyst:** MB

**Date Collected:** 01/26/18 16:00  
**Date Received:** 01/29/18  
**Field Prep:** Not Specified

| Parameter                                       | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|---|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|   | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab |         |       |     |         |       |     |           |                 |
| Dichlorodifluoromethane                         | ND      | 0.200 | --  | ND      | 0.989 | --  |           | 1               |
| Chloromethane                                   | ND      | 0.200 | --  | ND      | 0.413 | --  |           | 1               |
| Freon-114                                       | ND      | 0.050 | --  | ND      | 0.349 | --  |           | 1               |
| Vinyl chloride                                  | ND      | 0.020 | --  | ND      | 0.051 | --  |           | 1               |
| 1,3-Butadiene                                   | ND      | 0.020 | --  | ND      | 0.044 | --  |           | 1               |
| Bromomethane                                    | ND      | 0.020 | --  | ND      | 0.078 | --  |           | 1               |
| Chloroethane                                    | ND      | 0.100 | --  | ND      | 0.264 | --  |           | 1               |
| Acetone   | ND      | 1.00  | --  | ND      | 2.38  | --  |           | 1               |
| Trichlorofluoromethane                          | ND      | 0.050 | --  | ND      | 0.281 | --  |           | 1               |
| Acrylonitrile                                   | ND      | 0.500 | --  | ND      | 1.09  | --  |           | 1               |
| 1,1-Dichloroethene                              | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| Methylene chloride                              | ND      | 0.500 | --  | ND      | 1.74  | --  |           | 1               |
| Freon-113                                       | ND      | 0.050 | --  | ND      | 0.383 | --  |           | 1               |
| trans-1,2-Dichloroethene                        | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| 1,1-Dichloroethane                              | ND      | 0.020 | --  | ND      | 0.081 | --  |           | 1               |
| Methyl tert butyl ether                         | ND      | 0.200 | --  | ND      | 0.721 | --  |           | 1               |
| 2-Butanone                                      | ND      | 0.500 | --  | ND      | 1.47  | --  |           | 1               |
| cis-1,2-Dichloroethene                          | ND      | 0.020 | --  | ND      | 0.079 | --  |           | 1               |
| Chloroform                                      | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| 1,2-Dichloroethane                              | ND      | 0.020 | --  | ND      | 0.081 | --  |           | 1               |
| 1,1,1-Trichloroethane                           | ND      | 0.020 | --  | ND      | 0.109 | --  |           | 1               |
| Benzene   | ND      | 0.100 | --  | ND      | 0.319 | --  |           | 1               |
| Carbon tetrachloride                            | ND      | 0.020 | --  | ND      | 0.126 | --  |           | 1               |
| 1,2-Dichloropropane                             | ND      | 0.020 | --  | ND      | 0.092 | --  |           | 1               |
| Bromodichloromethane                            | ND      | 0.020 | --  | ND      | 0.134 | --  |           | 1               |



**Project Name:** BATCH CANISTER CERTIFICATION  
**Project Number:** CANISTER QC BAT

**Lab Number:** L1803067  
**Report Date:** 02/19/18

### Air Canister Certification Results

**Lab ID:** L1803067-02  
**Client ID:** CAN 2274 SHELF 43  
**Sample Location:**  
**Sample Depth:**

**Date Collected:** 01/26/18 16:00  
**Date Received:** 01/29/18  
**Field Prep:** Not Specified

| Parameter                                       | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|---|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|   | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab |         |       |     |         |       |     |           |                 |
| 1,4-Dioxane                                     | ND      | 0.100 | --  | ND      | 0.360 | --  |           | 1               |
| Trichloroethene                                 | ND      | 0.020 | --  | ND      | 0.107 | --  |           | 1               |
| cis-1,3-Dichloropropene                         | ND      | 0.020 | --  | ND      | 0.091 | --  |           | 1               |
| 4-Methyl-2-pentanone                            | ND      | 0.500 | --  | ND      | 2.05  | --  |           | 1               |
| trans-1,3-Dichloropropene                       | ND      | 0.020 | --  | ND      | 0.091 | --  |           | 1               |
| 1,1,2-Trichloroethane                           | ND      | 0.020 | --  | ND      | 0.109 | --  |           | 1               |
| Toluene   | ND      | 0.050 | --  | ND      | 0.188 | --  |           | 1               |
| Dibromochloromethane                            | ND      | 0.020 | --  | ND      | 0.170 | --  |           | 1               |
| 1,2-Dibromoethane                               | ND      | 0.020 | --  | ND      | 0.154 | --  |           | 1               |
| Tetrachloroethene                               | ND      | 0.020 | --  | ND      | 0.136 | --  |           | 1               |
| 1,1,1,2-Tetrachloroethane                       | ND      | 0.020 | --  | ND      | 0.137 | --  |           | 1               |
| Chlorobenzene                                   | ND      | 0.100 | --  | ND      | 0.461 | --  |           | 1               |
| Ethylbenzene                                    | ND      | 0.020 | --  | ND      | 0.087 | --  |           | 1               |
| p/m-Xylene                                      | ND      | 0.040 | --  | ND      | 0.174 | --  |           | 1               |
| Bromoform                                       | ND      | 0.020 | --  | ND      | 0.207 | --  |           | 1               |
| Styrene   | ND      | 0.020 | --  | ND      | 0.085 | --  |           | 1               |
| 1,1,2,2-Tetrachloroethane                       | ND      | 0.020 | --  | ND      | 0.137 | --  |           | 1               |
| o-Xylene  | ND      | 0.020 | --  | ND      | 0.087 | --  |           | 1               |
| Isopropylbenzene                                | ND      | 0.200 | --  | ND      | 0.983 | --  |           | 1               |
| 4-Ethyltoluene                                  | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| 1,3,5-Trimethybenzene                           | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| 1,2,4-Trimethylbenzene                          | ND      | 0.020 | --  | ND      | 0.098 | --  |           | 1               |
| Benzyl chloride                                 | ND      | 0.200 | --  | ND      | 1.04  | --  |           | 1               |
| 1,3-Dichlorobenzene                             | ND      | 0.020 | --  | ND      | 0.120 | --  |           | 1               |
| 1,4-Dichlorobenzene                             | ND      | 0.020 | --  | ND      | 0.120 | --  |           | 1               |
| sec-Butylbenzene                                | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| p-Isopropyltoluene                              | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2-Dichlorobenzene                             | ND      | 0.020 | --  | ND      | 0.120 | --  |           | 1               |





**Project Name:** BATCH CANISTER CERTIFICATION**Lab Number:** L1803067**Project Number:** CANISTER QC BAT**Report Date:** 02/19/18**Air Canister Certification Results**

Lab ID: L1803067-02

Date Collected: 01/26/18 16:00

Client ID: CAN 2274 SHELF 43

Date Received: 01/29/18

Sample Location:

Field Prep: Not Specified

Sample Depth:

| Parameter                                       | ppbV    |       |     | ug/m3   |       |     | Qualifier | Dilution Factor |
|---|---------|-------|-----|---------|-------|-----|-----------|-----------------|
|   | Results | RL    | MDL | Results | RL    | MDL |           |                 |
| Volatile Organics in Air by SIM - Mansfield Lab |         |       |     |         |       |     |           |                 |
| n-Butylbenzene                                  | ND      | 0.200 | --  | ND      | 1.10  | --  |           | 1               |
| 1,2,4-Trichlorobenzene                          | ND      | 0.050 | --  | ND      | 0.371 | --  |           | 1               |
| Naphthalene                                     | ND      | 0.050 | --  | ND      | 0.262 | --  |           | 1               |
| 1,2,3-Trichlorobenzene                          | ND      | 0.050 | --  | ND      | 0.371 | --  |           | 1               |
| Hexachlorobutadiene                             | ND      | 0.050 | --  | ND      | 0.533 | --  |           | 1               |

| Internal Standard   | % Recovery | Qualifier | Acceptance Criteria |
|---------------------|------------|-----------|---------------------|
| 1,4-difluorobenzene | 94         |           | 60-140              |
| bromochloromethane  | 96         |           | 60-140              |
| chlorobenzene-d5    | 92         |           | 60-140              |

**Project Name:** MAIN & EAST BALCOM STREET SITE**Lab Number:** L1804819**Project Number:** B0239-016-001-004**Report Date:** 02/19/18**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

**Cooler Information**

|               |                     |
|---------------|---------------------|
| <b>Cooler</b> | <b>Custody Seal</b> |
| NA            | Absent              |

**Container Information**

| <b>Container ID</b> | <b>Container Type</b> | <b>Cooler</b> | <b>Initial<br/>pH</b> | <b>Final<br/>pH</b> | <b>Temp<br/>deg C</b> | <b>Pres</b> | <b>Seal</b> | <b>Frozen<br/>Date/Time</b> | <b>Analysis(*)</b>       |
|---------------------|-----------------------|---------------|-----------------------|---------------------|-----------------------|-------------|-------------|-----------------------------|--------------------------|
| L1804819-01A        | Canister - 6 Liter    | NA            | NA                    |                     |                       | Y           | Absent      |                             | TO15-LL(30)              |
| L1804819-02A        | Canister - 6 Liter    | NA            | NA                    |                     |                       | Y           | Absent      |                             | TO15-LL(30)              |
| L1804819-03A        | Canister - 6 Liter    | NA            | NA                    |                     |                       | Y           | Absent      |                             | TO15-LL(30),TO15-SIM(30) |
| L1804819-04A        | Canister - 6 Liter    | NA            | NA                    |                     |                       | Y           | Absent      |                             | TO15-LL(30)              |
| L1804819-05A        | Canister - 6 Liter    | NA            | NA                    |                     |                       | Y           | Absent      |                             | TO15-LL(30),TO15-SIM(30) |
| L1804819-06A        | Canister - 6 Liter    | NA            | NA                    |                     |                       | Y           | Absent      |                             | TO15-LL(30),TO15-SIM(30) |
| L1804819-07A        | Canister - 6 Liter    | NA            | NA                    |                     |                       | Y           | Absent      |                             | TO15-LL(30),TO15-SIM(30) |
| L1804819-08A        | Canister - 2.7 Liter  | NA            | NA                    |                     |                       | Y           | Absent      |                             | CLEAN-FEE()              |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1804819  
**Report Date:** 02/19/18

## GLOSSARY

### Acronyms

|          |   |
|----------|---|
| EDL      | - Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).                        |
| EPA      | - Environmental Protection Agency.  |
| LCS      | - Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.   |
| LCSD     | - Laboratory Control Sample Duplicate: Refer to LCS.  |
| LFB      | - Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.  |
| MDL      | - Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.   |
| MS       | - Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.  |
| MSD      | - Matrix Spike Sample Duplicate: Refer to MS.   |
| NA       | - Not Applicable.   |
| NC       | - Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.  |
| NDPA/DPA | - N-Nitrosodiphenylamine/Diphenylamine.   |
| NI       | - Not Ignitable.  |
| NP       | - Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.   |
| RL       | - Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.  |
| RPD      | - Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report. |
| SRM      | - Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.  |
| STLP     | - Semi-dynamic Tank Leaching Procedure per EPA Method 1315.   |
| TIC      | - Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.   |

### Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

### Terms

**Analytical Method:** Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

**Final pH:** As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

**Frozen Date/Time:** With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

**Initial pH:** As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

**Total:** With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

### Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related

**Report Format:** Data Usability Report



**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1804819  
**Report Date:** 02/19/18

#### Data Qualifiers

projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).

- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the reporting limit (RL) for the sample.

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1804819  
**Report Date:** 02/19/18

## REFERENCES

- 48 Compendium of Methods for the Determination of Toxic Organic Compounds in Ambient Air. Second Edition. EPA/625/R-96/010b, January 1999.

## LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



## Certification Information

The following analytes are not included in our Primary NELAP Scope of Accreditation:

### Westborough Facility

**EPA 624:** m/p-xylene, o-xylene

**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.

**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.

**EPA 300:** DW: Bromide

**EPA 6860:** SCM: Perchlorate

**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation

**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO<sub>2</sub>, NO<sub>3</sub>.

### Mansfield Facility

**SM 2540D:** TSS

**EPA 8082A:** NPW: PCB: 1, 5, 31, 87,101, 110, 141, 151, 153, 180, 183, 187.

**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.

**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

### Westborough Facility:

#### Drinking Water

**EPA 300.0:** Chloride, Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE,**

**EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B**

**EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.

**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.**

#### Non-Potable Water

**SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH:** Ammonia-N and Kjeldahl-N, **EPA 350.1:**

Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **EPA 351.1, SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E,**

**SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.**

**EPA 624:** Volatile Halocarbons & Aromatics,

**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs

**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.

**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E, SM9222D.**

### Mansfield Facility:

#### Drinking Water

**EPA 200.7:** Al, Ba, Be, Cd, Cr, Cu, Mn, Ni, Na, Ag, Ca, Zn. **EPA 200.8:** Al, Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn. **EPA 245.1 Hg.**

**EPA 522.**

#### Non-Potable Water

**EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.

**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.

**EPA 245.1 Hg.**

**SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.



## AIR ANALYSIS

PAGE 1 OF 1



## CHAIN OF CUSTODY

320 Forbes Blvd, Mansfield, MA 02048  
TEL: 508-822-9300 FAX: 508-822-3288

## Client Information

Client: Benchmark EES  
Address: 2558 Humley Trl  
Buffalo, NY, 14218  
Phone: 716-713-3437

Fax:

Email: NMonley@Turnkeyllc.com☐ These samples have been previously analyzed by AlphaOther Project Specific Requirements/Comments: NO BODILYProject-Specific Target Compound List: ☐

## Project Information

Project Name: Main & East Bulwary St Site  
Project Location: Buffalo, NY  
Project #: B0239-016-001-004-005  
Project Manager: Nate Monley  
ALPHA Quote #:

## Turn-Around Time

☒ Standard ☐ RUSH (only confirmed if pre-approved)

Date Due:

Time:

Date Rec'd in Lab: 2/13/18

## Report Information - Data Deliverables

- ☐ FAX  
☐ ADEX

Criteria Checker:

(Default based on Regulatory Criteria Indicated)

Other Formats:

- ☐
- EMAIL (standard pdf report)

- ☒
- Additional Deliverables:

Category B

Report to: (if different than Project Manager)

ALPHA Job #: L1804819

## Billing Information

☐ Same as Client info PO #:

## Regulatory Requirements/Report Limits

| State/Fed | Program | Res / Comm |
|-----------|---------|------------|
|           |         |            |
|           |         |            |
|           |         |            |
|           |         |            |

## ANALYSIS

☐ TO-15  
☐ TO-15 SIM  
☐ APH  
☐ Substrate Non-petroleum HCs  
☐ Fixed Gases  
☐ Sulfides & Mercaptans by TO-15

## All Columns Below Must Be Filled Out

| ALPHA Lab ID<br>(Lab Use Only) | Sample ID        | COLLECTION |            |          |                |              |    | Sample Matrix* | Sampler's Initials | Can Size | ID Can | ID - Flow Controller | TO-15 | TO-15 SIM | APH | Fixed Gases | Sulfides & Mercaptans by TO-15 |  | Sample Comments (i.e. PID) |
|--------------------------------|------------------|------------|------------|----------|----------------|--------------|----|----------------|--------------------|----------|--------|----------------------|-------|-----------|-----|-------------|--------------------------------|--|----------------------------|
|                                |                  | End Date   | Start Time | End Time | Initial Vacuum | Final Vacuum |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
| 04819-01                       | SSV-1            | 2/12/18    | 12:07      | 5:46     | -24.47         | -8.03        | SV | NAS            | GL                 | 2270     | 0635   |                      | X     |           |     |             |                                |  |                            |
| 02                             | BD               | 2/12/18    | 12:07      | 5:47     | -29.27         | -7.89        | SV | NAS            | GL                 | 2129     | 0334   |                      | X     |           |     |             |                                |  |                            |
| 03                             | Indoor Ambient-1 | 2/12/18    | 12:09      | 5:47     | -29.18         | -8.30        | AA | NAS            | GL                 | 649      | 0868   |                      | X     |           |     |             |                                |  |                            |
| 04                             | SSV-2            | 2/12/18    | 13:06      | 5:50     | -29.70         | -11.82       | SV | NAS            | GL                 | 1709     | 0037   |                      | X     |           |     |             |                                |  |                            |
| 05                             | Ambient-2        | 2/12/18    | 13:05      | 5:49     | -29.02         | -11.40       | AA | NAS            | GL                 | 1780     | 0150   |                      | X     |           |     |             |                                |  |                            |
| 06                             | Ambient-3        | 2/12/18    | 13:14      | 5:43     | -28.95         | -13.35       | AA | NAS            | GL                 | 2275     | 0408   |                      | X     |           |     |             |                                |  |                            |
| 07                             | Outdoor-1        | 2/12/18    | 13:27      | 5:50     | -28.64         | -13.18       | AA | NAS            | GL                 | 1988     | 0237   |                      | X     |           |     |             |                                |  | Tag Fell off Can           |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |
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|                                |                  |            |            |          |                |              |    |                |                    |          |        |                      |       |           |     |             |                                |  |                            |

## \*SAMPLE MATRIX CODES

AA = Ambient Air (Indoor/Outdoor)  
SV = Soil Vapor/Landfill Gas/SVE  
Other = Please Specify

Container Type

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

Relinquished By:

Date/Time

Received By:

Date/Time:

Andrew Tiley  
2/12/18 13:45

2/12/18 13:45  
2/13/18

Andrew Tiley  
2/13/18 0330

2/12/18 13:30  
2/13/18 0100  
2/13/18 330

## APPENDIX E

### DATA USABILITY SUMMARY REPORT (DUSR)



# Data Validation Services

120 Cobble Creek Road P.O. Box 208

North Creek, NY 12853

Phone 518-251-4429

harry@frontiernet.net

March 5, 2018

Nathan Munley  
Turnkey Environmental Restoration  
2558 Hamburg Turnpike Suite 300  
Buffalo, NY 14218

RE: Validation of the Main and East Balcom Street Site Analytical Laboratory Data  
Data Usability Summary Report (DUSR)  
SDG Nos. 480-92593-1, 480-92594-1, L1724381, L1724590, L1733060, L1733355, L1738416,  
L1738668, L1738847, L1741810, L1741813, L1742330, L1804490, L1804815, and  
L1804819

Dear Mr. Munley:

Review has been completed for the data packages generated by TestAmerica Laboratories, Inc. and Alpha Analytical that pertain to samples collected between 12/10/15 and 02/12/18 at the Main and East Balcom Street site. Six soil samples, two soil field duplicates, two aqueous samples, and an aqueous field duplicate were processed for TCL and NYSDEC 6 NYCRR Part 375 CP-51 volatiles, TCL semivolatiles, TCL pesticides, Aroclor PCBs, TCL herbicides, and TAL metals; three of these and a field duplicate were processed for an expanded list of herbicides. Five soil samples were processed for TCL semivolatiles, Aroclor PCBs, and TAL metals. Fourteen soil samples were processed for CP-51 volatiles and CP-51 semivolatiles. Four soil samples were processed for TCL and CP-51 volatiles. Seven soil samples were processed for TCL semivolatiles and RCRA metals; two of them were also processed for TCL volatiles. Five soil samples were processed for TCL Semivolatiles and TAL metals; two of them were also processed for TCL and CP-51 volatiles. One soil sample was processed for TCL volatiles, TCL semivolatiles, and TAL metals. Six 6 L summa canister canisters were processed for volatile analytes. Analytical methodologies utilized are USEPA SW846 and USEPA TO-15.

The data packages submitted by the laboratory contain full deliverables for validation, and this usability report is generated from review of the QC summary form information, with full review of sample raw data and limited review of associated QC raw data. The reported QC summary forms and sample raw data have been reviewed for application of validation qualifiers, with guidance from the USEPA national and regional validation documents, and in consideration for the specific requirements of the analytical methodology. The following items were reviewed:

- \* Data Completeness
- \* Case Narrative
- \* Custody Documentation
- \* Holding Times
- \* Surrogate and Internal Standard Recoveries
- \* Method/ Preparation/Trip Blanks
- \* Matrix Spike Recoveries/Duplicate Correlations
- \* Blind Field Duplicate Correlations

- \* Instrumental Tunes
- \* Initial and Continuing Calibration Standards
- \* ICP Serial Dilution Evaluation
- \* Method Compliance
- \* Sample Result Verification

Those items listed above which show deficiencies are discussed within the text of this narrative. All of the other items were determined to be acceptable for the DUSR level review, as discussed in NYS DER-10 Appendix B Section 2.0 (c). Documentation of the outlying parameters cited in this report can be found in the laboratory data package.

**In summary**, results for the samples are usable either as reported or with minor qualification or edit, with the following rejected results:

- 1,4-Dioxane in all samples
- 2,4-Dinitrophenol in one sample
- Dinoseb in three soil samples and a field duplicate

Data completeness, representativeness, accuracy, precision, reproducibility, sensitivity, and comparability are acceptable. However, atypical variances were observed in the field duplicate precision of the soil vapor.

Validation qualifier definitions and the client sample identification summaries are attached to this text. Also included in this report are laboratory EQUIS EDDs with recommended qualifiers/edits applied in red.

#### **Chain-of-Custody/Sample Receipt**

The sample identifications for the groundwaters are the same in both sampling events, and so have been differentiated in this report parenthetically by the month of collection.

Times are omitted on the interim receipt and relinquish entries for the air samples.

Two soil samples and one trip blank were received but not entered onto custody forms. They were not processed.

Although TCL volatiles were requested for samples reported in SDG 480-92594, TCL and CP-51 analytes were reported.

The notation for analytical requirements was not entered for samples reported in SDG L1724381.

#### **Blind Field Duplicate**

The blind field duplicate evaluations of MW-4 (November), TP-18, MW-3(16-20'), and SSV-1 show correlations within validation guidelines, with the following exceptions, the results for which should be qualified as estimated in the indicated parent sample and its duplicate:

- Carbon disulfide, benzene, 2-butanone, n-hexane, heptane, and cyclohexane in SSV-1
- Lead and zinc in TP-18
- Aluminum, chromium, cobalt, lead in MW-4 (November)

### **TCL and CP-51 Volatile Analyses by EPA 8260C, Full Scan and SIM**

The following detected results are considered contamination and edited to reflect non-detection due to presence in the associated method blanks:

- Acetone and carbon disulfide in the samples reported in SDG L1724590
- Methyl-t-butyl ether in SW-4(8-10')
- Acetone in TP-10(10-12)

The detected values in SW-6(7-9') are qualified as estimated, with a high bias, due to an elevated surrogate recovery indicating matrix interference contribution.

The following detected results are edited to reflect non-detection due to very poor mass spectral quality:

- 1,2,4-Trimethylbenzene in B-2(13')
- t-Butylbenzene in SW-1(8-10')
- Methyl cyclohexane in MW-4 (November)

The following detections are qualified as tentative in identification and estimated in value due to poor mass spectral quality:

- Methyl cyclohexane in MW-1(16-18')
- 2-Butanone in MW-3 (November)

The matrix spike/duplicate evaluation performed on TP-14 and MW-4 (November) show acceptable recoveries and correlations, with the following exceptions, results for which are qualified as estimated in the parent sample:

| <u>Parent Sample</u> | <u>Analyte</u>              | <u>Outlying % Recoveries</u> | <u>Outlying %RPD</u> |
|----------------------|-----------------------------|------------------------------|----------------------|
| TP-14                | trans-1,3-dichloropropene   | 60,69                        |                      |
|                      | bromoform                   | 58,67                        |                      |
|                      | 1,2-dichlorobenzene         | 53,60                        |                      |
|                      | 1,3-dichlorobenzene         | 53,61                        |                      |
|                      | 1,4-dichlorobenzene         | 51,65                        |                      |
|                      | 2-hexanone                  | 67,66                        |                      |
|                      | 1,2-dibromomethane          | 59,69                        |                      |
|                      | 1,2-dibromo-3-chloropropane | 51,62                        |                      |
|                      | 1,2,3-trichlorobenzene      | 35,48                        | 43                   |
|                      | 1,2,4-trichlorobenzene      | 34,44                        | 35                   |
|                      |                             |                              |                      |
| MW-4                 | 1,2,3-trichlorobenzene      | 69                           | 37                   |

LCS recoveries are within laboratory acceptance ranges/validation guidelines, although only sixteen of the analytes underwent the recovery/correlation evaluation in the LCSs associated with the samples collected in 2015.

The results for 1,4-dioxane in the samples are rejected and not usable due to low calibration standard response (RRF<0.01) inherent in the methodology used by the laboratory. Other calibration standards showed acceptable responses, with the following exceptions, the results for which are qualified in the indicated associated samples:

- Vinyl chloride and 1,1-dichloroethene (21%D and 22%D) in sample MW-5 (20-24')
- Carbon tetrachloride and bromoform (21%D and 26%D) in samples reported in SDG L1804815
- Bromomethane (25%D and 31%D) in samples reported in SDGs L1733355 and L1738416

Surrogate and internal standard responses are acceptable.

#### **TCL Semivolatiles Analyses by EPA8270D**

The matrix spikes of TP-14 show no recovery of 2,4-dinitrophenol, and the result for that compound in TP-14 is therefore rejected, and not usable. The other matrix spike/duplicate evaluations that were performed on TP-14 and MW-4 (November) show acceptable recoveries and correlations, with the following exceptions, results for which are qualified as estimated in the parent sample:

| <u>Parent Sample</u> | <u>Analyte</u>            | <u>Outlying % Recoveries</u> | <u>Outlying %RPD</u> |
|----------------------|---------------------------|------------------------------|----------------------|
| TP-14                | hexachlorocyclopentadiene | 34,34                        |                      |
| MW-4                 | 3,3'-dichlorobenzidine    | 25                           | 67                   |

The following analytes show outlying recoveries/correlations in LCSs, and results for the indicated associated samples have been therefore qualified as estimated in value:

| <u>Affected Samples</u> | <u>Analyte</u>            | <u>Outlying % Recoveries</u> | <u>Outlying %RPD</u> |
|-------------------------|---------------------------|------------------------------|----------------------|
| UST-BOTTOM-1            | indeno (1,2,3-cd) pyrene  | 17                           | 118                  |
| MW-4(9-10')             | hexachlorocyclopentadiene | 26,25                        |                      |

The detected results for acenaphthylene in BSB-1(1-2') and BSB-2(4-5') are edited to reflect non-detection due to very poor mass spectral quality.

Benzo(b)fluoranthene and benzo(k)fluoranthene were not resolved in TP-9(3-6), and the results for those compound in that sample are therefore qualified as estimated in value.

Calibration standards show responses within validation action levels. Surrogate and internal standard responses are compliant. Instrument tunes meet fragmentation requirements.

Some of the samples were processed only at dilution due to appearance and/or viscosity of the extract. This results in elevated reporting limits.

#### **TCL Pesticide, TCL Herbicides, and Aroclor PCBs by EPA 8081B, 8151A and 8082A**

Many detected pesticide results exhibit elevated dual column quantitative correlations, are qualified to reflect the uncertainty in identification and/or quantitation. The values have been qualified either as estimated ("J") in value, as tentative in identification and estimated in value ("NJ"), or with edit to non-detection, depending on the degree of variance.

Results for detected Aroclors in samples reporting detections of multiple Aroclor mixtures have been qualified as estimated, with a possible high bias, due to cross-contribution.

Dinoseb failed to recover in the matrix spikes of TP-14 and the associated LCSs. The results for that compound in the samples reported in SDG L1724590 have therefore been rejected and are not usable. The recoveries for the other herbicides in those spikes are acceptable.

The pesticide and Aroclor 1016/1260 matrix spikes of TP-14 and MW-4 (November) show acceptable recoveries and duplicate correlations.

Holding times were met, surrogate standards are within validation guidelines, and blanks show no contamination affecting reported results. Calibration standards are compliant.

#### **TAL Metals/CN Analyses by EPA 6010C, 6020A, 7470, 7471B, and 9012B**

The detected results for antimony in MW-3 (November) and MW-4 (November) are considered external contamination due to presence in the associated blanks, and have been edited to reflect non-detection.

Matrix spikes/duplicates were performed for TAL metals on TP-14 and MW-4 (November) and for mercury on TP-4(1-4'), and show recoveries and correlations within validation guidelines, with the following exception, the result for which are qualified as estimated in the indicated parent sample:

| <u>Parent Sample</u> | <u>Element</u> | <u>Outlying % Recoveries</u> |
|----------------------|----------------|------------------------------|
| TP-14                | thallium       | 58,65                        |

The ICP serial dilution evaluations of MW-2(15-16) and MW-4 (November) show acceptable correlations, with the following exceptions. The results for those elements in the indicated parent sample have been qualified as estimated, with a possible low bias, due to matrix interferences:

| <u>Parent Sample</u> | <u>Element</u> | <u>%Difference</u> |
|----------------------|----------------|--------------------|
| TP-14                | aluminum       | 25                 |
|                      | barium         | 27                 |
|                      | calcium        | 34                 |
|                      | iron           | 36                 |
|                      | magnesium      | 38                 |
|                      | manganese      | 32                 |

Instrument performance is compliant.

#### **Volatile Analyses by TO-15**

2,2,4-Trimethylpentane could not be analyzed in SSV-1, BD, and SSV-2, and acetone could not be analyzed in SSV-1 and BD, due to interferences. There was stated in the laboratory case narrative based on analyst review. Although reported without laboratory flag on the data package report forms, those results have been rejected on the EDD during validation.

The detected result for styrene in SSV-1 is qualified as tentative in identification and estimated in value due to poor mass spectral quality.

The detected result for hexane in Ambient-1 is edited to non-detection due to very poor mass spectral quality.

Acetone results in SSV-2 and Outdoor-1 are qualified as estimated, with high bias, and low bias, respectively, due to interferences in the ion fragment used for quantitation.

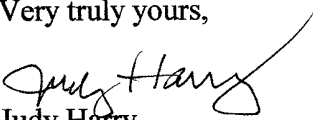
The laboratory duplicate evaluation of Ambient 1 shows acceptable correlations.

SSV-1 and BD were processed only at dilution due to target analyte concentrations.

Holding times and instrument tunes are acceptable. The LCS recoveries are within laboratory and validation guidelines. Blanks show no contamination. Internal standard responses fall within required ranges.

Please do not hesitate to contact me if questions or comments arise during your review of this report.

Very truly yours,



Judy Harry

Attachments:      Validation Qualifier Definitions  
                         Sample Identifications  
                         Qualified Laboratory EQUIS EDDs

## VALIDATION DATA QUALIFIER DEFINITIONS

- U** The analyte was analyzed for, but was not detected above the level of the associated reported quantitation limit.
- J** The analyte was positively identified; the associated numerical value is an approximate concentration of the analyte in the sample.
- J-** The analyte was positively identified; the associated numerical value is an estimated quantity that may be biased low.
- J+** The analyte was positively identified; the associated numerical value is an estimated quantity that may be biased high.
- UJ** The analyte was analyzed for, but was not detected. The associated reported quantitation limit is approximate and may be inaccurate or imprecise.
- NJ** The detection is tentative in identification and estimated in value. Although there is presumptive evidence of the analyte, the result should be used with caution as a potential false positive and/or elevated quantitative value.
- R** The data are unusable. The sample results are rejected due to serious deficiencies in meeting Quality Control limits. The analyte may or may not be present.
- EMPC** The results do not meet all criteria for a confirmed identification. The quantitative value represents the Estimated Maximum Possible Concentration of the analyte in the sample.

## **Client and Laboratory Sample IDs**



## Sample Summary

Client: Benchmark Env. Eng. & Science, PLLC  
Project/Site: Benchmark - 1661 Main St.site

TestAmerica Job ID: 480-92593-1

| Lab Sample ID | Client Sample ID | Matrix | Collected      | Received       |
|---------------|------------------|--------|----------------|----------------|
| 480-92593-1   | TP-2 (1-3')      | Solid  | 12/10/15 14:15 | 12/11/15 12:05 |
| 480-92593-2   | TP-3 (1-6')      | Solid  | 12/10/15 14:20 | 12/11/15 12:05 |
| 480-92593-3   | TP-4 (1-4')      | Solid  | 12/10/15 14:25 | 12/11/15 12:05 |

## Sample Summary

Client: Benchmark Env. Eng. & Science, PLLC  
Project/Site: Benchmark - 1661 Main St.site

TestAmerica Job ID: 480-92594-1

| Lab Sample ID | Client Sample ID | Matrix | Collected      | Received       |
|---------------|------------------|--------|----------------|----------------|
| 480-92594-1   | TP-1 (1-4)       | Solid  | 12/10/15 14:10 | 12/11/15 12:05 |
| 480-92594-2   | TP-8 (1-3)       | Solid  | 12/10/15 14:00 | 12/11/15 12:05 |
| 480-92594-3   | TP-9 (3-6)       | Solid  | 12/10/15 13:45 | 12/11/15 12:05 |
| 480-92594-4   | TP-10 (10-12)    | Solid  | 12/10/15 16:30 | 12/11/15 12:05 |

**Project Name:** MAIN & E. BALCOM STREET  
**Project Number:** 0239-016-001

**Lab Number:** L1724381  
**Report Date:** 07/18/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1724381-01                | UST BOTTOM-1     | SOIL          | BUFFALO, NY                | 07/17/17 13:30                  | 07/17/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** 0239-016-001

**Lab Number:** L1724590  
**Report Date:** 07/25/17

| Alpha<br>Sample ID | Client ID | Matrix | Sample<br>Location | Collection<br>Date/Time | Receive Date |
|--------------------|-----------|--------|--------------------|-------------------------|--------------|
| L1724590-01        | TP-14     | SOIL   | Not Specified      | 07/18/17 09:40          | 07/18/17     |
| L1724590-02        | NS-1      | SOIL   | Not Specified      | 07/18/17 10:00          | 07/18/17     |
| L1724590-03        | TP-15     | SOIL   | Not Specified      | 07/18/17 10:40          | 07/18/17     |
| L1724590-04        | TP-18     | SOIL   | Not Specified      | 07/18/17 11:30          | 07/18/17     |
| L1724590-05        | TP-16     | SOIL   | Not Specified      | 07/18/17 11:50          | 07/18/17     |
| L1724590-06        | NS-2      | SOIL   | Not Specified      | 07/18/17 12:30          | 07/18/17     |
| L1724590-07        | TP-13     | SOIL   | Not Specified      | 07/18/17 13:15          | 07/18/17     |
| L1724590-08        | BLINDDUP  | SOIL   | Not Specified      | 07/18/17 12:00          | 07/18/17     |
| L1724590-09        | TP-12     | SOIL   | Not Specified      | 07/18/17 13:50          | 07/18/17     |
| L1724590-10        | TP-11     | SOIL   | Not Specified      | 07/18/17 14:45          | 07/18/17     |
| L1724590-11        | NS-3      | SOIL   | Not Specified      | 07/18/17 14:30          | 07/18/17     |
| L1724590-12        | NS-4      | SOIL   | Not Specified      | 07/18/17 15:00          | 07/18/17     |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733060  
**Report Date:** 09/26/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1733060-01                | MW-1 (16-18')    | SOIL          | BUFFALO, NY                | 09/18/17 10:30                  | 09/18/17            |
| L1733060-02                | MW-2 (18-20')    | SOIL          | BUFFALO, NY                | 09/18/17 13:40                  | 09/18/17            |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1733355  
**Report Date:** 09/26/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1733355-01                | MW-3 (18-20')    | SOIL          | BUFFALO, NY                | 09/19/17 09:30                  | 09/19/17            |
| L1733355-02                | BD               | SOIL          | BUFFALO, NY                | 09/19/17 10:00                  | 09/19/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0234-016-001

**Lab Number:** L1738416  
**Report Date:** 10/30/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1738416-01                | MW-1             | WATER         | BUFFALO, NY                | 10/23/17 12:30                  | 10/23/17            |
| L1738416-02                | MW-2             | WATER         | BUFFALO, NY                | 10/23/17 13:30                  | 10/23/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738668  
**Report Date:** 10/31/17

| Alpha<br>Sample ID | Client ID     | Matrix | Sample<br>Location | Collection<br>Date/Time | Receive Date |
|--------------------|---------------|--------|--------------------|-------------------------|--------------|
| L1738668-01        | SW-1 (13-15') | SOIL   | BUFFALO, NY        | 10/24/17 09:00          | 10/24/17     |
| L1738668-02        | SW-2 (7-9')   | SOIL   | BUFFALO, NY        | 10/24/17 15:00          | 10/24/17     |
| L1738668-03        | SW-3 (7-9')   | SOIL   | BUFFALO, NY        | 10/24/17 15:15          | 10/24/17     |
| L1738668-04        | SW-4 (7-9')   | SOIL   | BUFFALO, NY        | 10/24/17 15:30          | 10/24/17     |
| L1738668-05        | SW-5 (9-11')  | SOIL   | BUFFALO, NY        | 10/24/17 15:45          | 10/24/17     |
| L1738668-06        | SW-6 (7-9')   | SOIL   | BUFFALO, NY        | 10/24/17 16:00          | 10/24/17     |



**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1738847  
**Report Date:** 11/01/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1738847-01                | B-2 (13')        | SOIL          | BUFFALO, NY                | 10/25/17 13:00                  | 10/25/17            |
| L1738847-02                | SW-1 (8-10')     | SOIL          | BUFFALO, NY                | 10/25/17 13:15                  | 10/25/17            |
| L1738847-03                | SW-2 (8-10')     | SOIL          | BUFFALO, NY                | 10/25/17 13:30                  | 10/25/17            |
| L1738847-04                | SW-3 (8-10')     | SOIL          | BUFFALO, NY                | 10/25/17 13:45                  | 10/25/17            |
| L1738847-05                | SW-4 (8-10')     | SOIL          | BUFFALO, NY                | 10/25/17 14:00                  | 10/25/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741810  
**Report Date:** 11/21/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1741810-01                | BSB-1 (1-2')     | SOIL          | BUFFALO, NY                | 11/13/17 10:00                  | 11/14/17            |
| L1741810-02                | BSB-2 (4-5')     | SOIL          | BUFFALO, NY                | 11/13/17 10:45                  | 11/14/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** B0234-016-001-0040

**Lab Number:** L1741813  
**Report Date:** 11/21/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1741813-01                | MW-4 (8-10')     | SOIL          | BUFFALO, NY                | 11/13/17 14:00                  | 11/14/17            |

**Project Name:** MAIN & E. BALCOM  
**Project Number:** T0239-016-001

**Lab Number:** L1742330  
**Report Date:** 11/27/17

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1742330-01                | MW-3             | WATER         | BUFFALO, NY                | 11/16/17 15:00                  | 11/16/17            |
| L1742330-02                | MW-4             | WATER         | BUFFALO, NY                | 11/16/17 13:30                  | 11/16/17            |
| L1742330-03                | BD               | WATER         | BUFFALO, NY                | 11/16/17 16:00                  | 11/16/17            |
| L1742330-04                | TRIP BLANK       | WATER         | BUFFALO, NY                | 11/16/17 00:00                  | 11/16/17            |

**Project Name:** MAIN & E. BALCOM ST. SITE  
**Project Number:** B0239-016-001

**Lab Number:** L1804490  
**Report Date:** 02/14/18

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1804490-01                | MW-5 (20-24')    | SOIL          | BUFFALO, NY                | 02/08/18 10:00                  | 02/08/18            |

**Project Name:** MAIN & EAST BALCOM ST. SITE  
**Project Number:** B0234-016-001-004

**Lab Number:** L1804815  
**Report Date:** 02/19/18

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1804815-01                | MW-3             | WATER         | BUFFALO, NY                | 02/11/18 14:20                  | 02/12/18            |
| L1804815-02                | MW-4             | WATER         | BUFFALO, NY                | 02/12/18 07:55                  | 02/12/18            |
| L1804815-03                | MW-5             | WATER         | BUFFALO, NY                | 02/12/18 09:15                  | 02/12/18            |

**Project Name:** MAIN & EAST BALCOM STREET SITE  
**Project Number:** B0239-016-001-004

**Lab Number:** L1804819  
**Report Date:** 02/19/18

| <b>Alpha<br/>Sample ID</b> | <b>Client ID</b> | <b>Matrix</b> | <b>Sample<br/>Location</b> | <b>Collection<br/>Date/Time</b> | <b>Receive Date</b> |
|----------------------------|------------------|---------------|----------------------------|---------------------------------|---------------------|
| L1804819-01                | SSV-1            | SOIL_VAPOR    | BUFFALO, NY                | 02/12/18 05:46                  | 02/12/18            |
| L1804819-02                | BD               | SOIL_VAPOR    | BUFFALO, NY                | 02/12/18 05:47                  | 02/12/18            |
| L1804819-03                | AMBIENT-1        | AIR           | BUFFALO, NY                | 02/12/18 05:47                  | 02/12/18            |
| L1804819-04                | SSV-2            | SOIL_VAPOR    | BUFFALO, NY                | 02/12/18 05:50                  | 02/12/18            |
| L1804819-05                | AMBIENT-2        | AIR           | BUFFALO, NY                | 02/12/18 05:49                  | 02/12/18            |
| L1804819-06                | AMBIENT-3        | AIR           | BUFFALO, NY                | 02/12/18 05:43                  | 02/12/18            |
| L1804819-07                | OUTDOOR-1        | AIR           | BUFFALO, NY                | 02/12/18 05:50                  | 02/12/18            |
| L1804819-08                | UNUSED CAN #160  | AIR           | BUFFALO, NY                |                                 | 02/12/18            |

## APPENDIX F

### NYSDEC PETROLEUM BULK STORAGE CLOSURE FORM



PBS Number:

NA

## Petroleum Bulk Storage Application

Pursuant to the Environmental Conservation Law: Article 17, Title 10; and

Regulations 6 NYCRR Part 613 and 6 NYCRR Subpart 374-2

(Please Type or Print Clearly and Complete All Items for Sections A, B & C)

### Section A - Facility/Property Owner/Contact Information

Expiration Date:

|   |   |  |                                      |   |  |  |  |
|---|---|--|--------------------------------------|---|--|--|--|
| <b>Transaction</b>  |   | Facility Name:   | Tax Map Info:                        | <b>TYPE OF PETROLEUM FACILITY</b> (Check only one)<br><input type="checkbox"/> 01=Storage Terminal/Petrol. Distributor <input type="checkbox"/> 02=Retail Gasoline Sales<br><input type="checkbox"/> 03=Other Retail Sales <input type="checkbox"/> 04=Manufacturing<br><input type="checkbox"/> 05=Utility <input type="checkbox"/> 06=Trucking/Transportation/Fleet<br><input type="checkbox"/> 07=Apartment/Office Building <input type="checkbox"/> 08=School<br><input type="checkbox"/> 09=Farm <input type="checkbox"/> 10=Private Residence<br><input type="checkbox"/> 11=Airline/Air Taxi/Airport <input type="checkbox"/> 12=Chemical Distributor<br><input type="checkbox"/> 13=Municipality <input type="checkbox"/> 15=Railroad<br><input type="checkbox"/> 25=Auto Service/Repair (No Gasoline Sales) <input type="checkbox"/> 16=Nuclear Power Plant<br><input type="checkbox"/> 26=Religious (Church, Synagogue, Mosque, Temple, etc.)<br><input type="checkbox"/> 27=Hospital/Nursing Home/Health Care <input type="checkbox"/> 28=Cemetery / Memorial<br><input type="checkbox"/> 52=Marina<br><input checked="" type="checkbox"/> 99=Other (Specify): Remediation of BCP Site C915306 |  |  |  |
| <b>Type:</b>  |   | Main and E. Balcom Street Site   | Borough/Section:                     |   |  |  |  |
|   | 3 | Facility Address (Physical Address, No P.O. Boxes)   | Block:                               |   |  |  |  |
| 1) Initial/New Facility   |   | 1661 Main Street   | Lot:                                 |   |  |  |  |
| 2) Change of Ownership  |   | Facility Address (cont.):  |                                      |   |  |  |  |
| 3) Tank Installation, Closing, or Repair  |   | City:  | State:                               | ZIP Code:   |  |  |  |
| 4) Information Correction   |   | Buffalo  | NY                                   | 14209   |  |  |  |
| 5) Renewal  |   | County:  | Township/City                        | Facility Phone Number:  |  |  |  |
|   |   | Erie   |                                      |   |  |  |  |
|   |   | Name of Class B (Daily On-Site) Operator:  | Operator Authorization No.           |   |  |  |  |
|   |   | NA   | NA                                   |   |  |  |  |
|   |   | Name of Class A (Primary) Operator:  | Operator Authorization No.           |   |  |  |  |
|   |   | NA   | NA                                   |   |  |  |  |
| <b>NOTE:</b>  |   | Facility (Property) Owner (from Deed):   |                                      |   | Emergency Contact Name:  |  |  |
|   |   | 1665 Main Street Group, LLC  |                                      |   | Emergency Telephone Number:  |  |  |
| <b>Fill in Property Owner information here.....&gt;&gt;&gt;</b>   |   | Facility Owner Address (Street and/or P.O. Box):   |                                      |   | I hereby certify, under penalty of law, that all of the information provided on this form is true and correct. False statements made herein may be punishable as a criminal offense and/or a civil violation in accordance with applicable state and federal law.<br><br>Name of Property Owner or Authorized Representative: Amount Enclosed: NA<br>Nick Sinatra \$<br><br>Title: Authorized Member<br>Signature: Date: |  |  |
|   |   | 617 Main Street, Suite 200   |                                      |   |  |  |  |
|   |   | City:  | State:                               | ZIP Code:   |  |  |  |
|   |   | Buffalo  | NY                                   | 14203   |  |  |  |
|   |   | Federal Tax ID Number:   | Owner Telephone Number: 716-220-8468 |   |  |  |  |
| <b>Indicate Tank Owner in Section C.</b>  |   | Type of Owner: (check only one)  |                                      |   |  |  |  |
|   |   | 3 <input type="checkbox"/> Local Government<br>1 <input type="checkbox"/> Private Resident<br>4 <input type="checkbox"/> Federal Government<br>2 <input type="checkbox"/> State Government<br>5 <input checked="" type="checkbox"/> Corporate/Commercial/Other |                                      |   |  |  |  |
| <b>Official Use Only</b>  |   | (Please keep this information up to date)  |                                      |   |  |  |  |
| Date Received:  |   | Facility Contact Person Name: Cole Hatley  |                                      |   |  |  |  |
| Date Processed:   |   | Contact Person Company Name: Sinatra Development   |                                      |   |  |  |  |
| Amount Received:  |   | Address: 617 Main Street, Suite 200  |                                      |   |  |  |  |
| Reviewed By:  |   | Address (cont.):   |                                      |   |  |  |  |
| Rev. 10/03/15   |   | City/State/ZIP Code: Buffalo, NY 14203   |                                      |   |  |  |  |
|   |   | Tel. Number: 716-220-8468  |                                      | eMail Address: chatley@sinatraandcompany.com  |  |  |  |
| <b>For Overdue Registrations Only:</b><br>If you are submitting an application for an overdue registration, you may settle the violation by submitting the normal fee, any back fees due, and a penalty of \$50 for every month the application is overdue. If you decline to settle, or make no choice, the case will be referred for enforcement which may result in higher penalties to resolve the violations. Please indicate your choice below:<br><input type="checkbox"/> I agree to settle and have enclosed the proper fees and penalty amounts.<br><input type="checkbox"/> I decline to settle and understand that higher penalties may result. |   |  |                                      |   |  |  |  |

NA

(Please use the key located on the last page to complete each item/column)

**Registration Expiration Date:**

[illegible]

**Note:** If you need to add tanks to your registration, write them in using blank lines above. Attach additional sheets as needed. Blank Section B is available at [http://www.dec.ny.gov/docs/remediation\\_hudson\\_pdf/pbsrenewal.pdf](http://www.dec.ny.gov/docs/remediation_hudson_pdf/pbsrenewal.pdf)

# PETROLEUM BULK STORAGE APPLICATION – SECTION B – TANK INFORMATION – CODE KEYS

## Action (1)

1. Initial Listing
2. Add Tank
3. Close/Remove Tank
4. Information Correction
5. Repair/Reline Tank

## Tank Location (3)

1. Aboveground-contact w/ soil
2. Aboveground-contact w/ impervious barrier
3. Aboveground on saddles, legs, stilts, rack or cradle
4. Tank with 10% or more below ground
5. Underground including vaulted with no access for inspection
6. Aboveground in Subterranean Vault w/ access for inspections

## Status (4)

1. In-service
2. Out-of-service
3. Closed-Removed
4. Closed-In Place
5. Tank converted to Non-Regulated use
- D. Delivery Prohibited

## Products Stored (7)

### Heating Oils: On-Site Consumption

0001. #2 Fuel Oil
0002. #4 Fuel Oil
0259. #5 Fuel Oil
0003. #6 Fuel Oil
0012. Kerosene
0591. Clarified Oil
2711. Biodiesel (Heating)
2642. Used Oil (Heating)

### Heating Oils: Resale/ Redistribution

2718. #2 Fuel Oil
2719. #4 Fuel Oil
2720. #5 Fuel Oil
2721. #6 Fuel Oil
2722. Kerosene
2723. Clarified Oil
2724. Biodiesel (Heating)

### Motor Fuels

0009. Gasoline
2712. Gasoline/Ethanol

0008. Diesel
2710. Biodiesel
0011. Jet Fuel
1044. Jet Fuel (Biofuel)
2641. Aviation Gasoline

### Lubricating/Cutting Oils

0013. Lube Oil
0015. Motor Oil
1045. Gear/Spindle Oil
0010. Hydraulic Oil
0007. Cutting Oil
0021. Transmission Fluid
1836. Turbine Oil
0308. Petroleum Grease

### Oils Used as Building Materials

2626. Asphaltic Emulsions
0748. Form Oil

### Petroleum Spirits

0014. White/Mineral Spirits
1731. Naphtha

### Mineral/Insulating Oils

0020. Insulating Oil (e.g., Transformer, Cable Oil)
2630. Mineral Oil

### Waste/Used/Other Oils

0022. Waste/Used Oil
9999. Other-Please list:\*

### Crude Oil

0006. Crude Oil
0701. Crude Oil Fractions

### Tank Type (8)

01. Steel/Carbon Steel/Iron
02. Galvanized Steel Alloy
03. Stainless Steel Alloy
04. Fiberglass Coated Steel
05. Steel Tank in Concrete
06. Fiberglass Reinforced Plastic (FRP)
07. Plastic
08. Equivalent Technology
09. Concrete
10. Urethane Clad Steel
99. Other-Please list:\*

### Internal Protection (9)

00. None

01. Epoxy Liner
02. Rubber Liner
03. Fiberglass Liner (FRP)
04. Glass Liner
99. Other-Please list:\*

### External Protection (10/18)

00. None
01. Painted/Asphalt Coating
02. Original Sacrificial Anode
03. Original Impressed Current
04. Fiberglass
05. Jacketed
06. Wrapped (Piping)
07. Retrofitted Sacrificial Anode
08. Retrofitted Impressed Current
09. Urethane
99. Other-Please list:\*

### Tank Secondary Containment (11)

00. None
01. Diking (AST Only)
02. Vault (w/access)
03. Vault (w/o access)
04. Double-Walled (UST Only)
05. Synthetic Liner
06. Remote Impounding Area
07. Excavation Liner
09. Modified Double-Walled (AST Only)
10. Impervious Underlayment (AST only)\*\*
11. Double Bottom (AST Only)\*\*
12. Double-Walled (AST Only)
99. Other-Please list:\*

### Tank Leak Detection (12)

00. None
01. Interstitial Electronic Monitoring
02. Interstitial Manual Monitoring
03. Vapor Well
04. Groundwater Well
05. In-Tank System (Auto Tank Gauge)
06. Impervious Barrier/Concrete Pad (AST Only)
07. Statistical Inventory Reconciliation (SIR)
08. Weep holes in vaults with no access for inspection
99. Other-Please list:\*

### Overfill Protection (13)

00. None
01. Float Vent Valve
02. High Level Alarm
03. Automatic Shut-Off
04. Product Level Gauge (AST Only)
05. Vent Whistle
99. Other-Please list:\*

### Spill Prevention (14)

00. None
01. Catch Basin
99. Other-Please list:\*

### Pumping/Dispensing Method (15)

00. None
01. Pressurized Dispenser
02. Suction Dispenser
03. Gravity
04. On-Site Heating System (Suction)
05. On-Site Heating System (Supply/Return)
06. Tank-Mounted Dispenser
07. Loading Rack/Transfer Pump

### Piping Location (16)

00. No Piping
01. Aboveground
02. Underground/On-ground
03. Aboveground/Underground Combination

### Piping Type (17)

00. None
01. Steel/Carbon Steel/Iron
02. Galvanized Steel
03. Stainless Steel Alloy
04. Fiberglass Coated Steel
05. Steel Encased in Concrete
06. Fiberglass Reinforced Plastic (FRP)
07. Plastic
08. Equivalent Technology
09. Concrete
10. Copper
11. Flexible Piping
99. Other-Please list:\*

### Piping Secondary Containment (19)

00. None
01. Diking (Aboveground Only)
02. Vault (w/access)
04. Double-Walled (Underground Only)
06. Remote Impounding Area
07. Trench Liner
12. Double-Walled (Aboveground Only)
99. Other-Please list:\*

### Pipe Leak Detection (20)

00. None
01. Interstitial Electronic Monitoring
02. Interstitial Manual Monitoring
03. Vapor Well
04. Groundwater Well
07. Pressurized Piping Leak Detector
09. Exempt Suction Piping
10. Statistical Inventory Reconciliation (SIR)
99. Other-Please list:\*

### Under Dispenser Containment (UDC) (21)

Check Box if Present

\* If other, please list on a separate sheet including tank number.

\*\* Each of these codes must be combined with code 01 or 06 to meet compliance requirements.

## APPENDIX G

### ELECTRONIC COPY OF RI/IRM/AA REPORT