
FINAL ENGINEERING REPORT

348 LANGNER ROAD SITE
ERIE COUNTY, WEST SENECA, NEW YORK

NYSDEC SITE NUMBER: C915256

July 2013

0123-012-002

Prepared for:



Delta Sonic Carwash Systems, Inc.
570 Delaware Avenue
Buffalo, New York 14202

Prepared By:



In Association With:



CERTIFICATIONS

I, Thomas H. Forbes, am currently a registered professional engineer licensed by the State of New York, I had responsibility for implementation of the remedial program activities, and I certify that the RI/IRM Work Plan was implemented and that remedial construction activities were completed in substantial conformance with the Department-approved RI/IRM Work Plan.

I certify that the data submitted to the Department with this Final Engineering Report demonstrates that the remediation requirements set forth in the RI/IRM Work Plan and applicable statutes and regulations have been or will be achieved in accordance with the time frames, if any, established herein for the remedy.

I certify that all documents generated in support of this report have been submitted in accordance with the DER's electronic submission protocols and have been accepted by the Department.

I certify that all data generated in support of this report have been submitted in accordance with the Department's electronic data deliverable and have been accepted by the Department.

I certify that all information and statements in this certification form are true. I understand that a false statement made herein is punishable as a Class "A" misdemeanor, pursuant to Section 210.45 of the Penal Law. I, Thomas H. Forbes, of 2558 Hamburg Turnpike, Lackawanna, New York, am certifying as Owner's Designated Site Representative

Date: _____

FINAL ENGINEERING REPORT

348 LANGNER ROAD SITE

Table of Contents

1.0	BACKGROUND AND SITE DESCRIPTION.....	1
1.1	Site Description.....	1
1.2	Environmental History.....	1
1.2.1	<i>January 2010 – Limited Phase II Site Investigation Report.....</i>	<i>1</i>
1.2.2	<i>RI-IRM Work Plan.....</i>	<i>2</i>
2.0	SUMMARY OF SITE REMEDY.....	3
2.1	Remedial Action Objectives.....	3
2.1.1	<i>Former UST System RAOs.....</i>	<i>3</i>
2.1.2	<i>Soil RAOs.....</i>	<i>3</i>
2.1.3	<i>Groundwater RAOs.....</i>	<i>3</i>
2.2	Description of selected remedy.....	3
3.0	IRMS, OPERABLE UNITS, & REMEDIAL CONTRACTS.....	5
3.1	Interim Remedial Measures.....	5
4.0	DESCRIPTION OF REMEDIAL ACTIONS PERFORMED.....	7
4.1	Governing Documents.....	7
4.1.1	<i>Site Specific Health & Safety Plan (HASP).....</i>	<i>7</i>
4.1.2	<i>Quality Assurance Project Plan (QAPP).....</i>	<i>7</i>
4.1.3	<i>Community Air Monitoring Plan (CAMP).....</i>	<i>7</i>
4.1.4	<i>Citizens Participation Plan.....</i>	<i>8</i>
4.2	Remedial Program Elements.....	8
4.2.1	<i>Contractors and Consultants.....</i>	<i>8</i>
4.2.2	<i>Site Preparation.....</i>	<i>9</i>
4.2.3	<i>General Site Controls.....</i>	<i>9</i>
4.2.4	<i>Nuisance controls.....</i>	<i>9</i>
4.2.5	<i>CAMP results.....</i>	<i>10</i>
4.2.6	<i>Reporting.....</i>	<i>10</i>
4.3	Contaminated Materials Removal.....	10
4.3.1	<i>Building Demolition.....</i>	<i>10</i>
4.3.1.1	<i>Non-Impacted Asphalt and Concrete.....</i>	<i>10</i>
4.3.2	<i>Underground Storage Tanks.....</i>	<i>11</i>
4.3.3	<i>Petroleum-Impacted Soil/Fill.....</i>	<i>11</i>
4.3.4	<i>Excavation Waters.....</i>	<i>11</i>
4.4	Backfill.....	12
4.5	Off-Site Reuse of Excess Soil.....	12
4.5.1	<i>New Tank Pit Excavation.....</i>	<i>12</i>
4.5.2	<i>New Convenience Store Building Excavation.....</i>	<i>12</i>
4.6	Remedial Performance/Documentation Sampling.....	13
4.7	Contamination Remaining at the Site.....	14
4.8	Engineering Controls.....	14
4.9	Institutional Controls.....	14

**FINAL ENGINEERING REPORT
348 LANGNER ROAD SITE**

Table of Contents

4.10 Deviations from the Remedial Action Work Plan 15

5.0 REFERENCES 16

FINAL ENGINEERING REPORT

348 LANGNER ROAD SITE

Table of Contents

LIST OF TABLES

Table 1	Soil Cleanup Objectives (SCOs) for the Project
Table 2	Summary of Materials Removed from the Site
Table 3a-e	Summary of End-Point Soil Analytical Results
Table 4	Summary of Off-Site Soil Reuse Characterization Analytical Results
Table 5	Summary of On-Site Soil/Fill Exceeding Unrestricted Use SCOs
Table 6	Summary of Groundwater Analytical Results.

LIST OF FIGURES

Figure 1	Site Location and Vicinity Map
Figure 2	Site Plan
Figure 3	IRM Excavation Activities (Record Drawing)
Figure 4	Off-Site Soil Reuse Characterization Activities
Figure 5	Remaining On-Site Soil/Fill Exceeding Unrestricted Use SCOs
Figure 6	Groundwater Monitoring Well Map

APPENDICES

Appendix A	Survey Map, Metes and Bounds
Appendix B	Digital Copy of the FER (CD)
Appendix C	Agency Permits, Applications, and Approvals
Appendix D	Fact Sheets
Appendix E	Community Air Monitoring Documentation (CD)
Appendix F	Daily and Monthly Reports (CD)
Appendix G	Project Photo Log
Appendix H	Soil/Waste Characterization Documentation
<i>Appendix H1</i>	<i>Disposal Facility Approval and Approval Letters</i>
<i>Appendix H2</i>	<i>Manifests and Receipts (CD)</i>
<i>Appendix H3</i>	<i>Load Summaries</i>
Appendix I	Backfill Materials Documentation
Appendix J	Data Usability Summary Report (DUSR)
Appendix K	Laboratory Analytical Data Reports (CD)

1.0 BACKGROUND AND SITE DESCRIPTION

Delta Sonic Car Wash Systems, Inc. (Delta Sonic) entered into an amended Brownfield Cleanup Agreement (BCA) with the New York State Department of Environmental Conservation (NYSDEC) in March 2012, to investigate and remediate a 2.6-acre property located in the Town of West Seneca, Erie County, New York. The property was remediated to residential use and will be used as a full service automobile wash and detailing, filling station, and convenience store facility.

1.1 Site Description

The 348 Langner Road site is located in the Town of West Seneca, County of Erie, New York and is identified as Tax Map # 143.05-2-10111. The site is situated on approximately 2.6-acre area bounded by Ridge Road to the north, commercial development to the south (self-storage facility), Langner Road to the east with a large commercial retail plaza beyond, and vacant land (overhead utility) and rail line to the west (see Figures 1 and 2). The boundaries of the site are shown on the Survey included in Appendix A.

An electronic copy of this FER with all supporting documentation is included as Appendix B.

1.2 Environmental History

The Site had been operated as a gasoline service station since at least the 1950s. Prior to IRM activities the Site contained two buildings (car wash building and convenience store building) two petroleum tank farm areas, a product dispenser canopy, and associated parking areas (see Figure 2). For the purpose of this report, Building #1 refers to the former convenience store which had been located along the northern boundary of the Site; and Building #2 refers to the existing car wash building along the eastern boundary of the Site (see Figure 2).

1.2.1 January 2010 – Limited Phase II Site Investigation Report

Benchmark Environmental Engineering and Science, PLLC (Benchmark) conducted an environmental site investigation of the subject property, and the findings are described below:

- Visual and olfactory evidence of impacted soil/fill was noted in multiple soil boring locations by field personnel. Elevated PID readings for volatile organic compounds (VOCs) were detected in multiple locations across the site, with readings as high as 777 ppm being detected.
- Petroleum-impacted soil with elevated VOCs was detected at two soil boring locations in the area of USTs west of the car wash building.
- VOCs were detected in groundwater exceeding NYSDEC groundwater quality standards (GWQS) in temporary monitoring wells on the Site.
- Based on the data collected during the site investigation, the NYSDEC was contacted and Spill No. 09-10758 was opened for the Site. [The spill file for the Site was administratively closed by the Department upon execution of the BCA, and remediation was directed under the guidance of the BCP].

1.2.2 RI-IRM Work Plan

Delta Sonic submitted the revised Remedial Investigation / Interim Remedial Measures (RI-IRM) Work Plan, which was accepted by the Department with concurrence from the NYSDOH in January 2012. The IRM section of the Work Plan included: demolition of the existing convenience store building, fueling canopy and dispenser islands; excavation and removal of USTs and appurtenant piping; and excavation and off-site treatment and/or disposal of petroleum-impacted soil/fill. As stated in the work plan, Delta Sonic's intent was for the IRMs to substantially or completely constitute the final remedy for the Site.

Details of the completed IRMs are described in more detail below.

2.0 SUMMARY OF SITE REMEDY

2.1 Remedial Action Objectives

Based on the results of the Remedial Investigation, the following Remedial Action Objectives (RAOs) were identified for this site.

2.1.1 Former UST System RAOs

- Remove historical UST System (Tank farm #1 and Tank Farm #2), including dispensers, piping and contents.

2.1.2 Soil RAOs

RAOs for Public Health Protection

- Prevent ingestion/direct contact with residual contaminated soil.
- Prevent inhalation of or exposure to, contaminants volatilizing from contaminated soil.

RAOs for Environmental Protection

- Prevent migration of contaminants that would result in groundwater or surface water contamination.

2.1.3 Groundwater RAOs

RAOs for Public Health Protection

- Prevent ingestion of groundwater containing contaminant levels exceeding SCGs.

RAOs for Environmental Protection

- Remove the source of ground or surface water contamination.

2.2 Description of selected remedy

The site was remediated in accordance with the remedy selected by the NYSDEC in the approved RI/IRM Work Plan dated January, 2012.

The factors considered during the selection of the remedy are those listed in 6NYCRR 375-1.8. The following are the components of the selected remedy:

1. Demolition of former convenience store building, fuel dispensers and associated canopy;
2. Cleaning, excavation and removal of underground storage tanks and all appurtenant piping (UST System)
3. Excavation of petroleum-impacted soil/fill exceeding residential use SCOs listed in Table 1;
4. Extraction of approximately 80,000 gallons of groundwater from on-Site excavation areas, which was temporarily stored, and then discharged to municipal sewer under an approved temporary discharge permit from Erie County Sewer District #3 (ECSD No.3).

3.0 IRMS, OPERABLE UNITS, & REMEDIAL CONTRACTS

The information and certifications made in the revised July 2013, RI/IRM/AA Report were relied upon to prepare this report and certify that the remediation requirements for the site have been met.

3.1 Interim Remedial Measures

The following NYSDEC-approved remedy was completed as an IRM in accordance with the approved work plan:

- Demolition of the former Building #1 convenience store, fuel dispensers and associated canopy. Non-impacted asphalt and concrete were recycled off-site.
- Cleaning, excavation and removal of eight (8) USTs including five (5) approximately 4,000 gallon steel USTs from UST Area #1; and three (3) fiberglass reinforced plastic (FRP) USTs, including one 10,000 gallon, one 8,000 gallon and one 6,000 gallon from UST Area #2. Steel USTs were recycled off-Site for scrap, and FRP USTs were crushed on-Site and loaded into a Waste Management dumpster and disposed off-site.
- Excavation of approximately 850 tons of non-hazardous petroleum-impacted soil from the UST Area #1 and vent stack areas, followed by off-Site transportation by Mallare Enterprises Inc. for biotreatment at Tonawanda Terminal Biotreatment facility located in Tonawanda, New York.
- Excavation of approximately 2,190 tons of non-hazardous petroleum-impacted soil from the UST Area #2, followed by off-Site transportation by Mallare Enterprises Inc. for biotreatment at Tonawanda Terminal Biotreatment facility in Tonawanda, New York.
- Excavation of approximately 420 tons of non-hazardous petroleum-impacted soil from the canopy and product lines areas, followed by off-Site transportation by Mallare Enterprises Inc. for biotreatment at Tonawanda Terminal Biotreatment facility in Tonawanda, New York.
- Excavation of approximately 150 tons of non-hazardous petroleum-impacted soil from the West Excavation Area, followed by off-Site transportation by Mallare

- Enterprises Inc. for biotreatment at Tonawanda Terminal Biotreatment facility in Tonawanda, New York.
- During redevelopment activities (June 2013), approximately 820 tons of petroleum impacted soil/fill was excavated and disposed off-site in the Pre-Wash Pad Area (adjacent to former convenience store). Impacted soil/fill was excavated, and transported off-site for disposal by Greenauer to Town of Tonawanda Landfill located in Tonawanda, New York.
 - Collection of 58 post-excitation confirmatory soil samples, including seven (7) sidewall, and four (4) bottom samples from the UST #1 and vent stack area; six (6) side wall and five (5) bottom samples from the Canopy and product lines Area; 13 sidewall and eight (8) bottom samples from the UST #2 Area; four (4) sidewall and one (1) bottom samples from the West Excavation Area; one (1) bottom sample in the vicinity of SB-16; and, six (6) sidewall and three (3) bottom samples from the Pre-Wash Pad Area.
 - Placement of approximately 9,540 tons of approved backfill material, including:
 - Approximately 2,220 tons of approved recycled concrete from Battaglia was utilized for backfilling of the IRM excavation areas, including UST Area #1, product lines and vent lines excavation areas and site grading activities;
 - Approximately 1,820 tons of DEC pre-approved backfill soil from Tonawanda Terminal Biotreatment facility in Tonawanda, New York was utilized to backfill UST Area #2; and,
 - Approximately 5,500- tons of virgin source backfill material for footers and utility bedding from Buffalo Crushed Stone Wehrle Drive facility in Lancaster New York.
 - Approximately 80,000 gallons of waters from the excavation areas was extracted and transferred to on-Site temporary storage tank(s) during IRM activities. The accumulated water was pre-treated and discharged into the sewer under the approved temporary discharge permit from Erie County Sewer District #3 (ECSD No. 3).

4.0 DESCRIPTION OF REMEDIAL ACTIONS PERFORMED

Remedial activities completed at the Site were conducted in accordance with the NYSDEC-approved RI/IRM Work Plan for the 348 Langner Road Site (January 2012). All deviations from the RI/IRM Work Plan are noted below.

4.1 Governing Documents

4.1.1 Site Specific Health & Safety Plan (HASP)

Remedial work performed under this Remedial Action was in compliance with governmental requirements, including Site and worker safety requirements mandated by Federal OSHA.

The Health and Safety Plan (HASP) was complied with for all remedial and invasive work performed at the Site.

4.1.2 Quality Assurance Project Plan (QAPP)

The QAPP was included in the RI/IRM Work Plan approved by the NYSDEC. The QAPP describes the specific policies, objectives, organization, functional activities and quality assurance/quality control activities designed to achieve the project data quality objectives.

4.1.3 Community Air Monitoring Plan (CAMP)

Real-time community air monitoring was performed during remedial activities at the Site. A Community Air Monitoring Plan (CAMP) is included with TurnKey's HASP. Particulate monitoring was performed during remedial activities in accordance with this plan. This CAMP is consistent with the requirements for community air monitoring at remediation sites as established by the NYSDOH and NYSDEC. Accordingly, it follows procedures and practices outlined under NYSDEC's DER-10 Appendix 1A (NYSDOH's Generic Community Air Monitoring Plan) and Appendix 1B (Fugitive Dust and Particulate Monitoring).

CAMP results are discussed in section 4.2.5 below. CAMP data is included in Appendix E.

4.1.4 Citizens Participation Plan

The NYSDEC has coordinated and led community relations throughout the course of the BCP project. TurnKey has supported the NYSDEC's community relation activities as necessary. A Citizen Participation (CP) Plan was approved in January 2012. The CP Plan followed the NYSDEC's template for BCP sites.

As required for BCP sites, copies of the BCP application, RI/IRM Work Plan, RI/IRM/AA Report, including the HASP and CP plan, were provided (or will be provided upon NYSDEC approval) to the West Seneca Public Library for public review.

Fact Sheets were prepared and mailed to the Department's approved Citizen Participation distribution list. Copies of the project's fact sheets issued to date are provided in Appendix D.

- April 2011 – Public Notice for Brownfield Cleanup Program Application. Comments were accepted until May 20, 2011.
- October 2011 – Draft Investigation Work Plan for Brownfields Site Available for Public Comment from October 3, 2011 through November 1, 2011.

Following NYSDEC approval of the Final Engineering Report and issuance of the Certificate of Completion (COC), a final Fact Sheet will be prepared and distributed to announce that (1) remedial construction has been completed; and (2) that the COC has been issued.

4.2 Remedial Program Elements

4.2.1 Contractors and Consultants

- TurnKey Environmental Restoration, LLC, in association with Benchmark Environmental Engineering and Science, PLLC, inspected the work as completed by the contractors, corresponded with the NYSDEC, and collected samples for analysis;

- TREC Environmental, Inc. provided drilling services related to the remedial investigation
- DDS Companies (DDS) completed UST System excavation removal, cleaning and off-site recycling/disposal; and, remedial excavation of impacted soil/fill for treatment/disposal; and placement/compaction of backfill material;
- Tom Greenauer Development, Inc. (Greenauer) completed redevelopment excavation activities and off-site transportation of contaminated soil (9A-826) to the Town of Tonawanda Landfill, and Tonawanda Terminals Biotreatment facility;
- Carmen M. Pariso, Inc. (Pariso) provided off-site transportation of non-hazardous soil/fill (9A-035) to the Town of Tonawanda Landfill, and Tonawanda Terminals Biotreatment facility;
- Mallare Enterprises, Inc. (Mallare) provided off-site transportation of soil/fill (9A-738) to the Town of Tonawanda Landfill, and Tonawanda Terminals Biotreatment facility, transported backfill material to the Site, and transported cleaned steel USTs to Twin Village Recycling for recycling as scrap;
- Prime Time Service, Inc. (Prime Time) completed excavation of the new tank area and installation of new fueling system;
- Paradigm Environmental Services, Inc. and Alpha Analytical, Inc. provided laboratory analytical services for the RI and IRM; and,
- Data Validation Services reviewed and validated analytical data packages.

4.2.2 Site Preparation

A meeting was held with NYSDEC, Delta Sonic, and TurnKey personnel prior to commencement of the investigation and cleanup activities. Documentation of NYSDEC and other agency approvals are included in Appendix C.

4.2.3 General Site Controls

Temporary perimeter fencing was erected surrounding active excavation areas during intrusive activities to limit access.

4.2.4 Nuisance controls

Nuisance controls were not generally required during RI/IRM activities.

4.2.5 CAMP results

CAMP monitoring activities were completed during remedial excavation activities. All monitoring results conformed to the CAMP perimeter particulate requirement of 100 ug/m³ and the organic vapor requirement of less than 5 part per million (ppm); there were no exceedances of particulates or VOCs during the remedial work.

All CAMP field sheets are provided electronically in Appendix E.

4.2.6 Reporting

NYSDEC, Delta Sonic, and TurnKey had continual discussions, including on-Site meetings, electronic and telephone correspondence regarding progress throughout the entire remedial project. Copies of the daily activity logs are included in Appendix F.

A photo log is included in Appendix G.

4.3 Contaminated Materials Removal

Materials removed from the Site included building demolition debris, steel and FRP USTs, petroleum impacted soil/fill and excavation water. Table 2 shows the total quantities of each category of material removed from the Site and the disposal locations. Figure 3 presents the locations of IRM excavation activities. Treatment and disposal facility applications, approvals, waste manifests and load summaries are provided in Appendix H.

4.3.1 Building Demolition

Prior to remedial activities on Site, the former convenience store (Building #1) and the dispenser island canopy were demolished.

4.3.1.1 Non-Impacted Asphalt and Concrete

From August 15, 2012 through September 7, 2012; approximately seven loads of asphalt and non-impacted concrete (the former convenience store footers), were excavated from the Site, followed by off-site transportation by Mallare Enterprises for recycling at Battaglia Trucking, Inc., located at 1037 Seneca Street, Buffalo NY.

Table 2 shows the total quantities of each category of material removed from the site, the transporter's name and license number, and disposal locations. Bills of lading for the asphalt and concrete removal are included in electronic format in Appendix H.

4.3.2 Underground Storage Tanks

Between August 13 and September 6, 2012, DDS excavated, removed and cleaned a total of eight (8) USTs, including: five (5) steel USTs from UST Area #1, and three (3) FRP USTs from UST Area #2 (see Figure 3). The steel USTs were transported off-Site by Mallare Enterprises for recycling as scrap at Twin Village Recycling, Inc. located in Depew NY. FRP tanks were crushed on-Site, placed in Waste Management roll-offs and disposed off-Site.

Delta Sonic registered the eight (8) tanks as closed-removed with NYSDEC. Appendix C includes the NYSDEC Petroleum Bulk Storage (PBS) database listing for the Site (Site No. 9-225274) indicating the former tanks as closed-removed.

4.3.3 Petroleum-Impacted Soil/Fill

From August 2012 through November 2012, approximately 3,610 tons of non-hazardous petroleum-impacted soil was excavated from the Site by DDS and Greenauer, followed by off-Site transportation by Mallare, Pariso, and Greenauer to Tonawanda Terminals Biotreatment Facility.

From October 2012 through June 2013, approximately 2,975 tons of non-hazardous petroleum-impacted soil/fill that was deemed unsuitable for biotreatment due to the presence of fill material was excavated during redevelopment activities by Greenauer and transported off-Site by Greenauer and Pariso for disposal at the Town of Tonawanda Landfill.

Figure 3 shows the approximate lateral extent of the IRM excavations and the locations of the confirmatory samples collected. Table 2 shows the total quantities of each category of material removed from the site and the treatment/recycling locations. Table 3 summarizes the post-excavation end-point sample results. Approvals from treatment/recycling facilities are included in Appendix H1; manifests and/or bills of lading are included in electronic format in Appendix H2; and, load summaries are included in Appendix H3.

4.3.4 Excavation Waters

During remedial excavation, precipitation and groundwater accumulated within the excavation. The excavation waters were pumped into a temporary holding tank during IRM activities. Prior to discharge, water was processed through an on-Site mobile treatment

system including bag filters and granular activated carbon. Approximately 80,000 gallons of pre-treated water was discharged to the sanitary sewer under approved temporary discharge permit from the Erie County Sewer Authority. The approved Erie County Sewer Authority permit is included in Appendix H. Table 2 shows the total quantities of each category of material removed from the site.

4.4 Backfill

Approximately 2,220 tons of recycled concrete originating from Battaglia Trucking, Inc. (registered facility – 15W52) was transported to the Site by Mallare for use as backfill. Sieve analysis of approved backfill material is provided in Appendix I.

Approximately 1,820 tons of approved backfill originating from the Tonawanda Terminals facility (registered facility – 9-1464-00132) was transported to the Site by Mallare for use as backfill. NYSDEC approval of the backfill material source is provided in Appendix I.

Approximately 5,500 tons of virgin source backfill stone Buffalo Crushed Stone Wehrle Drive, located in Williamsville, NY, was utilized as backfill.

Backfill source material was approved in accordance with the work plan, DER-10 and/or correspondence with the Department.

4.5 Off-Site Reuse of Excess Soil

4.5.1 New Tank Pit Excavation

Approximately 1,250 cy of clean soil was excavated and stockpiled from the new tank farm area. The clean soil pile was characterized in accordance with DER-10 and submitted to the NYSDEC for approval of off-site reuse. Upon approval of both NYSDEC Project Managers, clean soil was transported off-site for reuse on the Phase III Business Park BCP Site (C915199). Table 4 presents a summary of the pre-characterization sampling

4.5.2 New Convenience Store Building Excavation

Prior to the commencement of excavation for the new convenience store and detailing building, a pre-characterization investigation was completed to evaluate the

potential off-site reuse of the clean soils. Analytical results were submitted to the Department and approval was received from both NYSDEC Project Managers. Approximately 2,525 cy of clean soil was excavated from the new convenience store and detailing shop building, and utility lines, and transported off-site for reuse on the Phase III Business Park BCP Site (C915199). Approval documents and correspondence is provided in Appendix C. A table summarizing chemical analytical results for clean soil off-site reuse, in comparison to allowable levels, is provided in Table 4, and the location of the pre-characterization sampling are presented on Figure 4.

4.6 Remedial Performance/Documentation Sampling

Between August 2012 and June 2013, excavation activities were completed to remove impacted soil/fill from across the Site. When the excavations were deemed complete, a total of 58 post-excavation confirmatory samples were collected. Approximate locations of the confirmatory sample locations are shown on Figure 3. All verification samples collected were placed in laboratory supplied bottles using dedicated sampling equipment and transferred under chain-of-custody to Alpha Analytical for analysis of TCL plus STARS VOCs, and select samples were also analyzed for TCL SVOCs (Canopy area, and UST Area #1). Post-excavation analytical results are presented on Tables 3a-e.

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. Appendix K includes a copy of the laboratory analytical data packages. The Data Usability Summary Reports (DUSRs), completed by Data Validation Services (DVS), indicates that sample analyses were primarily conducted in compliance with the required analytical protocols. Most sample results are usable either as reported or with qualification. One volatile analyte (1,4-dioxane) results in all samples was rejected, and one PCB (Aroclor 1221) results were rejected in SB-23(1-3). Additional qualifications of the data have been incorporated to the summary data tables.

It should be noted that the data validator indicated that the laboratory's calibration standards for acetone and methylene chloride, exhibited an unacceptable response that suggests this "can be indicative of consistent background contamination" by the laboratory. The DUSR is provided in Appendix J.

4.7 Contamination Remaining at the Site

The remedial work described above removed all known “source area” of petroleum impacted soil/fill and UST Systems, and removed discovered impacted soil/fill during the completion of the IRMs. Based on the results of the RI and post-excavation confirmatory samples, the 348 Langner Road Site remediation achieved a Track 2 Residential Use cleanup.

All remaining on-Site soil is below Residential Use SCOs, with the vast majority of the Site being covered by buildings and concrete/asphalt upon completion of the redevelopment. Table 5 and Figure 5 show the soil samples remaining at the site after completion of Remedial Action that exceed the Unrestricted Use SCOs. It should be noted that acetone was detected in several soil sample locations above the Unrestricted Use SCOs. However, as indicated in the DUSR, laboratory calibration standards for acetone and methylene chloride exhibited an unacceptable response that suggests this “can be indicative of consistent background contamination”, and as such TurnKey believes the results for these constituents to be the results of laboratory contamination and not indicative of site.

Exceedances of GWQS are limited to naturally occurring metals and several pesticides across the Site. It should be noted that pesticides were not detected in on-Site soils above Unrestricted Use SCOs during the RI. Municipal water is supplied to the Site and groundwater is not used for potable or other uses. Table 6 summarizes the results of groundwater analytical results and monitoring well locations are shown on Figure 6.

Since contaminated soil and groundwater does not remain on-Site after completion of the Remedial Action, long-term Institutional and Engineering Controls (IC/EC) are not required to protect human health and environment.

4.8 Engineering Controls

The remedy for the site did not require the construction of any engineering control systems.

4.9 Institutional Controls

The remedy for the Site does not require any institutional controls.

4.10 Deviations from the Remedial Action Work Plan

The remedial activities were completed in general accordance with the approved IRM Work Plan. Although not necessarily a deviation from the work plan, the final remedial activities included additional intrusive activities.

During redevelopment activities, additional petroleum impacted soil/fill was detected in the vicinity of the former convenience store building while completing foundation excavations for the Pre-Wash Pad Area. Upon notification of the discovery, excavation and post-confirmatory sampling were completed in accordance with the Work Plan. Approximately 820 tons of impacted soil/fill was removed and transported off-site for disposal at the Town of Tonawanda Landfill, located in Tonawanda New York.

Approximately 3,800 cy of clean reusable excess soil was excavated during redevelopment activities. Following approval, the soil was transported to the Phase III Business Park BCP Site (C915199), located in Lackawanna New York.

5.0 REFERENCES

1. TurnKey Environmental Restoration, LLC. Work Plan for Remedial Investigation/Interim Remedial Measures, 348 Langner Road Site, West Seneca, New York. Revised January 2012.
2. New York State Department of Environmental Conservation. DER-10; Technical Guidance for Site Investigation and Remediation. May 2010.

TABLES



TABLE 1
RESIDENTIAL USE SOIL CLEANUP OBJECTIVES
348 LANGNER ROAD SITE
WEST SENECA, NEW YORK

PARAMETER	Residential Use SCOs ¹
<i>Volatile Organic Compounds (VOCs) - mg/Kg</i>	
1,1,1-Trichloroethane	100
1,1-Dichloroethane	19
1,1-Dichloroethene	100
1,2-Dichlorobenzene	100
1,2-Dichloroethane	2.3
cis-1,2-Dichloroethene	59
trans-1,2-Dichloroethene	100
1,3-Dichlorobenzene	17
1,4-Dichlorobenzene	9.8
1,4-Dioxane	9.8
Acetone	100
Benzene	2.9
Butylbenzene	100
Carbon tetrachloride	1.4
Chlorobenzene	100
Chloroform	10
Ethylbenzene	30
Hexachlorobenzene	0.33
Methyl ethyl ketone	100
Methyl tert butyl ether	62
Methylene chloride	51
n-Propylbenzene	100
sec-Butylbenzene	100
tert-Butylbenzene	100
Tetrachloroethene	5.5
Toluene	100
Trichloroethene	10
1,2,4-Trimethylbenzene	47
1,3,4-Trimethylbenzene	47
Vinyl chloride	0.21
Xylene	100



TABLE 1
RESIDENTIAL USE SOIL CLEANUP OBJECTIVES
348 LANGNER ROAD SITE
WEST SENECA, NEW YORK

PARAMETER	Residential Use SCOs ¹
<i>Semi-Volatile Organic Compounds (SVOCs) - mg/Kg</i>	
Acenaphthene	100
Acenaphthylene	100
Anthracene	100
Benzo(a)anthracene	1
Benzo(a)pyrene	1
Benzo(b)fluoranthene	1
Benzo(g,h,i)perylene	100
Benzo(k)fluoranthene	1
Chrysene	1
Dibenzo(a,h)anthracene	0.33
Fluoranthene	100
Fluorene	100
Indeno(1,2,3-cd)pyrene	0.5
m-Cresol	100
Naphthalene	100
o-Cresol	100
p-Cresol	34
Pentachlorophenol	2.4
Phenanthrene	100
Phenol	100
Pyrene	100
<i>Metals - mg/Kg</i>	
Arsenic	16
Barium	350
Beryllium	14
Cadmium	2.5
Chromium, trivalent	22
Chromium, hexavalent	36
Copper	270
Cyanide	27
Lead	400
Manganese	2000
Mercury	0.81
Nickel	140
Selenium	36
Silver	36
Zinc	2200



TABLE 1
RESIDENTIAL USE SOIL CLEANUP OBJECTIVES
348 LANGNER ROAD SITE
WEST SENECA, NEW YORK

PARAMETER	Residential Use SCOs ¹
<i>Pesticides/Herbicides and PCBs - mg/Kg</i>	
Silvex (2,4,5-TP)	58
4,4'-DDE	1.8
4,4'-DDT	1.7
4,4'-DDD	2.6
Aldrin	0.019
alpha-BHC	0.097
beta-BHC	0.072
alpha-Chlordane	0.91
delta-BHC	100
Dibenzofuran	14
Dieldrin	0.039
Endosulfan I	4.8
Endosulfan II	4.8
Endosulfan sulfate	4.8
Endrin	2.2
Heptachlor	0.42
Lindane	0.28
Polychlorinated biphenyls (PCBs)	1

Notes:

1. Values per 6NYCRR NYSDEC Part 375 Soil Cleanup Objectives (SCOs).



TABLE 2

SUMMARY OF MATERIALS RECYCLED/DISPOSED OFF-SITE

348 LANGNER ROAD SITE

WEST SENECA, NEW YORK

Material / Item	Quantity	Units	Treatment, Disposal and/or Off-Site Reuse Location	Permit No.
Soil/Fill	8,138	tons	Tonawanda Terminals Biotreatment facility	9-1464-00132
	9,332	tons	Town of Tonawanda Landfill	15S29
	3,800	cy	BCP Site No. C915199	--
Asphalt and Concrete	7	truckloads	Battaglia Trucking Inc., Buffalo NY	15W52
Excavation tank water	80,000	gallons	Discharged to municipal sewer Recieved by Erie County Sewer District No. 3	17312
Underground Storage Tanks (USTs) - Steel	5	Tanks	Twin Village Recycling, Depew, NY	7092171
Underground Storage Tanks (USTs) - Fiberglass	3	Tanks	Waste Management (Dumpster)	--



TABLE 3A

SUMMARY OF POST EXCAVATION SOIL ANALYTICAL RESULTS - UST AREA #1

348 LANGNER ROAD SITE

WEST SENECA, NEW YORK

Parameter ¹	Unrestricted Use SCOs ²	Residential Use SCOs ²	Sample Locations											
			UST Area #1								Vent Stack			
			Bottom 1	Bottom 2	Northwall 1	Southwall 1	Southwall 2	Eastwall 1	Eastwall 2	Westwall 1	Westwall 2	Bottom 1	Bottom 2	
			08/20/12	08/20/12	08/20/12	08/21/12	08/21/12	08/21/12	08/21/12	08/21/12	08/21/12	08/21/12	08/21/12	08/21/12
Volatile Organic Compounds (VOCs) - mg/Kg³														
1,2,4,5-Tetramethylbenzene	--	--	ND	ND	ND	0.031	ND	ND	ND	ND	ND	ND	ND	ND
1,2,4-Trimethylbenzene	3.6	47	ND	ND	ND	0.08	ND	ND	ND	ND	ND	ND	ND	ND
1,3,5-Trimethylbenzene	8.4	47	ND	ND	ND	0.0057 J	ND	ND	ND	ND	ND	ND	ND	ND
1,4-Diethylbenzene	--	--	ND	ND	ND	0.0017	ND	ND	ND	ND	ND	ND	ND	ND
4-Ethyltoluene	--	--	ND	ND	ND	0.037	ND	ND	ND	ND	ND	ND	ND	ND
Acetone	0.05	100	ND	0.028 J	0.012 J	0.052 J	0.066	ND	0.014 J	0.024 J	0.018 J	0.1	0.014 J	
Ethylbenzene	1	30	ND	ND	ND	0.033	ND	ND	ND	ND	ND	ND	ND	ND
Isopropylbenzene (Cumene)	--	--	ND	ND	ND	0.029	ND	ND	ND	ND	ND	ND	ND	ND
Methyl tert butyl ether (MTBE)	0.93	62	0.0036 J	0.1	0.006 J	0.0028 J	0.024	0.011	0.037	ND	ND	ND	0.008	
Methylene chloride	0.05	51	ND	0.016 J	0.011 J	0.012 J	0.0097 J	0.0092 J	0.027 J	ND	0.021 J	0.017 J	0.0095 J	
n-Butylbenzene	12	100	ND	ND	ND	0.0033	ND	ND	ND	ND	ND	ND	ND	ND
n-Propylbenzene	3.9	100	ND	ND	ND	0.08	ND	ND	ND	ND	ND	ND	ND	ND
sec-Butylbenzene	11	100	ND	ND	ND	0.0048 NJ	ND	ND	ND	ND	ND	ND	ND	ND
Toluene	0.7	100	ND	ND	ND	0.0099	ND	ND	ND	ND	ND	ND	ND	ND
Total Xylene	0.26	100	ND	ND	ND	0.036	ND	ND	ND	ND	ND	ND	ND	ND
Semi-Volatile Organic Compounds (SVOCs) - mg/Kg³														
2-Methylnaphthalene	--	--	ND	ND	ND	ND	ND	ND	0.21 J	ND	ND	ND	ND	ND
Anthracene	100	100	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.029 J	ND	
Benzo(a)anthracene	1	1	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.089	ND	
Benzo(a)pyrene	1	1	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.082 J	ND	
Benzo(b)fluoranthene	1	1	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.12	ND	
Benzo(g,h,i)perylene	100	100	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.058 J	ND	
Benzo(k)fluoranthene	0.8	1	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.052 J	ND	
Carbazole	--	--	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.045 J	ND	
Chrysene	1	1	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.12	ND	
Fluoranthene	100	100	ND	ND	ND	0.041 J	ND	ND	ND	ND	ND	0.31	ND	
Indeno(1,2,3-cd)pyrene	0.5	0.5	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.063 J	ND	
Naphthalene	12	100	ND	ND	ND	0.25	ND	ND	ND	ND	ND	ND	ND	
Phenanthrene	100	100	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.22	ND	
Pyrene	100	100	ND	ND	ND	0.033 J	ND	ND	ND	ND	ND	0.23	ND	

Notes:

1. Only those parameters detected at a minimum of one sample location are presented in this table; all other compounds were reported as non-detect.
2. Values per NYSDEC Part 375 Soil Cleanup Objectives (December 2006)
3. Sample results were reported by the laboratory in ug/kg and converted to mg/kg for comparison to SCOs.

Definitions:

- ND = Parameter not detected above laboratory detection limit.
- "-" = Sample not analyzed for parameter or no SCO available for the parameter.
- J = Estimated value; result is less than the sample quantitation limit but greater than zero.
- NJ = The detection is tentative in identification and estimated in value.

BOLD	= Result exceeds Part 375 Unrestricted Use SCOs.
BOLD	= Result exceeds Part 375 Residential Use SCOs.



TABLE 3B

SUMMARY OF POST EXCAVATION SOIL ANALYTICAL RESULTS - UST AREA #2

348 LANGNER ROAD SITE

WEST SENECA, NEW YORK

Parameter ¹	Unrestricted Use SCOs ²	Residential Use SCOs ²	Sample Locations																			
			UST Area #2																			
			Bottom 1	Bottom 2	Bottom 3	Bottom 4	Bottom 5	Bottom 6	Bottom 7	Bottom 8	Northwall 1	Northwall 2	Southwall 1	Eastwall 1	Eastwall 2	Eastwall 3	Eastwall 4	Westwall 1	Westwall 2	Westwall 3	Westwall 4	Westwall 5
09/05/12	09/05/12	09/06/12	09/06/12	09/06/12	09/06/12	09/07/12	09/07/12	09/05/12	09/05/12	09/07/12	09/05/12	09/05/12	09/06/12	09/07/12	09/05/12	09/06/12	09/06/12	09/06/12	09/07/12	09/07/12		
Volatile Organic Compounds (VOCs) - mg/Kg³																						
1,2-Dichloroethane	0.27	2.3	ND	ND	ND	0.0027 J	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
1,2,4,5-Tetramethylbenzene	--	--	ND	0.03 J	0.001 J	0.00083 J	0.0071 J	0.0029 J	0.00063 J	ND	0.0007 J	0.2	ND	ND	0.0037 J	0.033 J	ND	0.011 J	0.0059 J	0.088	0.001 J	ND
1,2,4-Trimethylbenzene	3.6	47	0.003 J	0.33 J	0.0046 J	0.0031 J	0.032 J	0.024	0.0053 J	ND	0.0034 J	0.066	ND	0.0034 J	0.039 J	ND	ND	0.0085 J	0.013 J	0.01 J	0.0088 J	ND
1,3,5-Trimethylbenzene	8.4	47	ND	0.12 J	0.004 J	0.0026 J	0.01 J	0.0071 J	ND	ND	ND	0.025 J	ND	ND	0.0097 J	ND	ND	0.0038 J	0.0045 J	0.0045 J	0.0024 J	ND
1,4-Diethylbenzene	--	--	ND	0.063 J	0.00092 J	ND	ND	ND	0.0011 J	ND	0.0012 J	0.056	ND	ND	0.0087 J	0.01 J	ND	ND	ND	0.022	0.0012 NJ	ND
2-Butanone (MEK)	0.12	100	ND	ND	0.011 J	ND	ND	ND	ND	ND	0.013 J	ND	ND	ND	0.026 J	ND	ND	0.036	ND	0.08	ND	ND
4-Ethyltoluene	--	--	0.0016 J	0.17 J	0.0034 J	ND	ND	ND	0.0028 J	ND	0.0028 J	0.037	ND	0.0026 J	0.022	ND	0.00058 J	0.0061 J	ND	0.014	0.0023 J	ND
p-Cymene (p-isopropyltoluene)	--	--	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.03 NJ	ND	ND
Acetone	0.05	100	ND	ND	0.015 J	ND	0.05	0.029 J	ND	0.3	0.04	ND	0.029 J	0.031 J	0.083	0.077	ND	ND	ND	0.2 J	0.19	0.31
Benzene	0.06	2.9	ND	ND	0.14	ND	0.02	0.023	ND	ND	ND	0.02	ND	ND	0.0024 J	ND	ND	0.014	0.03	0.044	ND	ND
Carbon disulfide	--	--	ND	ND	0.002 J	ND	ND	ND	ND	ND	ND	0.011 J	ND	ND	ND	0.0025 J	ND	ND	0.038	ND	ND	ND
Ethylbenzene	1	30	0.0018 J	0.074 J	0.0087	0.0029	0.006	0.0071	0.00075 J	ND	0.0024 J	0.96	ND	ND	0.016	ND	ND	0.0061	0.0031 J	0.21	0.0021 J	ND
Isopropylbenzene (Cumene)	--	--	ND	0.012 J	0.002 J	ND	0.0068	0.01	ND	ND	ND	0.083	ND	ND	ND	ND	ND	ND	0.0027 J	0.026	ND	ND
Methyl tert butyl ether (MTBE)	0.93	62	ND	ND	0.0033 J	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Methylene chloride	0.05	51	ND	ND	ND	0.012 J	0.011 J	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Naphthalene	12	100	ND	0.023 J	0.0055 J	ND	0.044 J	0.0037 J	ND	ND	ND	0.26	ND	ND	0.0055 J	ND	ND	0.0036 J	0.0045 J	0.15	ND	ND
n-Butylbenzene	12	100	ND	0.0081 J	ND	ND	0.011	ND	ND	ND	ND	0.054	ND	ND	ND	ND	ND	ND	ND	0.025	ND	ND
n-Propylbenzene	3.9	100	ND	0.058 J	0.0032	ND	0.016	0.022	ND	ND	ND	0.48	ND	ND	0.0046	ND	ND	0.0042	0.0057	0.14	0.0021 J	ND
sec-Butylbenzene	11	100	ND	ND	ND	ND	0.025	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.01 NJ	0.0084 NJ	ND	ND
Toluene	0.7	100	0.0032 J	0.0031 J	0.0059 J	ND	0.0067 J	0.009 J	ND	ND	ND	ND	ND	ND	0.0099	ND	ND	0.01	0.0046 J	0.0023 J	ND	ND
Total Xylene	0.26	100	0.0069 J	0.184 J	0.0248 J	0.0037 J	0.066	0.067	0.0047 J	ND	0.0035 J	0.0565 J	ND	0.0052 J	0.069	ND	0.0029 J	0.0236	0.039	0.0251 J	0.0099 J	ND

- Notes:
1. Only those parameters detected at a minimum of one sample location are presented in this table; all other compounds were reported as non-detect.
 2. Values per NYSDEC Part 375 Soil Cleanup Objectives (December 2006)
 3. Sample results were reported by the laboratory in ug/kg and converted to mg/kg for comparison to SCOs.

Definitions:

ND = Parameter not detected above laboratory detection limit.
 "--" = Sample not analyzed for parameter or no SCO available for the parameter.
 J = Estimated value; result is less than the sample quantitation limit but greater than zero.
 NJ = The detection is tentative in identification and estimated in value.

BOLD = Result exceeds Part 375 Unrestricted Use SCOs.
BOLD = Result exceeds Part 375 Residential Use SCOs.



TABLE 3C

SUMMARY OF POST EXCAVATION SOIL ANALYTICAL RESULTS - CANOPY AREA

348 LANGNER ROAD SITE

WEST SENECA, NEW YORK

Parameter ¹	Unrestricted Use SCOs ²	Residential Use SCOs ²	Sample Locations												
			Canopy Area						Canopy Area Product Lines			SB-16 Bottom			
			Northwall 1	Northwall 2	Northwall 3	Southwall 1	Southwall 2	Southwall 3	Bottom 1	Bottom 2	Bottom 1		Bottom 2	Bottom 3	
			08/16/12	08/16/12	08/16/12	08/16/12	08/16/12	08/16/12	08/16/12	08/16/12	09/11/12		09/11/12	09/11/12	11/19/12
Volatile Organic Compounds (VOCs) - mg/Kg³															
1,4-Diethylbenzene	--	--	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.00069 J	0.00078 J	--
2-Butanone (MEK)	0.12	100	ND	0.022 J	0.029 J	0.063	ND	ND	ND	ND	ND	ND	ND	ND	--
Acetone	0.05	100	0.1 J	0.14 J	0.23 J	0.37 J	ND	0.028 J	0.033 J	ND	ND	0.052	ND	ND	--
Benzene	0.06	2.9	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.0068	0.0055	ND	--
Carbon disulfide	--	--	0.0022 J	0.0028 J	0.0025 J	0.0026 J	0.002 J	ND	ND	ND	ND	ND	ND	ND	--
Ethylbenzene	1	30	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.0015 J	ND	ND	--
Methyl tert butyl ether (MTBE)	0.93	62	0.0021 J	0.006 J	0.0035 J	0.012	ND	ND	ND	ND	ND	0.0016	ND	ND	--
Methylene chloride	0.05	51	ND	0.03 J	ND	0.0082 J	0.0095 J	0.0093 J	ND	ND	ND	ND	ND	ND	--
Toluene	0.7	100	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.012	0.0014 J	ND	--
Total Xylene	0.26	100	ND	ND	ND	ND	ND	ND	ND	ND	ND	14.6 J	ND	ND	--
Semi-Volatile Organic Compounds (SVOCs) - mg/Kg³															
Acenaphthylene	100	100	ND	ND	ND	ND	ND	ND	ND	ND	--	--	--	--	0.06 J
Anthracene	100	100	ND	ND	ND	ND	ND	ND	ND	ND	--	--	--	--	0.17
Benzo(a)anthracene	1	1	ND	ND	0.29 NJ	ND	ND	0.52 J	ND	0.05 NJ	--	--	--	--	0.63
Benzo(a)pyrene	1	1	ND	ND	0.33 J	ND	ND	0.58 J	ND	0.068 J	--	--	--	--	0.76
Benzo(b)fluoranthene	1	1	ND	0.06 J	0.49 J	ND	ND	0.8 J	ND	0.094 J	--	--	--	--	1
Benzo(g,h,i)perylene	100	100	ND	ND	0.32 J	ND	ND	0.5 J	ND	0.087 J	--	--	--	--	0.64
Benzo(k)fluoranthene	0.8	1	ND	ND	0.19 J	ND	ND	0.33 J	ND	0.038 J	--	--	--	--	0.39
Bis(2-ethylhexyl) phthalate	--	--	0.41	1.41	ND	ND	ND	ND	ND	ND	--	--	--	--	ND
Butyl benzyl phthalate	--	--	ND	ND	0.4 J	ND	ND	ND	ND	ND	--	--	--	--	ND
Chrysene	1	1	ND	0.046 J	0.37 J	ND	ND	0.63 J	ND	0.066 J	--	--	--	--	0.78
Dibenzo(a,h)anthracene	0.33	0.33	ND	ND	ND	ND	ND	ND	ND	ND	--	--	--	--	0.14
Fluoranthene	100	100	0.028 NJ	0.069 J	0.64	ND	0.16 J	1 J	ND	0.11	--	--	--	--	1.5
Fluorene	30	100	ND	ND	ND	ND	ND	ND	ND	ND	--	--	--	--	0.045 J
Indeno(1,2,3-cd)pyrene	0.5	0.5	ND	ND	0.34 J	ND	ND	0.53 J	ND	0.087 J	--	--	--	--	0.7
Phenanthrene	100	100	ND	0.045 J	0.24 J	0.046 NJ	ND	0.3 J	ND	0.04 J	--	--	--	--	0.65
Pyrene	100	100	ND	0.066 J	0.55 J	ND	ND	0.91 J	ND	0.093 J	--	--	--	--	1.2

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 NYSDEC Part 375 Soil Cleanup Objectives (December 2006)
- Sample results were reported by the laboratory in ug/kg and converted to mg/kg for comparison to SCOs.

Definitions:

- ND = Parameter not detected above laboratory detection limit.
- = Sample not analyzed for parameter or no SCO available for the parameter.
- J = Estimated value; result is less than the sample quantitation limit but greater than zero.
- NJ = The detection is tentative in identification and estimated in value.

BOLD	= Result exceeds Part 375 Unrestricted Use SCOs.
BOLD	= Result exceeds Part 375 Residential Use SCOs.



TABLE 3D

SUMMARY OF POST EXCAVATION SOIL ANALYTICAL RESULTS - CANOPY AREA

348 LANGNER ROAD SITE

WEST SENECA, NEW YORK

Parameter ¹	Unrestricted Use SCOs ²	Residential Use SCOs ²	Sample Locations				
			West Excavation Area				
			Bottom 1	Northwall 1	Southwall 1	Eastwall 1	Westwall 1
			08/21/12	08/21/12	08/21/12	08/21/12	08/21/12
Volatile Organic Compounds (VOCs) - mg/Kg³							
Acetone	0.05	100	ND	0.057	ND	ND	ND

Notes:

1. Only those parameters detected at a minimum of one sample location are presented in this table; all other compounds were reported as non-detect.
2. Values per NYSDEC Part 375 Soil Cleanup Objectives (December 2006)
3. Sample results were reported by the laboratory in ug/kg and converted to mg/kg for comparison to SCOs.

Definitions:

ND = Parameter not detected above laboratory detection limit.
 "--" = Sample not analyzed for parameter or no SCO available for the parameter.

BOLD	= Result exceeds Part 375 Unrestricted Use SCO.
BOLD	= Result exceeds Part 375 Residential Use SCO.



TABLE 3E

SUMMARY OF POST EXCAVATION SOIL ANALYTICAL RESULTS - PREWASH AREA

348 LANGNER ROAD SITE

WEST SENECA, NEW YORK

Parameter ¹	Unrestricted Use SCOs ²	Residential Use SCOs ²	Sample Locations									
			Prewash Pad Excavation Area									
			Bottom 1	Bottom 2	Bottom 3	Northwall 1	Northwall 2	Southwall 1	Southwall 2	Eastwall 1	Westwall 1	
			06/12/13	06/12/13	06/12/13	06/12/13	06/12/13	06/12/13	06/12/13	06/12/13	06/14/13	
Volatile Organic Compounds (VOCs) - mg/Kg³												
1,2-Dichloroethane	0.27	2.3	ND	ND	0.00083 J	ND	ND	ND	ND	ND	ND	ND
1,2-Dichlorobenzene	1.1	100	ND	ND	ND	ND	ND	ND	0.007 J	ND	ND	ND
2-Butanone (MEK)	0.12	100	ND	0.0039 J	ND	0.0033 J	ND	ND	ND	ND	ND	ND
Acetone	0.05	100	ND	0.049	0.0046 J	0.042	0.004 J	ND	0.035 J	ND	0.0055 J	ND
Benzene	0.06	2.9	ND	ND	0.00098 J	ND	ND	ND	ND	ND	ND	ND
Isopropylbenzene (Cumene)	--	--	ND	ND	ND	ND	ND	ND	0.016	ND	ND	ND
Methylene chloride	0.05	51	ND	ND	ND	ND	ND	ND	0.031	ND	0.006 J	ND
n-Butylbenzene	12	100	ND	ND	ND	ND	ND	0.29	0.011	ND	ND	ND
n-Propylbenzene	3.9	100	ND	ND	ND	ND	ND	ND	0.024	ND	ND	ND
sec-Butylbenzene	11	100	ND	ND	ND	ND	ND	ND	0.025	ND	ND	ND

Notes:

1. Only those parameters detected at a minimum of one sample location are presented in this table; all other compounds were reported as non-detect.
2. Values per NYSDEC Part 375 Soil Cleanup Objectives (December 2006)
3. Sample results were reported by the laboratory in ug/kg and converted to mg/kg for comparison to SCOs.

Definitions:

ND = Parameter not detected above laboratory detection limit.

-- = Sample not analyzed for parameter or no SCO available for the parameter.

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

BOLD	= Result exceeds Part 375 Unrestricted Use SCO.
BOLD	= Result exceeds Part 375 Residential Use SCO.



TABLE 4

OFF-SITE REUSE CHARACTERIZATION SAMPLE LOCATIONS

348 LANGNER ROAD SITE

WEST SENECA, NEW YORK

Parameter ¹	Commercial SCOs ²	Sample Locations																				
		TP-1	TP-3	TP-4	TP-5	TP-6	TP-7	TP-8	TP-9	TP-11	NC Comp 1 ³	NC Comp 2 ⁴	NC Comp 3 ⁵	New Tank Area Clean Soil 1	New Tank Area Clean Soil 2	New Tank Area Clean Soil 3	New Tank Area Clean Soil 4	New Tank Area Clean Soil 5	New Tank Area Clean Soil 6	New Tank Area Clean Soil 7	New Tank Area Clean Soil 8	New Tank Area Clean Soil 9
Volatile Organic Compounds (VOCs) - mg/Kg		01/14/13											09/11/12									
p-Cymene (p-isopropyltoluene)	--	ND	ND	ND	ND	ND	ND	0.00075 J	ND	ND	--	--	--	ND								
Acetone	500	0.0072 J	0.007 J	0.0052 J	0.024	0.017	0.039 J	0.0059 J	0.014	0.012	--	--	--	ND								
Methyl tert butyl ether (MTBE)	500	ND	ND	ND	ND	ND	ND	ND	ND	0.12	--	--	--	ND								
Methylene chloride	51	ND	ND	ND	ND	ND	ND	ND	ND	ND	--	--	--	ND	ND	ND	0.006 J	ND	ND	ND	ND	ND
Semi-Volatile Organic Compounds (SVOCs) - mg/Kg																						
Benzo(a)anthracene	1	--	--	--	--	--	--	--	--	--	ND	ND	ND	ND	ND	0.079 J	--	--	--	--	--	--
Benzo(a)pyrene	1	--	--	--	--	--	--	--	--	--	ND	ND	ND	ND	ND	0.092 J	--	--	--	--	--	--
Benzo(b)fluoranthene	1	--	--	--	--	--	--	--	--	--	ND	ND	ND	ND	ND	0.092 J	--	--	--	--	--	--
Benzo(g,h,i)perylene	100	--	--	--	--	--	--	--	--	--	ND	ND	ND	ND	ND	0.064 J	--	--	--	--	--	--
Benzo(k)fluoranthene	1	--	--	--	--	--	--	--	--	--	ND	ND	ND	ND	ND	0.076 J	--	--	--	--	--	--
Carbazole	--	--	--	--	--	--	--	--	--	--	ND	ND	ND	ND	ND	0.044 J	--	--	--	--	--	--
Chrysene	1	--	--	--	--	--	--	--	--	--	ND	ND	ND	ND	ND	0.13	--	--	--	--	--	--
Fluoranthene	100	--	--	--	--	--	--	--	--	--	ND	ND	ND	ND	ND	0.36	--	--	--	--	--	--
Indeno(1,2,3-cd)pyrene	0.5	--	--	--	--	--	--	--	--	--	ND	ND	ND	ND	ND	0.059 J	--	--	--	--	--	--
Phenanthrene	100	--	--	--	--	--	--	--	--	--	ND	ND	ND	ND	ND	0.26	--	--	--	--	--	--
Pyrene	100	--	--	--	--	--	--	--	--	--	ND	ND	ND	ND	ND	0.27	--	--	--	--	--	--
Total Metals - mg/Kg																						
Aluminum	--	--	--	--	--	--	--	--	--	--	19000	23000	18000	8800	14000	10000	--	--	--	--	--	--
Antimony	--	--	--	--	--	--	--	--	--	--	4.4 J	4.1 J	3.8 J	1.1 J	2 J	1.3 J	--	--	--	--	--	--
Arsenic	16	--	--	--	--	--	--	--	--	--	14	13	13	4.9	8.7	4.1	--	--	--	--	--	--
Barium	400	--	--	--	--	--	--	--	--	--	89	160	87	44	87	62	--	--	--	--	--	--
Beryllium	590	--	--	--	--	--	--	--	--	--	0.68	0.96	0.75	0.37 J	0.62	0.42 J	--	--	--	--	--	--
Calcium	--	--	--	--	--	--	--	--	--	--	15000	3800	3100	150000	58000	130000	--	--	--	--	--	--
Chromium	1500	--	--	--	--	--	--	--	--	--	23	26	21	11	17	13	--	--	--	--	--	--
Cobalt	--	--	--	--	--	--	--	--	--	--	14	16	14	5	9	6.9	--	--	--	--	--	--
Copper	270	--	--	--	--	--	--	--	--	--	33	38	30	19	28	17	--	--	--	--	--	--
Iron	--	--	--	--	--	--	--	--	--	--	33000	37000	38000	13000	24000	15000	--	--	--	--	--	--
Lead	1000	--	--	--	--	--	--	--	--	--	14	16	14	45	11	7.7	--	--	--	--	--	--
Magnesium	--	--	--	--	--	--	--	--	--	--	11000	6600	5100	9000	14000	28000	--	--	--	--	--	--
Manganese	10000	--	--	--	--	--	--	--	--	--	560	570	310	360	850	390	--	--	--	--	--	--
Nickel	310	--	--	--	--	--	--	--	--	--	34	45	34	14	26	19	--	--	--	--	--	--
Potassium	--	--	--	--	--	--	--	--	--	--	2300	1600	1300	1300	1900	2600	--	--	--	--	--	--
Selenium	1500	--	--	--	--	--	--	--	--	--	1.6 J	1.7 J	1.4 J	0.53 J	ND	ND	--	--	--	--	--	--
Sodium	--	--	--	--	--	--	--	--	--	--	950	260	300	860	480	550	--	--	--	--	--	--
Vanadium	--	--	--	--	--	--	--	--	--	--	28	32	28	16	24	19	--	--	--	--	--	--
Zinc	10000	--	--	--	--	--	--	--	--	--	82	87	80	120	69	49	--	--	--	--	--	--
Mercury	0.81	--	--	--	--	--	--	--	--	--	ND	ND	ND	0.05 J	ND	ND	--	--	--	--	--	--
Pesticides and Herbicides - mg/Kg																						
4,4'-DDD	2.6	--	--	--	--	--	--	--	--	--	ND	ND	ND	0.0112 J	ND	ND	--	--	--	--	--	--
Aroclor 1254	--	--	--	--	--	--	--	--	--	--	ND	ND	ND	0.0159 J	ND	ND	--	--	--	--	--	--

Notes:

1. Only those parameters detected at a minimum of one sample location are presented in this table; all other compounds were reported as non-detect.
2. Values per NYSDEC Part 375 Soil Cleanup Objectives (SCOs). (December 2006)
3. "NC Comp 1" is a composite sample from grab samples TP-1 through TP-3
4. "NC Comp 2" is a composite sample from grab samples TP-4 through TP-6.
5. "NC Comp 3" is a composite sample from grab samples TP-7 and TP-9.
6. Samples were also analysed for Polychlorinated Biphenyls (PCBs), all reported as non-detect.

Definitions:

ND = Parameter not detected above laboratory detection limit.
 "--" = Sample not analyzed for parameter or no SCO available for the parameter.
 J = Estimated value; result is less than the sample quantitation limit but greater than zero.
BOLD = exceedance of NYSDEC SCOs.



TABLE 5

SUMMARY OF REMAINING ON-SITE SOIL/FILL EXCEEDING UNRESTRICTED USE SCOs

348 LANGNER ROAD SITE

WEST SENECA, NY

Parameter ¹	Unrestricted Use SCOs ²	Sample Location																
		SB-12 (8-10)	UST Area #1		Vent Stack	UST Area #2					Canopy Area				Product Lines	West Area		
			Southwall 1	Southwall 2	Bottom 1	Bottom 3	Bottom 8	Eastwall 2	Eastwall 3	Westwall 3	Westwall 4	Westwall 5	Northwall 2	Northwall 3	Southwall 1	Southwall 3	Bottom 2	Northwall 1
03/19/12	08/21/12	08/21/12	08/21/12	09/06/12	09/07/12	09/05/12	09/06/12	09/06/12	09/07/12	09/07/12	09/07/12	08/16/12	08/16/12	08/16/12	08/16/12	09/11/12	08/21/12	
Volatile Organic Compounds (VOCs) - mg/Kg³																		
1,2,4,5-Tetramethylbenzene	--	ND	0.031	ND	ND	0.001 J	ND	0.0037 J	0.033 J	0.088	0.001 J	ND	ND	ND	ND	ND	ND	ND
1,2,4-Trimethylbenzene	3.6	ND	0.08	ND	ND	0.0046 J	ND	0.039 J	ND	0.01 J	0.0088 J	ND	ND	ND	ND	ND	ND	ND
1,3,5-Trimethylbenzene	8.4	ND	0.0057 J	ND	ND	0.004 J	ND	0.0097 J	ND	0.0045 J	0.0024 J	ND	ND	ND	ND	ND	ND	ND
1,4-Diethylbenzene	--	ND	0.0017	ND	ND	0.00092 J	ND	0.0087 J	0.01 J	0.022	0.0012 J	ND	ND	ND	ND	ND	0.00069 J	ND
2-Butanone (MEK)	0.12	ND	ND	ND	ND	0.011 J	ND	0.026 J	ND	0.08	ND	ND	0.022 J	0.029 J	0.063	ND	ND	ND
p-Cymene (p-isopropyltoluene)	--	ND	ND	ND	ND	ND	ND	ND	ND	0.03	ND	ND	ND	ND	ND	ND	ND	ND
4-Ethyltoluene	--	ND	0.037	ND	ND	0.0034 J	ND	0.022	ND	0.014	0.0023 J	ND	ND	ND	ND	ND	ND	ND
Acetone	0.05	ND	0.052 J	0.066	0.1	0.015 J	0.3	0.083	0.077	0.2	0.19	0.31	0.14	0.23	0.37	0.028	0.052	0.057
Benzene	0.06	ND	0.14	ND	0.0024 J	0.14	ND	ND	ND	0.044	ND	ND	ND	ND	ND	ND	0.0068	ND
Carbon disulfide	--	ND	ND	ND	ND	0.002 J	ND	ND	0.0025 J	0.0025	ND	ND	0.0028 J	0.0025 J	0.0026 J	ND	ND	ND
Ethylbenzene	1	ND	0.033	ND	ND	0.0087	ND	0.016	ND	0.21	0.0021 J	ND	ND	ND	ND	ND	0.0015 J	ND
Isopropylbenzene (Cumene)	--	ND	0.029	ND	ND	0.002 J	ND	ND	ND	0.026	ND	ND	ND	ND	ND	ND	ND	ND
Methyl tert butyl ether (MTBE)	0.93	ND	0.0028 J	0.024	ND	0.0033 J	ND	ND	ND	ND	ND	ND	0.006 J	0.0035 J	0.012	ND	0.0016	ND
Methylene chloride	0.05	ND	0.012	0.0097 J	0.017 J	ND	ND	ND	ND	ND	ND	ND	0.03 J	ND	0.0082 J	0.0093 J	ND	ND
n-Butylbenzene	12	ND	0.0033	ND	ND	ND	ND	ND	ND	0.025	ND	ND	ND	ND	ND	ND	ND	ND
n-Propylbenzene	3.9	ND	0.08	ND	ND	0.0032	ND	0.0046	ND	0.14	0.0021 J	ND	ND	ND	ND	ND	ND	ND
sec-Butylbenzene	11	ND	0.0048	ND	ND	ND	ND	ND	ND	0.0084	ND	ND	ND	ND	ND	ND	ND	ND
Toluene	0.7	ND	0.0099	ND	ND	0.0059	ND	0.0099	ND	0.0023 J	ND	ND	ND	ND	ND	ND	0.012	ND
Total Xylene	0.26	ND	0.036	ND	ND	0.0248 J	ND	0.069	ND	0.0251 J	0.0099 J	ND	ND	ND	ND	ND	14.6 J	ND
Semi-Volatile Organic Compounds (SVOCs) - mg/Kg³																		
Acenaphthylene	100	ND	ND	ND	ND	--	--	--	--	--	--	--	ND	ND	ND	ND	--	--
Anthracene	100	ND	ND	ND	0.029 J	--	--	--	--	--	--	--	ND	ND	ND	ND	--	--
Benzo(a)anthracene	1	ND	ND	ND	0.089	--	--	--	--	--	--	--	ND	0.29 J	ND	0.52 J	--	--
Benzo(a)pyrene	1	ND	ND	ND	0.082 J	--	--	--	--	--	--	--	ND	0.33 J	ND	0.58 J	--	--
Benzo(b)fluoranthene	1	ND	ND	ND	0.12	--	--	--	--	--	--	--	0.06 J	0.49 J	ND	0.8 J	--	--
Benzo(g,h,i)perylene	100	ND	ND	ND	0.058 J	--	--	--	--	--	--	--	ND	0.32 J	ND	0.5 J	--	--
Benzo(k)fluoranthene	0.8	ND	ND	ND	0.052 J	--	--	--	--	--	--	--	ND	0.19 J	ND	0.33 J	--	--
Bis(2-ethylhexyl) phthalate	--	ND	ND	ND	ND	--	--	--	--	--	--	--	1.41	ND	ND	ND	--	--
Butyl benzyl phthalate	--	ND	ND	ND	ND	--	--	--	--	--	--	--	ND	0.4 J	ND	ND	--	--
Carbazole	--	ND	ND	ND	0.045 J	--	--	--	--	--	--	--	ND	ND	ND	ND	--	--
Chrysene	1	ND	ND	ND	0.12	--	--	--	--	--	--	--	0.046 J	0.37 J	ND	0.63 J	--	--
Fluoranthene	100	ND	0.041 J	ND	0.31	--	--	--	--	--	--	--	0.069 J	0.64	ND	1	--	--
Fluorene	30	ND	ND	ND	ND	--	--	--	--	--	--	--	ND	ND	ND	ND	--	--
Indeno(1,2,3-cd)pyrene	0.5	ND	ND	ND	0.063 J	--	--	--	--	--	--	--	ND	0.34 J	ND	0.53 J	--	--
Naphthalene	12	ND	0.25	ND	ND	--	--	--	--	--	--	--	ND	ND	ND	ND	--	--
Phenanthrene	100	ND	ND	ND	0.22	--	--	--	--	--	--	--	0.045 J	0.24 J	0.046 J	0.3 J	--	--
Pyrene	100	ND	ND	ND	0.23	--	--	--	--	--	--	--	0.066 J	0.55 J	ND	0.91 J	--	--
Total Metals - mg/Kg																		
Aluminum	--	15300	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Arsenic	13	12.3 J	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Barium	350	90.9	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Beryllium	7.2	0.807	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Cadmium	2.5	0.879 J	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Calcium	--	33100 J	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Chromium	30	21.9	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Cobalt	--	11.6 J	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Copper	50	30.9 J	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Iron	--	30100 J	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Lead	63	14 J	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Magnesium	--	14900 J	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Manganese	1600	480	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Nickel	30	32.9 J	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Potassium	--	2180	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Sodium	--	739 J	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Vanadium	--	31.9	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Zinc	109	68.9	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Mercury	0.18	0.0134 J	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Pesticides and Herbicides - mg/Kg³																		
4,4'-DDT	0.0033	ND	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
alpha-BHC	0.02	ND	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
Endrine ketone	--	ND	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1. Only those parameters detected at a minimum of one sample location are presented in this table; all other compounds were reported as non-detect.
2. Values per NYSDEC Part 375 Soil Cleanup Objectives (December 2006)
3. Sample results were reported by the laboratory in ug/kg and converted to mg/kg for comparison to SCOs.

Definitions:

- ND = Parameter not detected above laboratory detection limit.
- = Sample not analyzed for parameter or no SCO available for the parameter.
- J = Estimated value; result is less than the sample quantitation limit but greater than zero.
- D = Compounds were identified in an analysis at the secondary dilution factor.
- M = Matrix spike outside QC Limit, Matrix bias indicated.
- T = Sample had an adjusted final volume during extraction due to extract matrix and/or viscosity.

BOLD = Result exceeds Part 375 Unrestricted Use SCOs.



TABLE 6

SUMMARY OF GROUNDWATER ANALYTICAL RESULTS

348 LANGNER ROAD SITE

WEST SENECA, NEW YORK

PARAMETER ¹	GWQS ²	Sample Location								
		MW-1	MW-2	MW-3	MW-4	MW-5	MW-6 ³	MW-7	MW-8	MW-9
		03/27/12					11/19/12	03/27/12		
Volatile Organic Compounds (VOCs) - ug/L										
2-Butanone (MEK)	50	ND	ND	ND	ND	ND	ND	ND	ND	8.59 J
Acetone	50	ND	ND	6.57 J	ND	12.9	0.002	ND	ND	19.1
2-Hexanone	--	ND	ND	ND	ND	ND	ND	ND	ND	3.74 J
Methyl tert butyl ether (MTBE)	10	ND	ND	1.24 J	ND	4.63	ND	ND	ND	ND
Methylene chloride	5	ND	ND	ND	ND	ND	ND	ND	ND	ND
Semi-Volatile Organic Compounds (SVOCs) (ug/L)										
3-Methylphenol/4-Methylphenol	5	ND	ND	ND	ND	ND	0.0032 J	ND	ND	ND
Fluoranthene	50	ND	ND	ND	ND	ND	0.00005 J	ND	ND	ND
Fluorene	50	ND	ND	ND	ND	ND	0.0001 J	ND	ND	ND
Hexachloroethane	5	ND	ND	ND	ND	ND	0.00007 J	ND	ND	ND
Phenanthrene	50	ND	ND	ND	ND	ND	0.00018 J	ND	ND	ND
Dissolved Metals - ug/L										
Aluminum	--	ND	ND	ND	ND	ND	0.045 J	103 J	ND	ND
Arsenic	25	11 J	8 J	ND	ND	ND	0.0037	11 J	ND	8 J
Barium	1000	754 J	200 J	83 J	158 J	ND	0.2843	183 J	92 J M	339 J
Calcium	--	748000 J	333000 J	236000 J	250000 J	119000 J	146	74700 J	170000 J	449000 J
Chromium	50	ND	ND	ND	ND	ND	0.0005 J	ND	ND	ND
Copper	200	ND	ND	ND	ND	ND	0.0055	ND	ND	ND
Cyanide	200	ND	ND	ND	34 J	ND	ND	12 J	ND	14 J
Iron	300	ND	ND	ND	ND	ND	0.884	183 J	ND	574 J
Lead	25	ND	ND	ND	ND	ND	0.0021	22 J	ND	ND
Magnesium	35000	252000 J	112000 J	84000 J	91700 J	33400 J	56.6	9850 J	80300 J	57800 J
Manganese	300	458 J	459 J	376 J	406 J	1120 J	0.3094	200 J	768 J	1610 J
Nickel	100	ND	ND	ND	23 J	31 J	0.2471	86 J	ND	22 J
Potassium	--	11000 J	5050 J	4400 J	3780	1680 J	3.93	83400 J	5170 DJ	22100 J
Sodium	20000	200000 J	485000 J	79000 J	505000 J	70800 J	329	7160000 J	491000 J	3150000 J
Vanadium	14	ND	ND	ND	ND	ND	0.002 J	ND	ND	ND
Zinc	2000	ND	ND	ND	ND	ND	0.0265	ND	ND	ND
Pesticides and Herbicides - ug/L										
4,4'-DDD	0.3	ND	0.22 JN	ND	0.177 JN	0.243 JN	ND	0.16 JN	ND	ND
4,4'-DDE	0.2	0.0708 J	0.158 J	ND	ND	ND	ND	ND	ND	0.0651 JN
4,4'-DDT	0.2	0.14 J	0.145 J	0.122 J	0.123 JN	0.109 JN	ND	0.121	0.136 J	0.113 J
Aldrin	ND	ND	0.286 J	0.215 JN	ND	ND	ND	ND	0.245 JN	0.19 JN
delta-BHC	0.01	ND	ND	ND	ND	ND	ND	ND	0.0513 C J	ND
gamma-Chlordane	0.05	ND	ND	ND	ND	ND	ND	0.0503 JN	0.0967 JN	ND
alpha-Chlordane	0.05	0.0606 JN	0.12 JN	ND	ND	ND	ND	0.0832 JN	0.115 J	ND
Dieldrin	0.004	ND	0.204 J	ND	ND	ND	ND	0.157 J	ND	0.136 JN
Endosulfan I	--	0.132 J	0.201 J	ND	0.0946 J	ND	ND	ND	0.0995 J	0.206 JN
Endosulfan Sulfate	--	ND	ND	ND	0.0569 JN	0.0773 C J	ND	0.0608 JN	0.081 J	ND
Endrin	ND	0.144 J	0.283 J	0.0535 J	0.122 J	0.132 J	ND	ND	0.143 J	0.194 J
Endrin Aldehyde	5	0.0973 C J	0.121 J	0.117 J	0.199 JN	0.0733 J	ND	ND	0.0789 J	ND
Endrin Ketone	5	ND	ND	ND	ND	0.0912 J	ND	ND	ND	ND
Heptachlor epoxide	0.03	0.13 JN	0.248 JN	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 NYSDEC Division of Water Ambient Water Quality Standards and Guidance Values and Groundwater Effluent Limitations - Class GA (TOGS 1.1.1)
- MW-6 was resampled after the initial analysis was determined to be influenced by lab contamination.

Definitions:

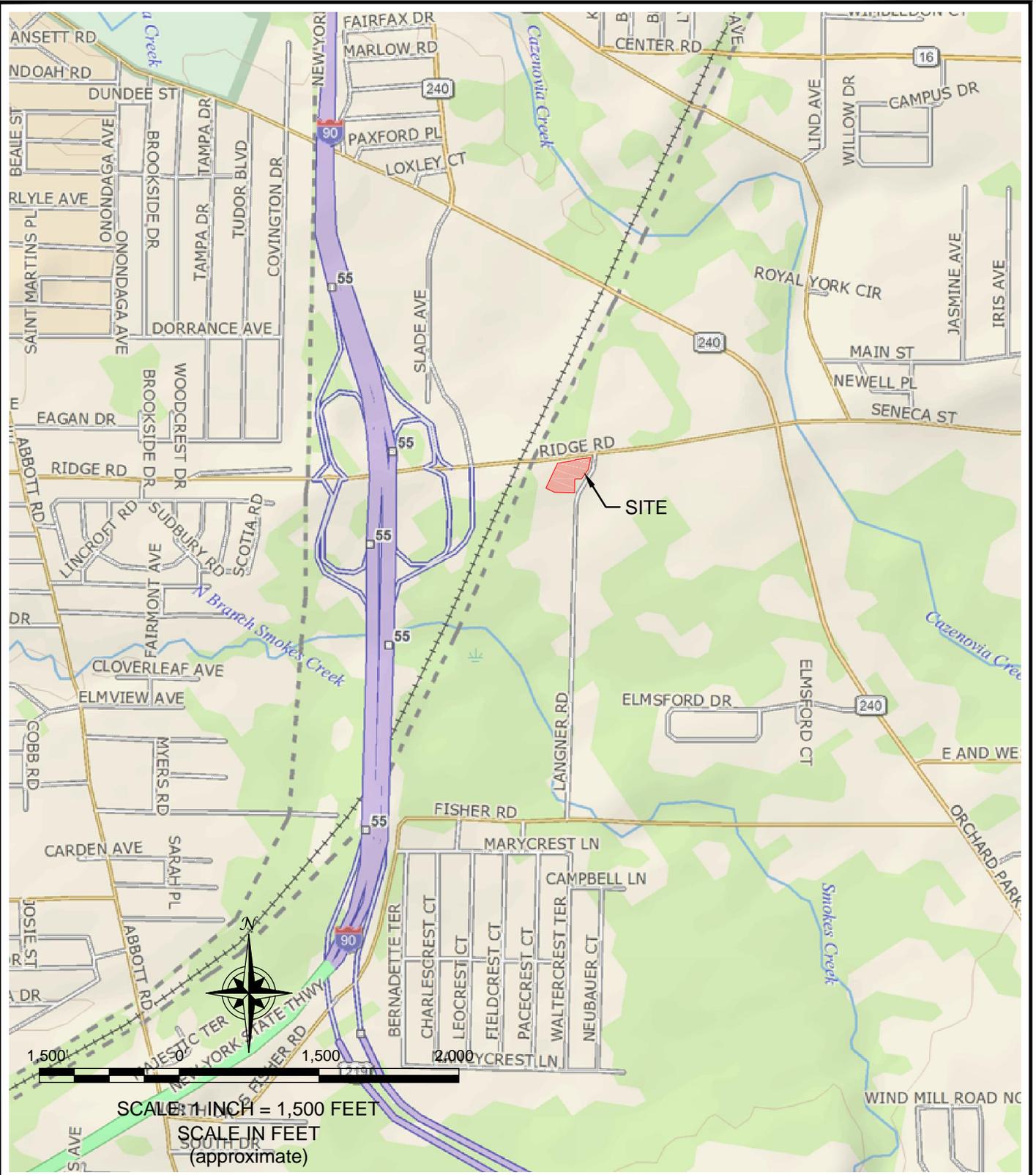
ND = Parameter not detected above laboratory detection limit.
 "--" = Sample not analyzed for parameter or no SCO available for the parameter.
 J = Estimated Value - Below calibration range
 M = Matrix spike outside QC Limit, Matrix bias indicated.
 N = Indicates presumptive evidence of compound.
 C = concentration differs by more than 40% between the primary and secondary columns.

BOLD = Result exceeds GWQS.

FIGURES

FIGURE 1

F:\CAD\TurnKey\Delta Sonic\West Seneca (1802)\FER\Figure 1: Site Location and Vicinity Map.dwg



SITE LOCATION AND VICINITY MAP

FINAL ENGINEERING REPORT
348 LANGNER ROAD SITE

WEST SENECA, NEW YORK
PREPARED FOR
DELTA SONIC CAR WASH SYSTEMS, INC.



2558 HAMBURG TURNPIKE
SUITE 300
BUFFALO, NY 14218
(716) 856-0635

PROJECT NO.: 0123-012-002

DATE: MAY 2013

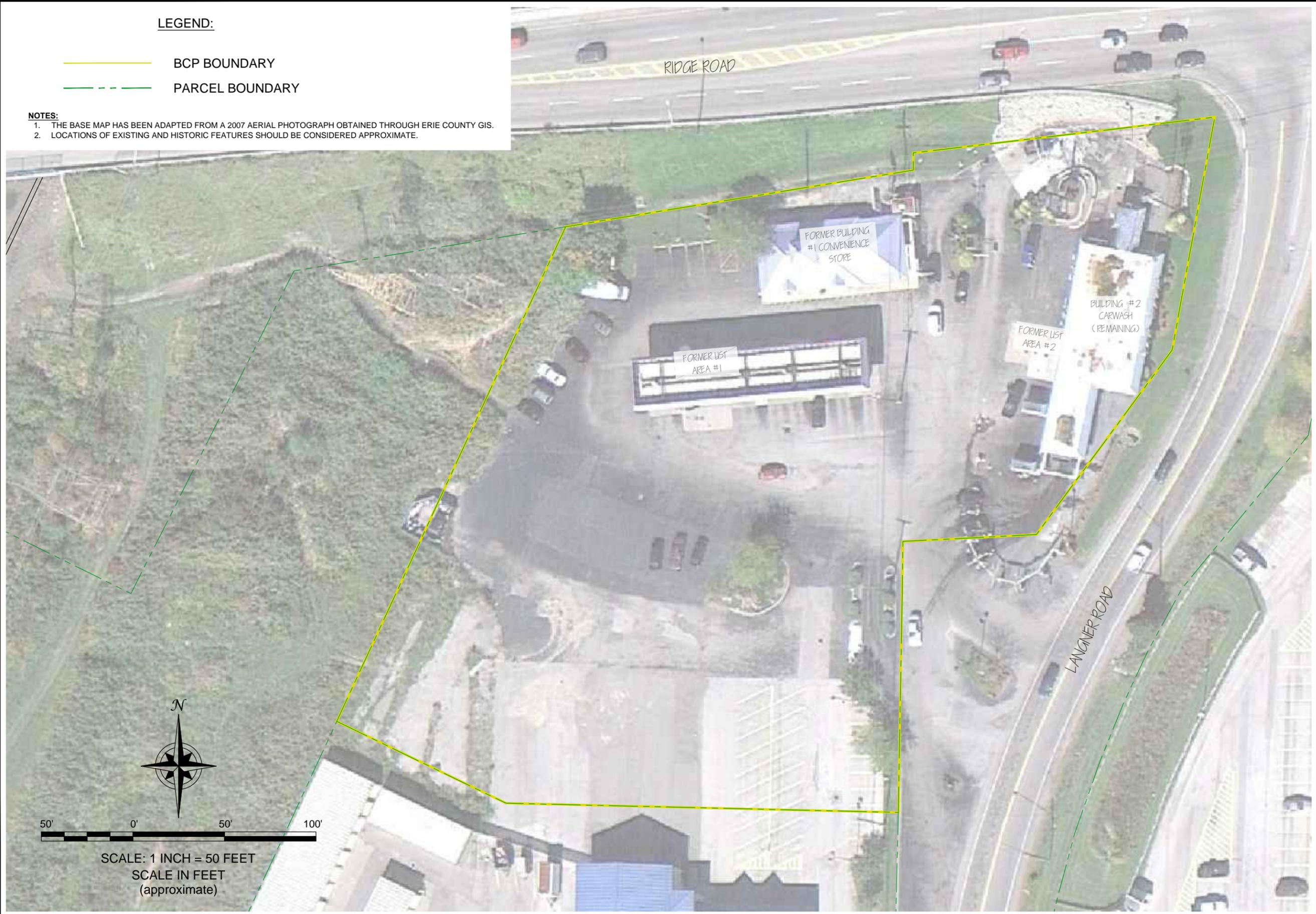
DRAFTED BY: JGT

LEGEND:

-  BCP BOUNDARY
-  PARCEL BOUNDARY

NOTES:

1. THE BASE MAP HAS BEEN ADAPTED FROM A 2007 AERIAL PHOTOGRAPH OBTAINED THROUGH ERIE COUNTY GIS.
2. LOCATIONS OF EXISTING AND HISTORIC FEATURES SHOULD BE CONSIDERED APPROXIMATE.



2558 HAMBURG TURNPIKE
SUITE 300
BUFFALO, NY 14218
(716) 856-0635



JOB NO.: 0123-012-002

**SITE PLAN (AERIAL)
(PRE-REMEDIATION)**

FINAL ENGINEERING REPORT

348 LANGNER ROAD SITE

BUFFALO, NEW YORK

PREPARED FOR

DELTA SONIC CAR WASH SYSTEMS, INC.

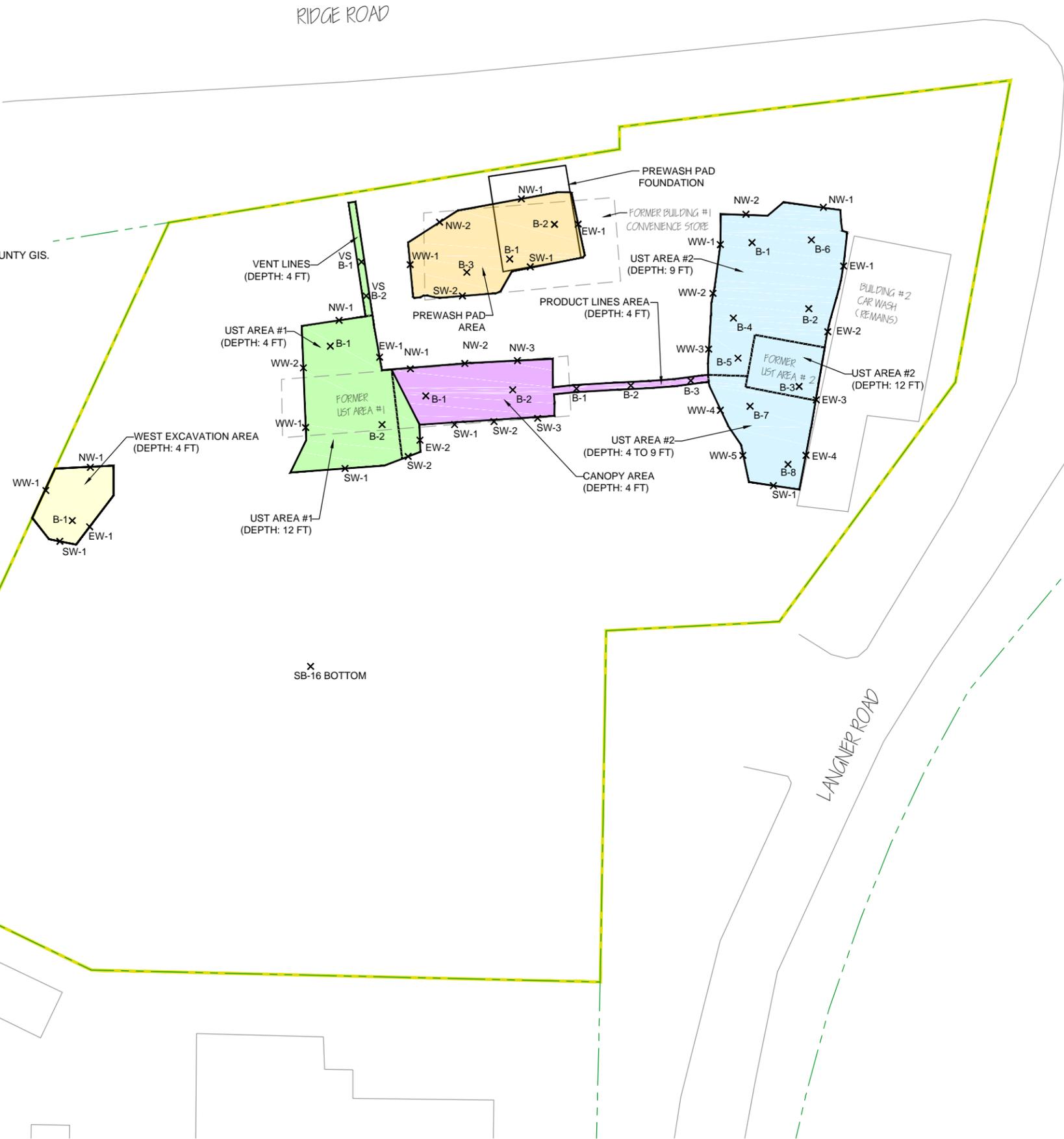
FIGURE 2

LEGEND

- BCP BOUNDARY
- PARCEL BOUNDARY
- EXISTING BUILDINGS
- SW-1 X POST EXCAVATION SAMPLE
- UST AREA #1 IRM EXCAVATION LIMITS
- UST AREA #2 AND VENT STACK IRM EXCAVATION LIMITS
- CANOPY AREA AND PRODUCT LINES IRM EXCAVATION LIMITS
- WEST AREA IRM EXCAVATION LIMITS
- PREWASH PAD EXCAVATION LIMITS

NOTES:

1. THE BASE MAP HAS BEEN ADAPTED FROM A 2007 AERIAL PHOTOGRAPH OBTAINED THROUGH ERIE COUNTY GIS.
2. LOCATIONS OF EXISTING AND HISTORIC FEATURES SHOULD BE CONSIDERED APPROXIMATE.



SCALE: 1 INCH = 50 FEET
SCALE IN FEET (approximate)



2866 HAMBURG TURNPIKE
SUITE 300
BURTON, NY 14818
(716) 866-0835



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JOB NO.: 0123-012-002

IRM ACTIVITIES (RECORD DRAWING)

FINAL ENGINEERING REPORT
348 LANGNER ROAD SITE
WEST SENECA, NEW YORK
PREPARED FOR
DELTA SONIC CAR WASH SYSTEM, INC.

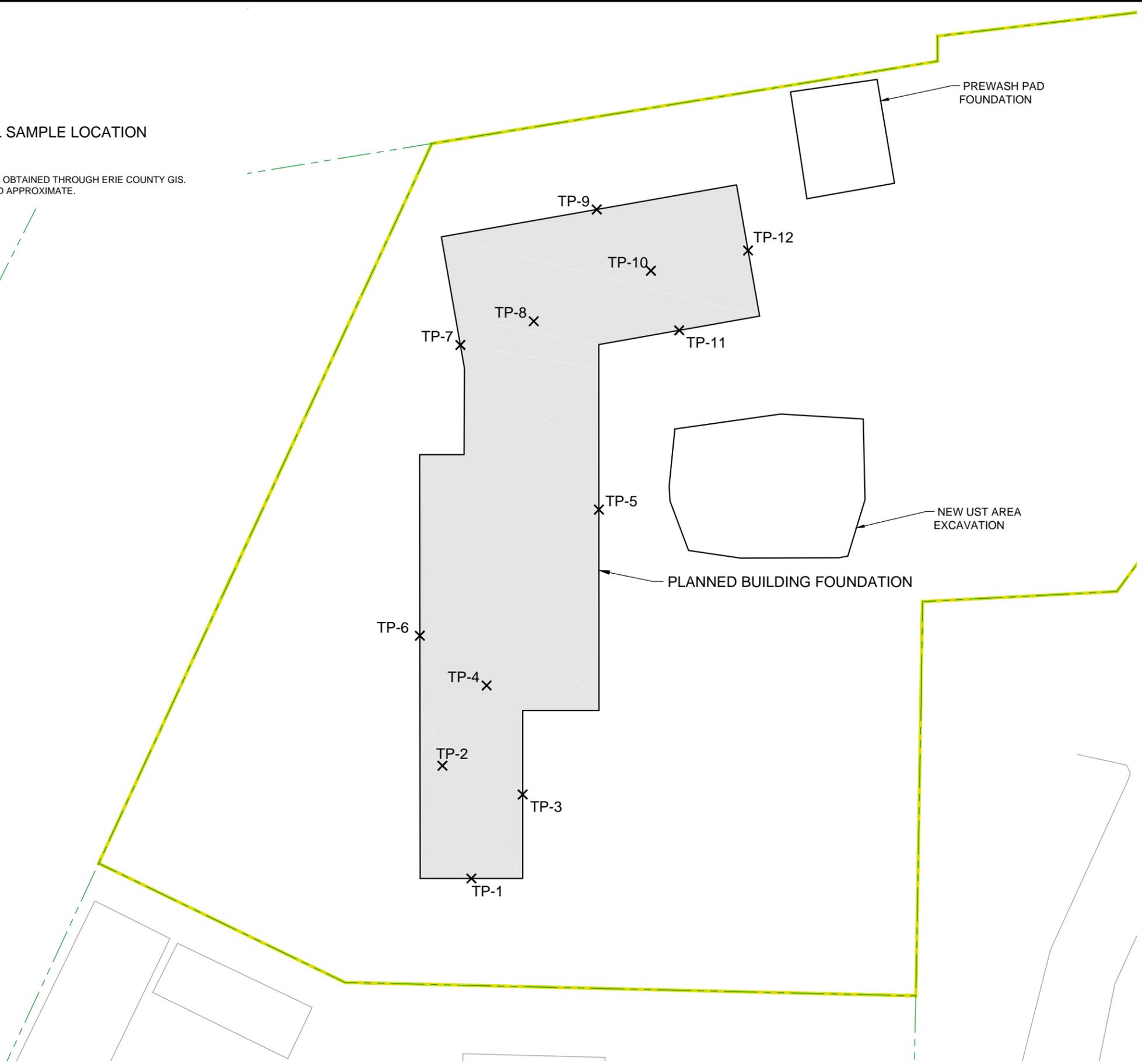
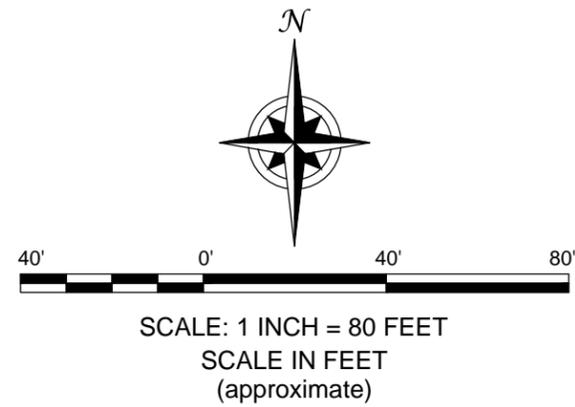
FIGURE 3

LEGEND:

-  BCP BOUNDARY
-  PARCEL BOUNDARY
- TP-4 X CHARACTERIZATION SOIL SAMPLE LOCATION

NOTES:

1. THE BASE MAP HAS BEEN ADAPTED FROM A 2007 AERIAL PHOTOGRAPH OBTAINED THROUGH ERIE COUNTY GIS.
2. LOCATIONS OF PLANNED BUILDING FEATURES SHOULD BE CONSIDERED APPROXIMATE.



**OFF-SITE REUSE CHARACTERIZATION
SAMPLE LOCATIONS**

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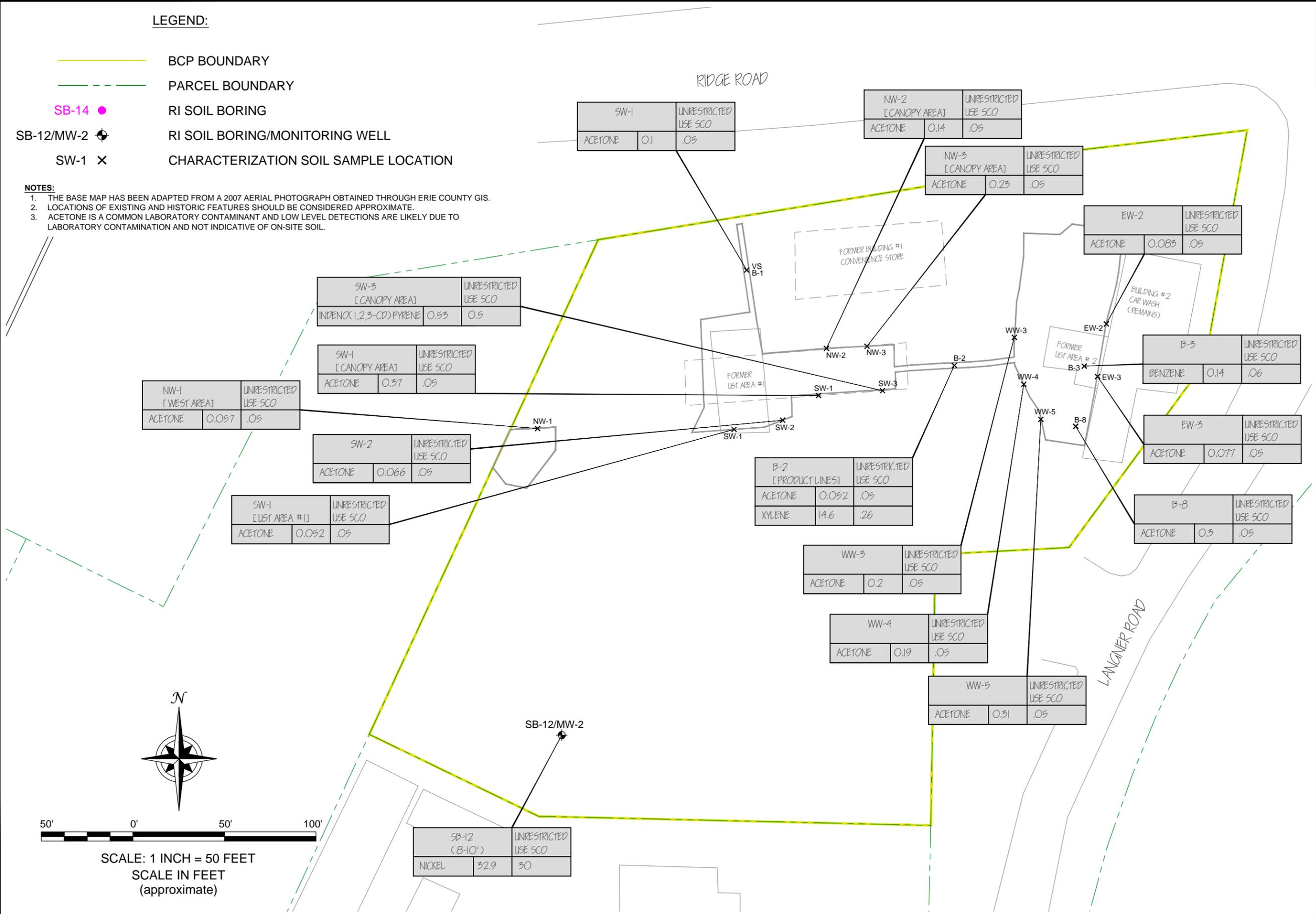
FIGURE 4

LEGEND:

- BCP BOUNDARY
- - - PARCEL BOUNDARY
- SB-14 RI SOIL BORING
- ⊕ SB-12/MW-2 RI SOIL BORING/MONITORING WELL
- × SW-1 CHARACTERIZATION SOIL SAMPLE LOCATION

NOTES:

1. THE BASE MAP HAS BEEN ADAPTED FROM A 2007 AERIAL PHOTOGRAPH OBTAINED THROUGH ERIE COUNTY GIS.
2. LOCATIONS OF EXISTING AND HISTORIC FEATURES SHOULD BE CONSIDERED APPROXIMATE.
3. ACETONE IS A COMMON LABORATORY CONTAMINANT AND LOW LEVEL DETECTIONS ARE LIKELY DUE TO LABORATORY CONTAMINATION AND NOT INDICATIVE OF ON-SITE SOIL.



SCALE: 1 INCH = 50 FEET
SCALE IN FEET (approximate)

REMAINING ON-SITE SOIL/FILL EXCEEDING UNRESTRICTED USE SCOS

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FIGURE 5

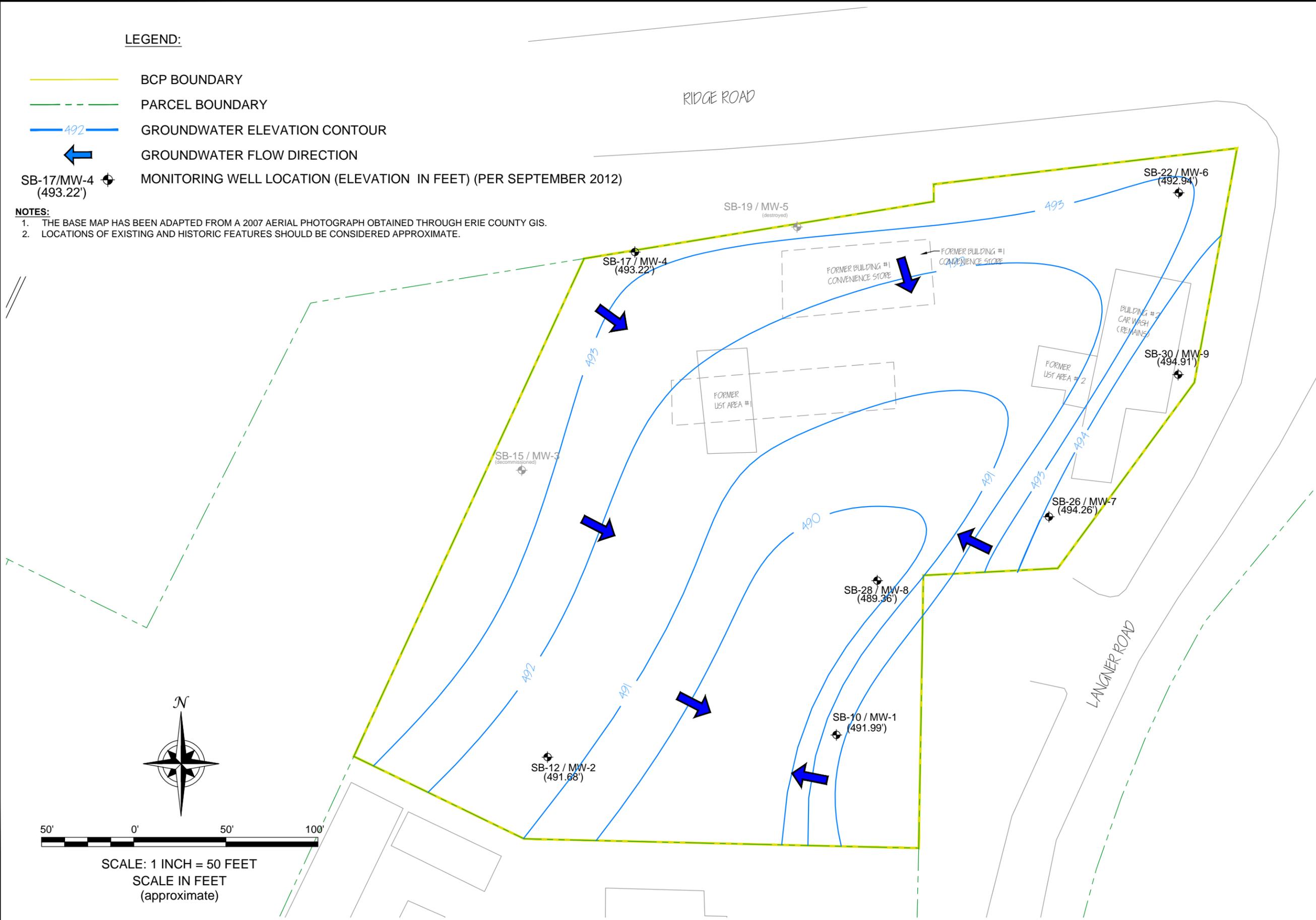
LEGEND:

-  BCP BOUNDARY
-  PARCEL BOUNDARY
-  GROUNDWATER ELEVATION CONTOUR
-  GROUNDWATER FLOW DIRECTION

 SB-17/MW-4 (493.22') MONITORING WELL LOCATION (ELEVATION IN FEET) (PER SEPTEMBER 2012)

NOTES:

1. THE BASE MAP HAS BEEN ADAPTED FROM A 2007 AERIAL PHOTOGRAPH OBTAINED THROUGH ERIE COUNTY GIS.
2. LOCATIONS OF EXISTING AND HISTORIC FEATURES SHOULD BE CONSIDERED APPROXIMATE.



SCALE: 1 INCH = 50 FEET
SCALE IN FEET (approximate)

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GROUNDWATER MONITORING WELL LOCATIONS & ISOPOTENTIAL MAP

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FIGURE 6

APPENDIX A

SURVEY MAP

APPENDIX B

ELECTRONIC COPY OF FER

(CD ENCLOSED)

APPENDIX C

PERMITS, APPLICATIONS, AND APPROVALS

APPENDIX D

FACT SHEETS

APPENDIX E

COMMUNITY AIR MONITORING PROGRAM

(CD ENCLOSED)

APPENDIX F

DAILY REPORTS

(CD ENCLOSED)

APPENDIX G

PROJECT PHOTO LOG

APPENDIX H

SOIL/WASTE CHARACTERIZATION DOCUMENTATION

<i>Appendix H1</i>	<i>Treatment and Disposal Facility Applications and Approval Letters</i>
<i>Appendix H2</i>	<i>Waste Manifests, Treatment/Recycling Receipts, and Bills of Lading (CD)</i>
<i>Appendix H3</i>	<i>Load Summaries</i>

APPENDIX H1

TREATMENT AND DISPOSAL FACILITY APPLICATION AND APPROVAL LETTERS

APPENDIX H2

WASTE MANIFESTS, TREATMENT/RECYCLING RECEIPTS,
AND BILLS OF LADING

(CD ENCLOSED)

APPENDIX H3

LOAD SUMMARY

APPENDIX I

BACKFILL MATERIAL DOCUMENTATION

APPENDIX J

DATA USABILITY SUMMARY REPORT (DUSR)

APPENDIX K

LABORATORY ANALYTICAL DATA REPORTS

(CD ENCLOSED)