Speedy's Cleaners
3130 Monroe Avenue
Town of Pittsford
Rochester, New York 14618

Monroe County

NYSDEC Site Number: C828109

Corrective Measures Report
Periodic Review Report

August 2019
Revised November 2019

Prepared for:

3130 Monroe Avenue Associates, LLC
P.O. Box 499
Pittsford, New York 14534

Prepared by:

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2110 S. Clinton Ave, Suite 1
Rochester, New York 14618

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1.0 Introduction

The subject site is the former Speedy's Cleaners located at 3130 Monroe Avenue in the Town of Pittsford, New York (the "Site"). 3130 Monroe Avenue Associates, LLC (MAA) entered into the Brownfield Cleanup Agreement (BCA) with the New York State Department of Environmental Conservation (NYSDEC) to develop and implement a remedial program at the Site on October 14, 2004. After completing the remedial program, NYSDEC issued a Certificate of Completion (COC) on December 31, 2012. MAA filed an Easement, and a Site Management Plan (SMP), was developed. The requirements of the SMP are incorporated into the Easement. The SMP, approved by the NYSDEC on December 31, 2012, requires MAA to manage and maintain institutional and engineering controls which includes annual sampling of indoor air and groundwater, and the submission of an annual Periodic Review Report (PRR) certifying that all institutional and engineering controls remain in place, are performing properly, and continue to be effective. MAA violated the SMP, Easement, and BCA by failing to submit a PRR for the reporting periods from December 2012 to January 2017.

Ravi Engineering & Land Surveying, P .C. (RE&LS) met NYSDEC at the Site in March 2017 to review the present day Site conditions and determine what measures will be required to bring the Site into BCA compliance. The following BCA violations were noted:

- Indoor air samples collected by RE&LS on January 7, 2016 were found to contain concentrations of perchloroethylene (PCE), also known as tetrachloroethene, in exceedance of the NYSDOH September 2013 *New Ambient Air Guidance for Tetrachloroethene* (NYSDOH 2013 guideline) of 30 $\mu g/m^3$.

- BCA monitoring wells and bioremediation injection wells were found to be in varying states of disrepair.

- A former heating oil diesel tank cover, labeled "diesel" was apparently reused as a cover for an injection well after the tank was removed in March 1999, raising concerns that a buried tank is present or that the well could be mistaken for a diesel tank fill pipe.

- Minor cracks and potholes were observed in the site cover system (asphalt parking lot surface).

This Corrective Measures Report (CMR) documents the work performed to correct the above deficiencies and bring the Site into compliance with the BCA and SMP.

2.0 Work Plans and NYSDEC Approvals

RE&LS submitted the following work plans for work completed relative to the corrective measures performed at the Site:

1. The October 2017 *Corrective Measures Work Plan (CMWP)* outlines the work necessary to bring the Site into compliance with the BCA.

2. The *SSDS Enhancement Work Plan*, submitted to the NYSDEC in March 2018 and approved by the NYSDEC on June 8, 2018, provides the details of proposed modifications to the SSDS to improve indoor air conditions.

3. The *Interior Vapor Investigation Work Plan,* submitted to the NYSDEC in December 2018 and approved by the NYSDEC on December 19, 2018, provides the details of real-time indoor air sampling using a FROGG 4000 portable gas chromatograph to identify areas of the subject building that may require additional SSDS coverage, and any potential previously unidentified sources of contamination.

4. Per an email dated April 2, 2019 to the NYSDEC, RE&LS proposed the installation of an additional vacuum point to the SSDS to provide additional depressurization in the northwest building corner to address persistent PCE concentrations above NYSDOH guidelines. The NYSDEC approved of this additional vacuum point via email correspondence dated April 3, 2019.

3.0 SSDS Enhancements

The SSDS was installed in 2006 as a BCA Interim Remedial Measure (IRM) by Mitigation Tech (MT) to mitigate vapor intrusion issues, and modifications were made in 2006 and 2009 to improve the SSDS efficiency. Indoor air sampling indicated PCE was in compliance with the NYSDOH guidance value of 100 ug/m^3 for PCE at that time; however, the NYSDOH lowered the ambient indoor air guideline for PCE to 30 µg/m^3 in 2013. Indoor air samples collected by RE&LS on January 7, 2016 were found to contain concentrations of PCE in exceedance of the September 2013 *New Ambient Air Guidance for Tetrachloroethene*.

The following timeline details the work performed to increase the efficiency and coverage of the SSDS in order to reduce concentrations of PCE in indoor air within the subject building:

1. The SSDS was inspected by MT on March 1, 2017. All components of the system were inspected for condition and proper operation and were found to be working properly and in acceptable condition. Simple adjustments to optimize the system performance were made. The system was tested for leaks; none were found. The Heat Recovery Ventilator (HRV) device filters were cleaned and the discharge points were inspected to verify that no air intakes have been located nearby. Sample pressure field extension testing was conducted; the system was determined to be maintaining a sufficient vacuum beneath the slab. The system was determined to be operating according to expectations and specifications. A length of PVC pipe and fittings were added to the exhaust to elevate the discharge point to approximately 1.3 feet above the roof deck. MT inspected the SSDS and the Heat Recovery Ventilator (HRV) System that was retrofitted to the HVAC system. The HRV relies on the HVAC ducts to deliver fresh air to the building interior; it

was designed with the understanding that the HVAC fan was to be left in continuous operation. During the inspection, it was noted that the tenant had set the HVAC blower fan to "auto" instead of in the "on" position; therefore the fan had been functioning intermittently instead of continuously. This adjustment adversely affects the dilution rate of the indoor air, as outdoor air being introduced into the building through the HRV was not being distributed to the building interior when the fan the system was not in operation. Subsequent indoor air sampling conducted on March 21, 2017 indicated PCE concentrations continued to be present in exceedance of the NYSDOH 2013 guideline.

2. The system was modified by MT in October 2017 for continuous operation. Indoor air samples conducted on December 5, 2017 indicated that the PCE concentration continued to be in exceedance of the NYSDOH 2013 guideline.

3. A series of sub-slab differential pressure measurements was performed by MT on March 9, 2018 to determine the SSDS coverage and efficiency. The peripheral area (south corner, north corner, and west interior corners) were determined to be lacking in depressurization. Based on these measurements, the *SSDS Enhancement Work Plan* was prepared by RE&LS, and executed on July 2 & 3, 2018.

   Prior to making modifications to the system, MT performed another round of differential pressure testing throughout both tenant spaces to establish baseline differential levels (Figure 1). Once established, the following enhancements were performed:

   - Enhancement 1

     The main system was split into two separate systems, and a fan, a manometer, and an alarm were added so that each system is equipped with these dedicated features. MT replaced the existing blower with (2) 120 volt, 302 watt high capacity Festa Force fan with 4-inch diameter inlets; separate fans were installed in the east and west tenant spaces. According to the manufacturer's specifications, this model fan can produce vacuum of up to five (5) inches of water column (WCI) and airflow of up to 240 cubic feet per minute (CFM).

   - Enhancement 2

     MT upgraded the exterior pipe to a 4-inch diameter to the first interior “T” joint in the southeast tenant space. MT determined that since the fan in the northwest tenant space was already at capacity, an increase in the diameter of the pipe would have little or no effect on this system.

   - Enhancement 3

     The work plan called for an upgrade to the northwest space interior end line to a 3-inch diameter pipe. An additional suction point was also to be installed to the right of the entrance of the north tenant space. However, MT stated that by splitting the

system into two, the power of the system was effectively increased. In place of additional suction points and increased diameter piping, MT was able to modulate the system by partially closing a valve installed in the suction point piping which effectively equalized the system by reducing the pressure differential in the vicinity of the suction points, increasing the pressure differential near the terminus of the system as demonstrated by the increase in the pressure differential in test points (TPs) 6 and 7 (TP-6 and TP-7).

- Enhancement 4

MT added a suction point in the deficient area near the south corner of the building with an exposed pipe from the floor to the drop ceiling.

- Enhancement 5

MT added an additional suction point and Radon Away RP-265 fan with 4" PVC inlets near the northeast corner of the building. According to the manufacturer's specifications, this model fan can produce vacuum of up to two (2) inches of water column (WCI) and airflow of up to 375 cubic feet per minute (CFM).

SSDS Enhancement Results and Confirmatory Sampling

A comparison of the pressure differential testing done before and after the system upgrades indicates that the pressure differential generally increased after the upgrades were completed. Specifically, of the four areas previously identified as having differential deficiencies, the differential increased in three of these locations (TP-1, TP-4, and TP-7). The fourth location (TP-8) was unchanged; however, this area had a relatively high differential prior to the upgrades (Table 1).

Table 1: Pressure Differentials Before and After SSDS Enhancements

Location	Location ID	Pressure Differential Prior to Enhancements	Pressure Differential after System Split	Differential Pressure After Enhancements
East corner of building	TP-1*	0.000	-0.005	NA
Southeast side of building	TP-2	-0.174	NA	NA
Southeast side of building	TP-3	-0.009	-0.014	NA
South corner of building	TP-4*	0.000	-0.001	-0.012
Center of building	TP-5	-0.058	-0.082	NA
Southwest end of building	TP-6	-0.004	NA	-0.011
West corner of building	TP-7*	-0.006	NA	0.010
North corner of building	TP-8*	-0.020	NA	-0.020

NA – Not applicable
Units are in inH_2O
*Indicates an area where pressure differential deficiencies were previously identified.

Confirmatory indoor air samples collected on September 9, 2018 indicated that PCE concentrations were below the NYSDOH guideline; however, as this work was completed outside of the indoor "heating season," another round of sampling was performed in November 26, 2018 during the 2018-19 heating season. Sample results indicated that PCE concentrations continued to be above the NYSDOH guideline.

4. RE&LS and Mitigation Tech performed an Interior Vapor Investigation on April 8, 2019 using a "Frogg 4000" portable gas chromatograph (GC) designed for real-time portable analysis of volatile organic compounds (VOCs) in water, soil, and air. Samples were collected from indoor air, sub-slab air, the SSDS exhaust stream, and from the ceiling plenum. Sub-slab vacuum differential pressure was measured and recorded simultaneously.

   The investigation results indicated an area in the northeast portion of the building that had higher PCE concentrations than the rest of the building, as well as low sub-slab differential pressures. These data indicated that the installation of a vacuum point in this area was warranted. The additional vacuum point (Enhancement 5) was installed on April 8, 2019 (Figure 1). Confirmatory indoor air samples collected on April 15, 2019 indicated that PCE concentrations were below the NYSDOH 2013 guideline.

4.0 Indoor Air Sampling Methodology and Results

RE&LS performed annual indoor air sampling on January 7, 2016, March 21, 2017, December 5, 2017, September 8, 2018, November 26, 2018 and April 15, 2019 to confirm the performance of the SSDS and evaluate indoor air conditions.

Samples were collected with Summa canisters, over an eight-hour period, during business hours, and analyzed for volatile organic compounds (VOCs) by United States Environmental Protection Agency (EPA) Method Toxic Organics (TO)-15 with Category B deliverables. Except for one sampling event (August 9, 2018), samples were collected during the indoor "heating season" when doors and windows are generally kept closed and heating systems are operating.

Indoor air samples collected in 2016, 2017, and 2018 indicate that PCE concentrations continued to be above the NYSDOH 2013 guideline of 30 $\mu g/m^3$ for PCE despite upgrades to the SSDS; concentrations ranged from 21-160 $\mu g/m^3$.

Indoor air samples collected on April 15 to evaluate the performance of the April 8, 2019 SSDS modifications (see item #5 in Section 3.0), as well as to satisfy the annual indoor air requirement per the SMP, indicate that PCE concentrations are below NYSDOH 2013 guidelines (Table 1).

Table 2: Historical Comparison of TCE & PCE Detections in Indoor Air

Sample Date	Sample ID	TCE	PCE
NYSDOH Ambient Indoor Guidelines		*2*	*30*
January 7, 2016	AS-S-20160107	0.7	**38**
	AS-N-20160107	0.7	**44**
March 21, 2017	AS-1-20170321	0.54	**31**
	AS-2-20170321	0.48	29
December 5, 2017	AS-1-20171205	0.64	**42**
	AS-2-20171205	1.7	**55**
August 9, 2018	AS-1-20180809	0.48	21
	AS-2-20180809	0.38	27
November 26, 2018	AS-1-20181126	0.86	**51**
	AS-2-20181126	1.3	**160**
April 15, 2019	AS-1-20190415	0.38	8.5
	AS-2-20190415	0.27	4.4

Units are in $\mu g/m^3$
Bolded value indicates a concentration of the analyte above the associated NYSDOH guideline.

Indoor air sampling field logs are provided in Appendix A. The indoor air laboratory data are provided in Appendix B.

5.0 Annual Groundwater Sampling Methodology and Results

Groundwater sampling was performed in conformance with the SMP on March 2, 2017 and October 1, 2018. Samples were collected from four existing groundwater monitoring wells using low-flow methodologies. Water quality indicators were monitored and were considered stabilized after three consecutive readings were achieved for the following indicators:

- pH (+/- 0.1 unit)
- specific conductance (+/ -3%)
- dissolved oxygen (+/- 10%)
- redox (+/- 10 mV)
- temperature (+/- 10%)
- turbidity (+/- 10%).

Samples were submitted to an Environmental Laboratory Approval Program (ELAP)-certified laboratory for Target Compound List (TCL) volatile organic compounds (VOCs) by United States Environmental Protection Agency (USEPA) Method 8260 by Analytical Services Protocols (ASP) with Category B deliverables.

Four VOC compounds were detected in one or more of the samples. Samples were compared to 6 NYCRR Part 703 groundwater quality standards. All concentrations were found to be below the associated standard or guideline (Table 2).

Table 3: Detected VOCs in Groundwater

Well ID	HLA-MW-2 (2017)	HLA-MW-2-(2018)	MW-2 (2017)	MW-2-(2018)	MW-3 (2017)	MW-3-(2018)	MW-4 (2017)	MW-4-(2018)	6 NYCRR Part 703 Water Quality Standard
Sample Date	3/2/17	10/1/18	3/2/17	10/1/18	3/2/17	10/1/18	3/2/17	10/1/18	
Analyte									
Acetone	<10.0	<10.0	**6.60 J**	**7.98 J**	<10.0	<10.0	<10.0	<10.0	50
cis-1,1-Dichloroethene	<2.00	<2.00	<2.00	<2.00	<2.00	**1.19 J**	<2.00	<2.00	5
m,p-Xylene	<2.00	<2.00	**1.94 J**	<2.00	<2.00	<2.00	<2.00	<2.00	5
o-Xylene	<2.00	<2.00	**1.99 J**	<2.00	<2.00	<2.00	<2.00	<2.00	5
Tetrachloroethene	< 2.00	< 2.00	< 2.00	< 2.00	**1.92 J**	< 2.00	< 2.00	< 2.00	5

Units are in µg/L
Bolded values indicate the analyte was detected by laboratory analysis
< Analyte not detected by laboratory analysis

The groundwater data are provided in Appendix C. Low flow sampling and purging field logs are provided in Appendix D.

6.0 Data Usability Summary Reports

Laboratory analyses were conducted in conformance with NYS Department of Health (DOH) Analytical Services Protocol (ASP) methodology with a Category B deliverable. Environmental Data Usability (EDU) conducted the third party validation and prepared Data Usability Summary Reports (DUSR).

Indoor Air DUSRs

- SDG C1712024

All results (100%) for three indoor air samples collected on December 5, 2017 are considered usable. Results for hexachlorobutadiene were flagged with a "UJ" as estimated.

- SDG C1703065

All results for three indoor air samples collected on March 2, 2017 are considered usable. Detected results for Freon 11 are flagged with a "J" as estimated.

- SDG C1904047

All results for three indoor air samples collected on April 15, 2019 are considered usable. Non-detected results for 1,4-Dioxane are flagged with a "UJ" as estimated. All detected results for isopropyl alcohol are flagged with a "JN"; compounds are tentatively identified and results are estimated

Groundwater DUSRs

- SDG 0791-01

  The analyte 1,4-Dioxane collected on March 3, 2017 was rejected in all groundwater samples. While some analytes were flagged with a "J" as estimated, all other results are considered usable.

- SDG 184515

  For the four groundwater samples collected on October 1, 2018, all results (100 %) are considered usable and none were flagged as estimated.

DUSRs are provided in Appendix E.

7.0 Well Repairs and Decommissioning

BCA monitoring wells and bioremediation injection were found to be in varying states of disrepair.

Piedmont Equipment, Inc. made minor repairs to four monitoring wells on October 29, 2018.

- HLA-MW-2 received a new casing and concrete pad
- MW-2 received a new casing and concrete pad
- MW-3 received a new concrete pad
- MW-4 received a new concrete pad.

In addition to the well repairs, the following monitor wells and injection wells were decommissioned in December 2018 in conformance with DER-10 protocols and with NYSDEC oversight:

- Injection Well-1
- Injection Well-2
- PA-1
- HLA-MW-1

The wells were grouted in place and then the exposed riser was covered with asphalt to match the existing surface material. The PA-1 "diesel" cover was removed from the Site.

The decommissioned and repaired well locations are shown on Figure 2.

8.0 Surface Cover Reparations

General maintenance of the parking lot surface was performed by the Site owner's contractor in the summer of 2017. Surface cracks were sealed with tar, and a few minor potholes were patched with asphalt.

9.0 Waste Generation and Disposal

Approximately 25 gallons of groundwater was generated during the 2017 groundwater sampling event. The water was disposed of at Canandaigua Waste Water Treatment Facility on 6/15/17.

Approximately 25 gallons of groundwater was generated in December 2018 during purging, sampling and well decommissioning activities. The water was drummed and sampled for disposal. Removal is pending.

During the installation of the new monitor well casings, approximately one 55-gallon drum of parking lot surface material, sub-base, and surficial soils were disturbed. The materials were drummed and sampled for disposal, and removed from the Site by Nature's Way Environmental Consultants & Contractors, Inc. on January 11, 2019.

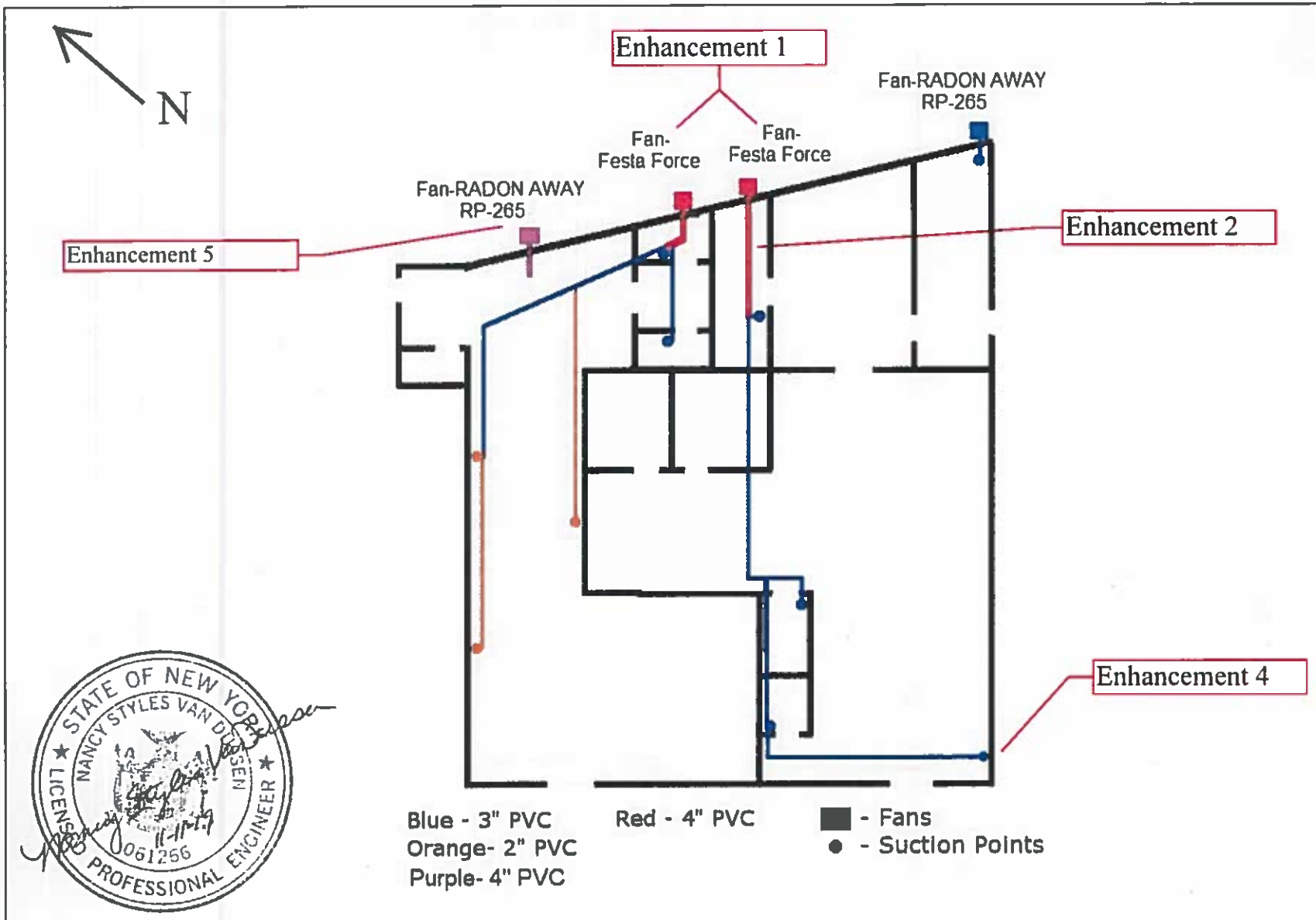
Waste disposal documentation is provided in Appendix F.

10.0 CMWP Compliance

The current status of the Site is as follows:

- Indoor air concentrations of PCE are below the below the NYSDOH 2013 *New Ambient Air Guideline for Tetrachloroethene.*
- All groundwater analytes are below 6 NYCRR Part 703 groundwater standards.
- All but four of the existing monitoring wells were decommissioned; the remaining four monitoring wells were repaired as needed.
- The fuel tank cover labeled "diesel" was removed from the Site.
- Minor cracks and potholes in the asphalt surface cover (ie: cover system) have been patched.

The site is in compliance with the BCA, and as such, no further investigations or modifications are warranted. The Institutional Control/Engineering Control (IC/EC) certification included as Appendix G documents that the IC/EC controls remain in place and are functioning as designed. Annual groundwater and indoor air sampling will continue to be performed in compliance with the SMP. A Periodic Review Report (PRR) will be prepared annually to document future compliance with the BCA and SMP.



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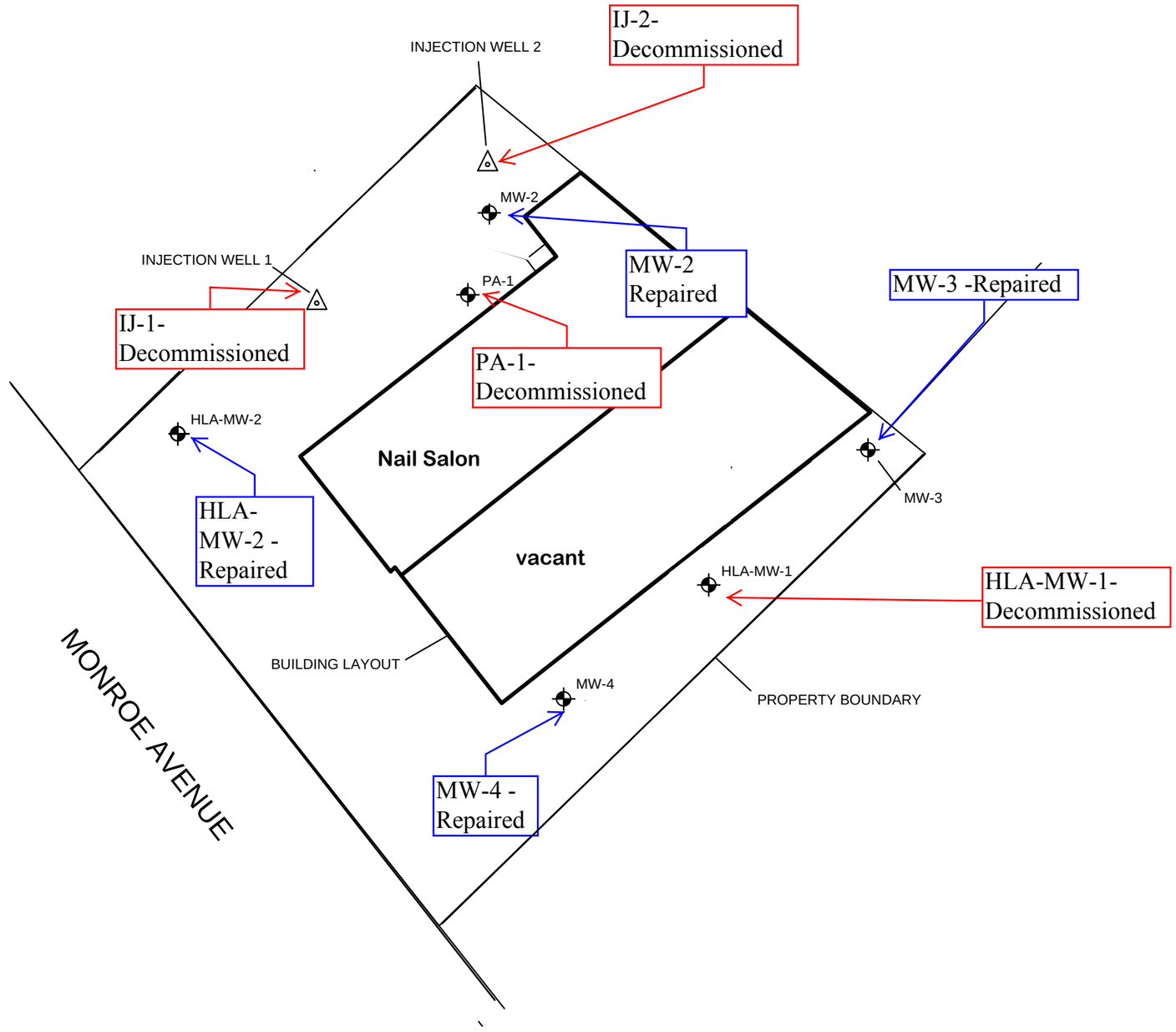
Sub-Slab Depressurization System Enhancements Update
(Original Figure from Mitigation Tech)
3130 Monroe Avenue
Rochester, NY 14618
NYSDEC Site No. C828109

PROJECT NO. 4515042-P	Date: November 2019
Scale: NTS	Figure No: 1

N



LEGEND

MW LOCATION

INJECTION WELL LOCATION

Location of Decommissioned Groundwater Monitor Wells

SPEEDY'S CLEANERS
3130 MONROE AVENUE
PITTSFORD, NEW YORK

DWG #:	DATE:	DRAWN BY:
Figure 2	12-13-18	C.STATT

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RAVI ENGINEERING & LAND SURVEYING, P.C.

APPENDIX A
Indoor Air Sampling Field Log

Indoor Air Sampling Field Log				
Project: 3130 Monroe Avenue	PN: 45-15-042-P	Phase: SSDS Upgrade Inspection		
Sample ID	AS-1-20190415	AS-2-20190415	OS-1-20190415	Notes
Location	Vacant Space	Nail Salon	Outdoor Sample	
Date/Time Start	4-15-19 10:10 am	4-15-19 10:20 am	4-15-19 11:00 am	
Date/Time Stop	4-15-19 6:10 pm	4-15-19 6:20 pm	4-15-19 7:00 pm	
Confirm SSDS Fan Running at Start **(√)**	√	√	**NA**	
Confirm SSDS Fan Running at Stop **(√)**	√	√	**NA**	
Photo of Manometer at Start **(Y/N)**	**Y**	**Y**	**NA**	Vacuum readings: All greater than -2 inH2O
Photo of Manometer at Stop **(Y/N)**	**Y**	**Y**	**NA**	Vacuum readings: All greater than -2 inH2O
Outdoor Air Temperature at Start	39	39	39	
Outdoor Air Temperature at Stop	41	41	41	
Weather at Start	Light rain	Light rain	Light rain	
Weather at Stop	Cloudy	Cloudy	Cloudy	
Canister #	243	539	458	
Regulator #	337	258	382	Regulator 382 started at 35 Hg and ended at 6 Hg
Made copy of COC **(Y/N)**	**Y**	**Y**	**Y**	
Windows/Doors Closed at Start **(Y/N)**	**Y**	**Y**	**NA**	
Windows/Doors Closed at Stop **(Y/N)**	**Y**	**Y**	**NA**	
Furnace Cycling On at Start **(Y/N)**	**Y**	**Y**	**NA**	
Furnace Cycling On at Stop **(Y/N)**	**Y**	**Y**	**NA**	

RAVI ENGINEERING & LAND SURVEYING, P.C.

Appendix B
Indoor Air Laboratory Data

Centek Laboratories, LLC

Date: *28-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20170321
Lab Order:	C1703065	**Tag Number:**	189,378
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	3/23/2017 11:26:00 PM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	3/23/2017 11:26:00 PM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	3/23/2017 11:26:00 PM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	3/23/2017 11:26:00 PM
1,1-Dichloroethene	< 0.59	0.59		ug/m3	1	3/23/2017 11:26:00 PM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	3/23/2017 11:26:00 PM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/23/2017 11:26:00 PM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	3/23/2017 11:26:00 PM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/23/2017 11:26:00 PM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	3/23/2017 11:26:00 PM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	3/23/2017 11:26:00 PM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/23/2017 11:26:00 PM
1,3-butadiene	< 0.33	0.33		ug/m3	1	3/23/2017 11:26:00 PM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/23/2017 11:26:00 PM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/23/2017 11:26:00 PM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	3/23/2017 11:26:00 PM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	3/23/2017 11:26:00 PM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	3/23/2017 11:26:00 PM
Acetone	1900	190		ug/m3	270	3/24/2017 10:03:00 PM
Allyl chloride	< 0.47	0.47		ug/m3	1	3/23/2017 11:26:00 PM
Benzene	0.93	0.48		ug/m3	1	3/23/2017 11:26:00 PM
Benzyl chloride	< 0.86	0.86		ug/m3	1	3/23/2017 11:26:00 PM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	3/23/2017 11:26:00 PM
Bromoform	< 1.6	1.6		ug/m3	1	3/23/2017 11:26:00 PM
Bromomethane	< 0.58	0.58		ug/m3	1	3/23/2017 11:26:00 PM
Carbon disulfide	< 0.47	0.47		ug/m3	1	3/23/2017 11:26:00 PM
Carbon tetrachloride	0.31	0.25		ug/m3	1	3/23/2017 11:26:00 PM
Chlorobenzene	< 0.69	0.69		ug/m3	1	3/23/2017 11:26:00 PM
Chloroethane	< 0.40	0.40		ug/m3	1	3/23/2017 11:26:00 PM
Chloroform	< 0.73	0.73		ug/m3	1	3/23/2017 11:26:00 PM
Chloromethane	1.3	0.31		ug/m3	1	3/23/2017 11:26:00 PM
cis-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/23/2017 11:26:00 PM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/23/2017 11:26:00 PM
Cyclohexane	< 0.52	0.52		ug/m3	1	3/23/2017 11:26:00 PM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	3/23/2017 11:26:00 PM
Ethyl acetate	49	14		ug/m3	27	3/24/2017 9:25:00 PM
Ethylbenzene	< 0.65	0.65		ug/m3	1	3/23/2017 11:26:00 PM
Freon 11	1.6	0.84		ug/m3	1	3/23/2017 11:26:00 PM
Freon 113	< 1.1	1.1		ug/m3	1	3/23/2017 11:26:00 PM
Freon 114	< 1.0	1.0		ug/m3	1	3/23/2017 11:26:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *28-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20170321
Lab Order:	C1703065	**Tag Number:**	189,378
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
Freon 12	2.0	0.74		ug/m3	1	3/23/2017 11:26:00 PM
Heptane	< 0.61	0.61		ug/m3	1	3/23/2017 11:26:00 PM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	3/23/2017 11:26:00 PM
Hexane	< 0.53	0.53		ug/m3	1	3/23/2017 11:26:00 PM
Isopropyl alcohol	270	98		ug/m3	270	3/24/2017 10:03:00 PM
m&p-Xylene	0.61	1.3	J	ug/m3	1	3/23/2017 11:26:00 PM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	3/23/2017 11:26:00 PM
Methyl Ethyl Ketone	15	24	J	ug/m3	27	3/24/2017 9:25:00 PM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	3/23/2017 11:26:00 PM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	3/23/2017 11:26:00 PM
Methylene chloride	0.80	0.52		ug/m3	1	3/23/2017 11:26:00 PM
o-Xylene	< 0.65	0.65		ug/m3	1	3/23/2017 11:26:00 PM
Propylene	< 0.26	0.26		ug/m3	1	3/23/2017 11:26:00 PM
Styrene	< 0.64	0.64		ug/m3	1	3/23/2017 11:26:00 PM
Tetrachloroethylene	31	27		ug/m3	27	3/24/2017 9:25:00 PM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	3/23/2017 11:26:00 PM
Toluene	3.5	0.57		ug/m3	1	3/23/2017 11:26:00 PM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/23/2017 11:26:00 PM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/23/2017 11:26:00 PM
Trichloroethene	0.54	0.21		ug/m3	1	3/23/2017 11:26:00 PM
Vinyl acetate	< 0.53	0.53		ug/m3	1	3/23/2017 11:26:00 PM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	3/23/2017 11:26:00 PM
Vinyl chloride	< 0.10	0.10		ug/m3	1	3/23/2017 11:26:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *28-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20170321
Lab Order:	C1703065	**Tag Number:**	333,109
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	3/24/2017 12:08:00 AM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	3/24/2017 12:08:00 AM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	3/24/2017 12:08:00 AM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	3/24/2017 12:08:00 AM
1,1-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:08:00 AM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	3/24/2017 12:08:00 AM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/24/2017 12:08:00 AM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	3/24/2017 12:08:00 AM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:08:00 AM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	3/24/2017 12:08:00 AM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	3/24/2017 12:08:00 AM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/24/2017 12:08:00 AM
1,3-butadiene	< 0.33	0.33		ug/m3	1	3/24/2017 12:08:00 AM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:08:00 AM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:08:00 AM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	3/24/2017 12:08:00 AM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	3/24/2017 12:08:00 AM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	3/24/2017 12:08:00 AM
Acetone	36000	5200		ug/m3	7290	3/24/2017 11:21:00 PM
Allyl chloride	< 0.47	0.47		ug/m3	1	3/24/2017 12:08:00 AM
Benzene	1.5	0.48		ug/m3	1	3/24/2017 12:08:00 AM
Benzyl chloride	< 0.86	0.86		ug/m3	1	3/24/2017 12:08:00 AM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	3/24/2017 12:08:00 AM
Bromoform	< 1.6	1.6		ug/m3	1	3/24/2017 12:08:00 AM
Bromomethane	< 0.58	0.58		ug/m3	1	3/24/2017 12:08:00 AM
Carbon disulfide	< 0.47	0.47		ug/m3	1	3/24/2017 12:08:00 AM
Carbon tetrachloride	0.44	0.25		ug/m3	1	3/24/2017 12:08:00 AM
Chlorobenzene	< 0.69	0.69		ug/m3	1	3/24/2017 12:08:00 AM
Chloroethane	< 0.40	0.40		ug/m3	1	3/24/2017 12:08:00 AM
Chloroform	1.3	0.73		ug/m3	1	3/24/2017 12:08:00 AM
Chloromethane	1.9	0.31		ug/m3	1	3/24/2017 12:08:00 AM
cis-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:08:00 AM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/24/2017 12:08:00 AM
Cyclohexane	< 0.52	0.52		ug/m3	1	3/24/2017 12:08:00 AM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	3/24/2017 12:08:00 AM
Ethyl acetate	340	400	J	ug/m3	729	3/24/2017 10:44:00 PM
Ethylbenzene	< 0.65	0.65		ug/m3	1	3/24/2017 12:08:00 AM
Freon 11	1.5	0.84		ug/m3	1	3/24/2017 12:08:00 AM
Freon 113	< 1.1	1.1		ug/m3	1	3/24/2017 12:08:00 AM
Freon 114	< 1.0	1.0		ug/m3	1	3/24/2017 12:08:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *28-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20170321
Lab Order:	C1703065	**Tag Number:**	333,109
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
Freon 12	1.9	0.74		ug/m3	1	3/24/2017 12:08:00 AM
Heptane	< 0.61	0.61		ug/m3	1	3/24/2017 12:08:00 AM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	3/24/2017 12:08:00 AM
Hexane	< 0.53	0.53		ug/m3	1	3/24/2017 12:08:00 AM
Isopropyl alcohol	3200	270		ug/m3	729	3/24/2017 10:44:00 PM
m&p-Xylene	0.82	1.3	J	ug/m3	1	3/24/2017 12:08:00 AM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	3/24/2017 12:08:00 AM
Methyl Ethyl Ketone	5.4	0.88		ug/m3	1	3/24/2017 12:08:00 AM
Methyl Isobutyl Ketone	1.6	1.2		ug/m3	1	3/24/2017 12:08:00 AM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	3/24/2017 12:08:00 AM
Methylene chloride	0.80	0.52		ug/m3	1	3/24/2017 12:08:00 AM
o-Xylene	< 0.65	0.65		ug/m3	1	3/24/2017 12:08:00 AM
Propylene	< 0.26	0.26		ug/m3	1	3/24/2017 12:08:00 AM
Styrene	< 0.64	0.64		ug/m3	1	3/24/2017 12:08:00 AM
Tetrachloroethylene	29	10		ug/m3	10	3/24/2017 2:04:00 PM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	3/24/2017 12:08:00 AM
Toluene	11	5.7		ug/m3	10	3/24/2017 2:04:00 PM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:08:00 AM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/24/2017 12:08:00 AM
Trichloroethene	0.48	0.21		ug/m3	1	3/24/2017 12:08:00 AM
Vinyl acetate	< 0.53	0.53		ug/m3	1	3/24/2017 12:08:00 AM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	3/24/2017 12:08:00 AM
Vinyl chloride	< 0.10	0.10		ug/m3	1	3/24/2017 12:08:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *28-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	OS-1-20170321
Lab Order:	C1703065	**Tag Number:**	479,155
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-003A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	3/24/2017 12:49:00 AM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	3/24/2017 12:49:00 AM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	3/24/2017 12:49:00 AM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	3/24/2017 12:49:00 AM
1,1-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:49:00 AM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	3/24/2017 12:49:00 AM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/24/2017 12:49:00 AM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	3/24/2017 12:49:00 AM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:49:00 AM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	3/24/2017 12:49:00 AM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	3/24/2017 12:49:00 AM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/24/2017 12:49:00 AM
1,3-butadiene	< 0.33	0.33		ug/m3	1	3/24/2017 12:49:00 AM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:49:00 AM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:49:00 AM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	3/24/2017 12:49:00 AM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	3/24/2017 12:49:00 AM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	3/24/2017 12:49:00 AM
Acetone	240	28		ug/m3	40	3/25/2017 12:36:00 AM
Allyl chloride	< 0.47	0.47		ug/m3	1	3/24/2017 12:49:00 AM
Benzene	0.54	0.48		ug/m3	1	3/24/2017 12:49:00 AM
Benzyl chloride	< 0.86	0.86		ug/m3	1	3/24/2017 12:49:00 AM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	3/24/2017 12:49:00 AM
Bromoform	< 1.6	1.6		ug/m3	1	3/24/2017 12:49:00 AM
Bromomethane	< 0.58	0.58		ug/m3	1	3/24/2017 12:49:00 AM
Carbon disulfide	< 0.47	0.47		ug/m3	1	3/24/2017 12:49:00 AM
Carbon tetrachloride	0.38	0.25		ug/m3	1	3/24/2017 12:49:00 AM
Chlorobenzene	< 0.69	0.69		ug/m3	1	3/24/2017 12:49:00 AM
Chloroethane	< 0.40	0.40		ug/m3	1	3/24/2017 12:49:00 AM
Chloroform	< 0.73	0.73		ug/m3	1	3/24/2017 12:49:00 AM
Chloromethane	1.1	0.31		ug/m3	1	3/24/2017 12:49:00 AM
cis-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:49:00 AM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/24/2017 12:49:00 AM
Cyclohexane	< 0.52	0.52		ug/m3	1	3/24/2017 12:49:00 AM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	3/24/2017 12:49:00 AM
Ethyl acetate	1.9	0.54		ug/m3	1	3/24/2017 12:49:00 AM
Ethylbenzene	< 0.65	0.65		ug/m3	1	3/24/2017 12:49:00 AM
Freon 11	1.6	0.84		ug/m3	1	3/24/2017 12:49:00 AM
Freon 113	< 1.1	1.1		ug/m3	1	3/24/2017 12:49:00 AM
Freon 114	< 1.0	1.0		ug/m3	1	3/24/2017 12:49:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *28-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	OS-1-20170321
Lab Order:	C1703065	**Tag Number:**	479,155
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-003A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
Freon 12	2.1	0.74		ug/m3	1	3/24/2017 12:49:00 AM
Heptane	< 0.61	0.61		ug/m3	1	3/24/2017 12:49:00 AM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	3/24/2017 12:49:00 AM
Hexane	< 0.53	0.53		ug/m3	1	3/24/2017 12:49:00 AM
Isopropyl alcohol	28	3.7		ug/m3	10	3/24/2017 11:59:00 PM
m&p-Xylene	< 1.3	1.3		ug/m3	1	3/24/2017 12:49:00 AM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	3/24/2017 12:49:00 AM
Methyl Ethyl Ketone	1.1	0.88		ug/m3	1	3/24/2017 12:49:00 AM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	3/24/2017 12:49:00 AM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	3/24/2017 12:49:00 AM
Methylene chloride	0.69	0.52		ug/m3	1	3/24/2017 12:49:00 AM
o-Xylene	< 0.65	0.65		ug/m3	1	3/24/2017 12:49:00 AM
Propylene	< 0.26	0.26		ug/m3	1	3/24/2017 12:49:00 AM
Styrene	< 0.64	0.64		ug/m3	1	3/24/2017 12:49:00 AM
Tetrachloroethylene	< 1.0	1.0		ug/m3	1	3/24/2017 12:49:00 AM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	3/24/2017 12:49:00 AM
Toluene	1.1	0.57		ug/m3	1	3/24/2017 12:49:00 AM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:49:00 AM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/24/2017 12:49:00 AM
Trichloroethene	< 0.21	0.21		ug/m3	1	3/24/2017 12:49:00 AM
Vinyl acetate	< 0.53	0.53		ug/m3	1	3/24/2017 12:49:00 AM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	3/24/2017 12:49:00 AM
Vinyl chloride	< 0.10	0.10		ug/m3	1	3/24/2017 12:49:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Labs - Chain of Custody

Centek Laboratories
143 Midler Park Drive
Syracuse, NY 13206
315-431-9730
www.CentekLabs.com

Vapor Intrusion & IAQ

Site Name:
Project: 3130 MONROE
PO#:
Quote # Q-SP
Canister Order #: 6389

Detection Limit	
☐	5ppbv
☑	1ug/M3
☑	1ug/M3 + TCE .25

Report Level	
☐	Level I
☐	Level II
☑	Cat "B" Like

TAT Turnaround Time:	Check One	Rush TAT Surcharge %	Due Date:
5 Business Days	☑	0%	
4 Business Days	☐	25%	
3 Business Days	☐	50%	
2 Business Days	☐	75%	
*Next Day by 5pm	☐	100%	
*Next Day by Noon	☐	150%	
*Same Day	☐	200%	

*For Same and Next Day TAT Please Notify Lab

Company: Ravi Engineering + Land Surveying PC
Report to:
Address: 2110 S. Clinton Ave
City, State, Zip: Roch NY 14618
Email: lzicari@~~[illegible]~~raviengineering.com
Phone: (585) 697-2071

Company:
Check Here If Same: ☒
Invoice to:
Address:
City, State, Zip
Email:
Phone:

Sample ID	Date Sampled	Canister Number	Regulator Number	Analysis Request	Field Vacuum Start / Stop	Labs Vacuum** RecV/Analysis	Comments
AS-1-20170321	3/21/2017	189	378	TO-15	730 11.5	-7 /	eyeglass store
AS-2-20170321	↓	333	109	↓	730 / 10	-9 /	Nail salon burning incense
OS-1-20170321	↓	479	155	↓	29.5 / 3	-2 /	outdoor behind bldg
					/	/	
					/	/	
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Chain of Custody	Print Name	Signature	Date/Time
Sampled by:	Lynn Zicari	Lynn Zicari	3/21/17
Relinquished by:	Lynn Zicari	Lynn Zicari	3/22/17
Received at Lab by:	[illegible] Scala	[signature]	3-23-17

Courier: CIRCLE ONE
(FedEx) UPS Pickup/Dropoff

**For LAB USE ONLY
Work Order # C1703065

*** By signing Centek Labs Chain of Custody, you are accepting Centek Labs Terms and Conditions listed on the reverse side.

Centek Laboratories, LLC

Date: *13-Dec-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20171205
Lab Order:	C1712024	**Tag Number:**	1191.1167
Project:	3130 Monroe Ave	**Collection Date:**	12/5/2017
Lab ID:	C1712024-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	12/8/2017 9:25:00 PM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	12/8/2017 9:25:00 PM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	12/8/2017 9:25:00 PM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	12/8/2017 9:25:00 PM
1,1-Dichloroethene	< 0.59	0.59		ug/m3	1	12/8/2017 9:25:00 PM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	12/8/2017 9:25:00 PM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	12/8/2017 9:25:00 PM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	12/8/2017 9:25:00 PM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	12/8/2017 9:25:00 PM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	12/8/2017 9:25:00 PM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	12/8/2017 9:25:00 PM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	12/8/2017 9:25:00 PM
1,3-butadiene	< 0.33	0.33		ug/m3	1	12/8/2017 9:25:00 PM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	12/8/2017 9:25:00 PM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	12/8/2017 9:25:00 PM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	12/8/2017 9:25:00 PM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	12/8/2017 9:25:00 PM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	12/8/2017 9:25:00 PM
Acetone	1700	570		ug/m3	810	12/11/2017 3:54:00 PM
Allyl chloride	< 0.47	0.47		ug/m3	1	12/8/2017 9:25:00 PM
Benzene	0.93	0.48		ug/m3	1	12/8/2017 9:25:00 PM
Benzyl chloride	< 0.86	0.86		ug/m3	1	12/8/2017 9:25:00 PM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	12/8/2017 9:25:00 PM
Bromoform	< 1.6	1.6		ug/m3	1	12/8/2017 9:25:00 PM
Bromomethane	< 0.58	0.58		ug/m3	1	12/8/2017 9:25:00 PM
Carbon disulfide	< 0.47	0.47		ug/m3	1	12/8/2017 9:25:00 PM
Carbon tetrachloride	0.57	0.25		ug/m3	1	12/8/2017 9:25:00 PM
Chlorobenzene	< 0.69	0.69		ug/m3	1	12/8/2017 9:25:00 PM
Chloroethane	< 0.40	0.40		ug/m3	1	12/8/2017 9:25:00 PM
Chloroform	0.83	0.73		ug/m3	1	12/8/2017 9:25:00 PM
Chloromethane	1.2	0.31		ug/m3	1	12/8/2017 9:25:00 PM
cis-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	12/8/2017 9:25:00 PM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	12/8/2017 9:25:00 PM
Cyclohexane	< 0.52	0.52		ug/m3	1	12/8/2017 9:25:00 PM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	12/8/2017 9:25:00 PM
Ethyl acetate	270	22		ug/m3	40	12/8/2017 11:58:00 PM
Ethylbenzene	< 0.65	0.65		ug/m3	1	12/8/2017 9:25:00 PM
Freon 11	1.3	0.84		ug/m3	1	12/8/2017 9:25:00 PM
Freon 113	< 1.1	1.1		ug/m3	1	12/8/2017 9:25:00 PM
Freon 114	< 1.0	1.0		ug/m3	1	12/8/2017 9:25:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *13-Dec-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20171205
Lab Order:	C1712024	**Tag Number:**	1191.1167
Project:	3130 Monroe Ave	**Collection Date:**	12/5/2017
Lab ID:	C1712024-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
Freon 12	2.5	0.74		ug/m3	1	12/8/2017 9:25:00 PM
Heptane	< 0.61	0.61		ug/m3	1	12/8/2017 9:25:00 PM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	12/8/2017 9:25:00 PM
Hexane	< 0.53	0.53		ug/m3	1	12/8/2017 9:25:00 PM
Isopropyl alcohol	260	29		ug/m3	81	12/11/2017 3:17:00 PM
m&p-Xylene	0.61	1.3	J	ug/m3	1	12/8/2017 9:25:00 PM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	12/8/2017 9:25:00 PM
Methyl Ethyl Ketone	1.9	0.88		ug/m3	1	12/8/2017 9:25:00 PM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	12/8/2017 9:25:00 PM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	12/8/2017 9:25:00 PM
Methylene chloride	1.1	0.52		ug/m3	1	12/8/2017 9:25:00 PM
o-Xylene	< 0.65	0.65		ug/m3	1	12/8/2017 9:25:00 PM
Propylene	< 0.26	0.26		ug/m3	1	12/8/2017 9:25:00 PM
Styrene	< 0.64	0.64		ug/m3	1	12/8/2017 9:25:00 PM
Tetrachloroethylene	42	10		ug/m3	10	12/8/2017 11:22:00 PM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	12/8/2017 9:25:00 PM
Toluene	12	5.7		ug/m3	10	12/8/2017 11:22:00 PM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	12/8/2017 9:25:00 PM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	12/8/2017 9:25:00 PM
Trichloroethene	0.64	0.21		ug/m3	1	12/8/2017 9:25:00 PM
Vinyl acetate	< 0.53	0.53		ug/m3	1	12/8/2017 9:25:00 PM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	12/8/2017 9:25:00 PM
Vinyl chloride	< 0.10	0.10		ug/m3	1	12/8/2017 9:25:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *13-Dec-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20171205
Lab Order:	C1712024	**Tag Number:**	460.310
Project:	3130 Monroe Ave	**Collection Date:**	
Lab ID:	C1712024-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	12/8/2017 10:05:00 PM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	12/8/2017 10:05:00 PM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	12/8/2017 10:05:00 PM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	12/8/2017 10:05:00 PM
1,1-Dichloroethene	< 0.59	0.59		ug/m3	1	12/8/2017 10:05:00 PM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	12/8/2017 10:05:00 PM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	12/8/2017 10:05:00 PM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	12/8/2017 10:05:00 PM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	12/8/2017 10:05:00 PM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	12/8/2017 10:05:00 PM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	12/8/2017 10:05:00 PM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	12/8/2017 10:05:00 PM
1,3-butadiene	< 0.33	0.33		ug/m3	1	12/8/2017 10:05:00 PM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	12/8/2017 10:05:00 PM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	12/8/2017 10:05:00 PM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	12/8/2017 10:05:00 PM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	12/8/2017 10:05:00 PM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	12/8/2017 10:05:00 PM
Acetone	8900	1700		ug/m3	2430	12/11/2017 5:47:00 PM
Allyl chloride	< 0.47	0.47		ug/m3	1	12/8/2017 10:05:00 PM
Benzene	1.5	0.48		ug/m3	1	12/8/2017 10:05:00 PM
Benzyl chloride	< 0.86	0.86		ug/m3	1	12/8/2017 10:05:00 PM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	12/8/2017 10:05:00 PM
Bromoform	< 1.6	1.6		ug/m3	1	12/8/2017 10:05:00 PM
Bromomethane	< 0.58	0.58		ug/m3	1	12/8/2017 10:05:00 PM
Carbon disulfide	< 0.47	0.47		ug/m3	1	12/8/2017 10:05:00 PM
Carbon tetrachloride	0.57	0.25		ug/m3	1	12/8/2017 10:05:00 PM
Chlorobenzene	< 0.69	0.69		ug/m3	1	12/8/2017 10:05:00 PM
Chloroethane	< 0.40	0.40		ug/m3	1	12/8/2017 10:05:00 PM
Chloroform	2.2	0.73		ug/m3	1	12/8/2017 10:05:00 PM
Chloromethane	2.0	0.31		ug/m3	1	12/8/2017 10:05:00 PM
cis-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	12/8/2017 10:05:00 PM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	12/8/2017 10:05:00 PM
Cyclohexane	< 0.52	0.52		ug/m3	1	12/8/2017 10:05:00 PM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	12/8/2017 10:05:00 PM
Ethyl acetate	540	130		ug/m3	243	12/11/2017 5:10:00 PM
Ethylbenzene	< 0.65	0.65		ug/m3	1	12/8/2017 10:05:00 PM
Freon 11	1.2	0.84		ug/m3	1	12/8/2017 10:05:00 PM
Freon 113	< 1.1	1.1		ug/m3	1	12/8/2017 10:05:00 PM
Freon 114	< 1.0	1.0		ug/m3	1	12/8/2017 10:05:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *13-Dec-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20171205
Lab Order:	C1712024	**Tag Number:**	460.310
Project:	3130 Monroe Ave	**Collection Date:**	
Lab ID:	C1712024-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
Freon 12	2.5	0.74		ug/m3	1	12/8/2017 10:05:00 PM
Heptane	< 0.61	0.61		ug/m3	1	12/8/2017 10:05:00 PM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	12/8/2017 10:05:00 PM
Hexane	0.35	0.53	J	ug/m3	1	12/8/2017 10:05:00 PM
Isopropyl alcohol	1400	880		ug/m3	2430	12/11/2017 5:47:00 PM
m&p-Xylene	0.69	1.3	J	ug/m3	1	12/8/2017 10:05:00 PM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	12/8/2017 10:05:00 PM
Methyl Ethyl Ketone	2.6	0.88		ug/m3	1	12/8/2017 10:05:00 PM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	12/8/2017 10:05:00 PM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	12/8/2017 10:05:00 PM
Methylene chloride	2.3	0.52		ug/m3	1	12/8/2017 10:05:00 PM
o-Xylene	< 0.65	0.65		ug/m3	1	12/8/2017 10:05:00 PM
Propylene	< 0.26	0.26		ug/m3	1	12/8/2017 10:05:00 PM
Styrene	< 0.64	0.64		ug/m3	1	12/8/2017 10:05:00 PM
Tetrachloroethylene	55	10		ug/m3	10	12/9/2017 12:35:00 AM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	12/8/2017 10:05:00 PM
Toluene	26	5.7		ug/m3	10	12/9/2017 12:35:00 AM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	12/8/2017 10:05:00 PM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	12/8/2017 10:05:00 PM
Trichloroethene	1.7	0.21		ug/m3	1	12/8/2017 10:05:00 PM
Vinyl acetate	< 0.53	0.53		ug/m3	1	12/8/2017 10:05:00 PM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	12/8/2017 10:05:00 PM
Vinyl chloride	< 0.10	0.10		ug/m3	1	12/8/2017 10:05:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *13-Dec-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	OS-1-20171205
Lab Order:	C1712024	**Tag Number:**	95.272
Project:	3130 Monroe Ave	**Collection Date:**	
Lab ID:	C1712024-003A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	12/8/2017 10:45:00 PM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	12/8/2017 10:45:00 PM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	12/8/2017 10:45:00 PM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	12/8/2017 10:45:00 PM
1,1-Dichloroethene	< 0.59	0.59		ug/m3	1	12/8/2017 10:45:00 PM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	12/8/2017 10:45:00 PM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	12/8/2017 10:45:00 PM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	12/8/2017 10:45:00 PM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	12/8/2017 10:45:00 PM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	12/8/2017 10:45:00 PM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	12/8/2017 10:45:00 PM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	12/8/2017 10:45:00 PM
1,3-butadiene	< 0.33	0.33		ug/m3	1	12/8/2017 10:45:00 PM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	12/8/2017 10:45:00 PM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	12/8/2017 10:45:00 PM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	12/8/2017 10:45:00 PM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	12/8/2017 10:45:00 PM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	12/8/2017 10:45:00 PM
Acetone	36	7.1		ug/m3	10	12/9/2017 1:48:00 AM
Allyl chloride	< 0.47	0.47		ug/m3	1	12/8/2017 10:45:00 PM
Benzene	0.61	0.48		ug/m3	1	12/8/2017 10:45:00 PM
Benzyl chloride	< 0.86	0.86		ug/m3	1	12/8/2017 10:45:00 PM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	12/8/2017 10:45:00 PM
Bromoform	< 1.6	1.6		ug/m3	1	12/8/2017 10:45:00 PM
Bromomethane	< 0.58	0.58		ug/m3	1	12/8/2017 10:45:00 PM
Carbon disulfide	< 0.47	0.47		ug/m3	1	12/8/2017 10:45:00 PM
Carbon tetrachloride	0.63	0.25		ug/m3	1	12/8/2017 10:45:00 PM
Chlorobenzene	< 0.69	0.69		ug/m3	1	12/8/2017 10:45:00 PM
Chloroethane	< 0.40	0.40		ug/m3	1	12/8/2017 10:45:00 PM
Chloroform	< 0.73	0.73		ug/m3	1	12/8/2017 10:45:00 PM
Chloromethane	0.95	0.31		ug/m3	1	12/8/2017 10:45:00 PM
cis-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	12/8/2017 10:45:00 PM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	12/8/2017 10:45:00 PM
Cyclohexane	< 0.52	0.52		ug/m3	1	12/8/2017 10:45:00 PM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	12/8/2017 10:45:00 PM
Ethyl acetate	1.1	0.54		ug/m3	1	12/8/2017 10:45:00 PM
Ethylbenzene	< 0.65	0.65		ug/m3	1	12/8/2017 10:45:00 PM
Freon 11	1.5	0.84		ug/m3	1	12/8/2017 10:45:00 PM
Freon 113	< 1.1	1.1		ug/m3	1	12/8/2017 10:45:00 PM
Freon 114	< 1.0	1.0		ug/m3	1	12/8/2017 10:45:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *13-Dec-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	OS-1-20171205
Lab Order:	C1712024	**Tag Number:**	95.272
Project:	3130 Monroe Ave	**Collection Date:**	
Lab ID:	C1712024-003A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: **RJP**
Freon 12	2.9	0.74		ug/m3	1	12/8/2017 10:45:00 PM
Heptane	< 0.61	0.61		ug/m3	1	12/8/2017 10:45:00 PM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	12/8/2017 10:45:00 PM
Hexane	< 0.53	0.53		ug/m3	1	12/8/2017 10:45:00 PM
Isopropyl alcohol	3.8	0.37		ug/m3	1	12/8/2017 10:45:00 PM
m&p-Xylene	0.48	1.3	J	ug/m3	1	12/8/2017 10:45:00 PM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	12/8/2017 10:45:00 PM
Methyl Ethyl Ketone	< 0.88	0.88		ug/m3	1	12/8/2017 10:45:00 PM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	12/8/2017 10:45:00 PM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	12/8/2017 10:45:00 PM
Methylene chloride	0.87	0.52		ug/m3	1	12/8/2017 10:45:00 PM
o-Xylene	< 0.65	0.65		ug/m3	1	12/8/2017 10:45:00 PM
Propylene	< 0.26	0.26		ug/m3	1	12/8/2017 10:45:00 PM
Styrene	< 0.64	0.64		ug/m3	1	12/8/2017 10:45:00 PM
Tetrachloroethylene	0.75	1.0	J	ug/m3	1	12/8/2017 10:45:00 PM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	12/8/2017 10:45:00 PM
Toluene	0.87	0.57		ug/m3	1	12/8/2017 10:45:00 PM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	12/8/2017 10:45:00 PM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	12/8/2017 10:45:00 PM
Trichloroethene	< 0.21	0.21		ug/m3	1	12/8/2017 10:45:00 PM
Vinyl acetate	< 0.53	0.53		ug/m3	1	12/8/2017 10:45:00 PM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	12/8/2017 10:45:00 PM
Vinyl chloride	< 0.10	0.10		ug/m3	1	12/8/2017 10:45:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Labs - Chain of Custody

Centek Laboratories

143 Midler Park Drive
Syracuse, NY 13206
315-431-9730
www.CentekLabs.com

Vapor Intrusion & IAQ

Site Name: 3130 Monroe Ave
Project: NYSDEC C-828109
PO#: 4515042-0P
Quote # Q-3P
Canister Order #: 6903

Detection Limit		Report Level	
☐	5ppbv	☐	Level I
☐	1ug/M3	☐	Level II
☒	1ug/M3 +TCE .25	☒	Cat "B" Like

TAT Turnaround Time:	Check One	Rush TAT Surcharge %	Due Date:
5 Business Days	☒	0%	
4 Business Days	☐	25%	
3 Business Days	☐	50%	
2 Business Days	☐	75%	
*Next Day by 5pm	☐	100%	
*Next Day by Noon	☐	150%	
*Same Day	☐	200%	

*For Same and Next Day TAT Please Notify Lab

Company: Ravi Engineering
Report to:
Address: 2110 S. Clinton Ave
City, State, Zip Roch ny 14618
Suite 1
Email: lzicari@ravieng.com
Phone: 585-697-5071

Company:
Check Here If Same: ☒
Invoice to:
Address:
City, State, Zip
Email:
Phone:

Sample ID	Date Sampled	Canister Number	Regulator Number	Analysis Request	Field Vacuum Start / Stop	Labs Vacuum** RecV/Analysis	Comments
AS-1-20171205	12/5/17	1191	1167	TO-15	29.5 / 3.0	-3 /	Bien Eyeglass
AS-2-20171205	↓	460	310	↓	29.5 / 1.0	-1 /	Nail Scape
OS-1-20171205	↓	95	272	↓	30 / 12.5	-3 /	Outdoors
					/	/	
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Chain of Custody	Print Name	Signature	Date/Time	Courier: CIRCLE ONE
Sampled by:	Lynn Zicari	[signature]	12/05/17	FedEx UPS Pickup/Dropoff
Relinquished by:				**For LAB USE ONLY
Received at Lab by:	Nick Mandarino	[signature]	12-8-17	Work Order # C1712024

*** By signing Centek Labs Chain of Custody, you are accepting Centek Labs Terms and Conditions listed on the reverse side.

Centek Laboratories, LLC

Date: *14-Aug-18*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20180809
Lab Order:	C1808033	**Tag Number:**	541,338
Project:	3130 Monroe Ave	**Collection Date:**	8/9/2018
Lab ID:	C1808033-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	8/13/2018 9:59:00 PM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	8/13/2018 9:59:00 PM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	8/13/2018 9:59:00 PM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	8/13/2018 9:59:00 PM
1,1-Dichloroethene	< 0.16	0.16		ug/m3	1	8/13/2018 9:59:00 PM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	8/13/2018 9:59:00 PM
1,2,4-Trimethylbenzene	0.49	0.74	J	ug/m3	1	8/13/2018 9:59:00 PM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	8/13/2018 9:59:00 PM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	8/13/2018 9:59:00 PM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	8/13/2018 9:59:00 PM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	8/13/2018 9:59:00 PM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	8/13/2018 9:59:00 PM
1,3-butadiene	< 0.33	0.33		ug/m3	1	8/13/2018 9:59:00 PM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	8/13/2018 9:59:00 PM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	8/13/2018 9:59:00 PM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	8/13/2018 9:59:00 PM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	8/13/2018 9:59:00 PM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	8/13/2018 9:59:00 PM
Acetone	33000	21000		ug/m3	29160	8/14/2018 7:57:00 AM
Allyl chloride	< 0.47	0.47		ug/m3	1	8/13/2018 9:59:00 PM
Benzene	0.73	0.48		ug/m3	1	8/13/2018 9:59:00 PM
Benzyl chloride	< 0.86	0.86		ug/m3	1	8/13/2018 9:59:00 PM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	8/13/2018 9:59:00 PM
Bromoform	< 1.6	1.6		ug/m3	1	8/13/2018 9:59:00 PM
Bromomethane	< 0.58	0.58		ug/m3	1	8/13/2018 9:59:00 PM
Carbon disulfide	< 0.47	0.47		ug/m3	1	8/13/2018 9:59:00 PM
Carbon tetrachloride	0.31	0.19		ug/m3	1	8/13/2018 9:59:00 PM
Chlorobenzene	< 0.69	0.69		ug/m3	1	8/13/2018 9:59:00 PM
Chloroethane	< 0.40	0.40		ug/m3	1	8/13/2018 9:59:00 PM
Chloroform	2.9	0.73		ug/m3	1	8/13/2018 9:59:00 PM
Chloromethane	1.3	0.31		ug/m3	1	8/13/2018 9:59:00 PM
cis-1,2-Dichloroethene	< 0.16	0.16		ug/m3	1	8/13/2018 9:59:00 PM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	8/13/2018 9:59:00 PM
Cyclohexane	< 0.52	0.52		ug/m3	1	8/13/2018 9:59:00 PM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	8/13/2018 9:59:00 PM
Ethyl acetate	790	400		ug/m3	729	8/14/2018 7:21:00 AM
Ethylbenzene	< 0.65	0.65		ug/m3	1	8/13/2018 9:59:00 PM
Freon 11	0.90	0.84		ug/m3	1	8/13/2018 9:59:00 PM
Freon 113	< 1.1	1.1		ug/m3	1	8/13/2018 9:59:00 PM
Freon 114	< 1.0	1.0		ug/m3	1	8/13/2018 9:59:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *14-Aug-18*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20180809
Lab Order:	C1808033	**Tag Number:**	541,338
Project:	3130 Monroe Ave	**Collection Date:**	8/9/2018
Lab ID:	C1808033-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
Freon 12	1.7	0.74		ug/m3	1	8/13/2018 9:59:00 PM
Heptane	0.41	0.61	J	ug/m3	1	8/13/2018 9:59:00 PM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	8/13/2018 9:59:00 PM
Hexane	< 0.53	0.53		ug/m3	1	8/13/2018 9:59:00 PM
Isopropyl alcohol	13000	11000		ug/m3	29160	8/14/2018 7:57:00 AM
m&p-Xylene	1.1	1.3	J	ug/m3	1	8/13/2018 9:59:00 PM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	8/13/2018 9:59:00 PM
Methyl Ethyl Ketone	22	8.8		ug/m3	10	8/13/2018 11:17:00 PM
Methyl Isobutyl Ketone	0.41	1.2	J	ug/m3	1	8/13/2018 9:59:00 PM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	8/13/2018 9:59:00 PM
Methylene chloride	< 0.52	0.52		ug/m3	1	8/13/2018 9:59:00 PM
o-Xylene	< 0.65	0.65		ug/m3	1	8/13/2018 9:59:00 PM
Propylene	< 0.26	0.26		ug/m3	1	8/13/2018 9:59:00 PM
Styrene	< 0.64	0.64		ug/m3	1	8/13/2018 9:59:00 PM
Tetrachloroethylene	27	10		ug/m3	10	8/13/2018 11:17:00 PM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	8/13/2018 9:59:00 PM
Toluene	3.8	0.57		ug/m3	1	8/13/2018 9:59:00 PM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	8/13/2018 9:59:00 PM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	8/13/2018 9:59:00 PM
Trichloroethene	0.38	0.16		ug/m3	1	8/13/2018 9:59:00 PM
Vinyl acetate	< 0.53	0.53		ug/m3	1	8/13/2018 9:59:00 PM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	8/13/2018 9:59:00 PM
Vinyl chloride	< 0.10	0.10		ug/m3	1	8/13/2018 9:59:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *14-Aug-18*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20180809
Lab Order:	C1808033	**Tag Number:**	195,260
Project:	3130 Monroe Ave	**Collection Date:**	8/9/2018
Lab ID:	C1808033-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	8/13/2018 10:40:00 PM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	8/13/2018 10:40:00 PM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	8/13/2018 10:40:00 PM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	8/13/2018 10:40:00 PM
1,1-Dichloroethene	< 0.16	0.16		ug/m3	1	8/13/2018 10:40:00 PM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	8/13/2018 10:40:00 PM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	8/13/2018 10:40:00 PM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	8/13/2018 10:40:00 PM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	8/13/2018 10:40:00 PM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	8/13/2018 10:40:00 PM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	8/13/2018 10:40:00 PM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	8/13/2018 10:40:00 PM
1,3-butadiene	< 0.33	0.33		ug/m3	1	8/13/2018 10:40:00 PM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	8/13/2018 10:40:00 PM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	8/13/2018 10:40:00 PM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	8/13/2018 10:40:00 PM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	8/13/2018 10:40:00 PM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	8/13/2018 10:40:00 PM
Acetone	15000	3600		ug/m3	4860	8/14/2018 9:14:00 AM
Allyl chloride	< 0.47	0.47		ug/m3	1	8/13/2018 10:40:00 PM
Benzene	0.64	0.48		ug/m3	1	8/13/2018 10:40:00 PM
Benzyl chloride	< 0.86	0.86		ug/m3	1	8/13/2018 10:40:00 PM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	8/13/2018 10:40:00 PM
Bromoform	< 1.6	1.6		ug/m3	1	8/13/2018 10:40:00 PM
Bromomethane	< 0.58	0.58		ug/m3	1	8/13/2018 10:40:00 PM
Carbon disulfide	< 0.47	0.47		ug/m3	1	8/13/2018 10:40:00 PM
Carbon tetrachloride	0.31	0.19		ug/m3	1	8/13/2018 10:40:00 PM
Chlorobenzene	< 0.69	0.69		ug/m3	1	8/13/2018 10:40:00 PM
Chloroethane	< 0.40	0.40		ug/m3	1	8/13/2018 10:40:00 PM
Chloroform	1.1	0.73		ug/m3	1	8/13/2018 10:40:00 PM
Chloromethane	1.1	0.31		ug/m3	1	8/13/2018 10:40:00 PM
cis-1,2-Dichloroethene	< 0.16	0.16		ug/m3	1	8/13/2018 10:40:00 PM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	8/13/2018 10:40:00 PM
Cyclohexane	< 0.52	0.52		ug/m3	1	8/13/2018 10:40:00 PM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	8/13/2018 10:40:00 PM
Ethyl acetate	530	130		ug/m3	243	8/14/2018 8:38:00 AM
Ethylbenzene	< 0.65	0.65		ug/m3	1	8/13/2018 10:40:00 PM
Freon 11	0.96	0.84		ug/m3	1	8/13/2018 10:40:00 PM
Freon 113	< 1.1	1.1		ug/m3	1	8/13/2018 10:40:00 PM
Freon 114	< 1.0	1.0		ug/m3	1	8/13/2018 10:40:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *14-Aug-18*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20180809
Lab Order:	C1808033	**Tag Number:**	195,260
Project:	3130 Monroe Ave	**Collection Date:**	8/9/2018
Lab ID:	C1808033-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
Freon 12	2.0	0.74		ug/m3	1	8/13/2018 10:40:00 PM
Heptane	0.57	0.61	J	ug/m3	1	8/13/2018 10:40:00 PM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	8/13/2018 10:40:00 PM
Hexane	< 0.53	0.53		ug/m3	1	8/13/2018 10:40:00 PM
Isopropyl alcohol	6100	1800		ug/m3	4860	8/14/2018 9:14:00 AM
m&p-Xylene	0.65	1.3	J	ug/m3	1	8/13/2018 10:40:00 PM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	8/13/2018 10:40:00 PM
Methyl Ethyl Ketone	5.6	0.88		ug/m3	1	8/13/2018 10:40:00 PM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	8/13/2018 10:40:00 PM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	8/13/2018 10:40:00 PM
Methylene chloride	0.38	0.52	J	ug/m3	1	8/13/2018 10:40:00 PM
o-Xylene	< 0.65	0.65		ug/m3	1	8/13/2018 10:40:00 PM
Propylene	< 0.26	0.26		ug/m3	1	8/13/2018 10:40:00 PM
Styrene	< 0.64	0.64		ug/m3	1	8/13/2018 10:40:00 PM
Tetrachloroethylene	21	10		ug/m3	10	8/14/2018 12:30:00 AM
Tetrahydrofuran	0.71	0.44		ug/m3	1	8/13/2018 10:40:00 PM
Toluene	3.1	0.57		ug/m3	1	8/13/2018 10:40:00 PM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	8/13/2018 10:40:00 PM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	8/13/2018 10:40:00 PM
Trichloroethene	0.48	0.16		ug/m3	1	8/13/2018 10:40:00 PM
Vinyl acetate	< 0.53	0.53		ug/m3	1	8/13/2018 10:40:00 PM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	8/13/2018 10:40:00 PM
Vinyl chloride	< 0.10	0.10		ug/m3	1	8/13/2018 10:40:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Labs - Chain of Custody

Centek Laboratories
143 Midler Park Drive
Syracuse, NY 13206
315-431-9730
www.CentekLabs.com
Vapor Intrusion & IAQ

Site Name: 3130 Monroe Ave
Project: # 4515042 - P
PO#:
Quote # Q-3P
Canister Order #: 7363

Detection Limit	Report Level
☐ 5ppbv	☐ Level I
☒ 1ug/M3	☐ Level II
☒ 1ug/M3 + 0.2 NYS	☒ Cat "B" Like
☐	☐

TAT Turnaround Time:	Check One	Rush TAT Surcharge %	Due Date:
5 Business Days	☒	0%	
4 Business Days	☐	25%	
3 Business Days	☐	50%	
2 Business Days	☐	75%	
*Next Day by 5pm	☐	100%	
*Next Day by Noon	☐	150%	
*Same Day	☐	200%	

Company: RAM	Company: Check Here If Same: ☒
Report to:	Invoice to:
Address: 240 S. Clinton Ave	Address:
City, State, Zip Rochny 14618	City, State, Zip
Email: Lynn.Zicari@raminc.com	Email:
Phone: 585-325-6925	Phone:

*For Same and Next Day TAT Please Notify Lab

Sample ID	Date Sampled	Canister Number	Regulator Number	Analysis Request	Field Vacuum Start / Stop	Labs Vacuum** Rec'd/Analysis	Comments
AS-2-20180809	8/9/18	541	338	TO-15	30 / 2.75	-2 /	Mr. Scape
AS-1-20180809	8/9/18	195	260	TO-15	30 / 10.5	-2 /	Vacant
~~OS-1-20180809~~	~~8/9/18~~	~~1194~~	~~272~~		~~30 / 1.5~~	/	~~outdoor~~
					/	/	Equipment Stolen
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Chain of Custody	Print Name	Signature	Date/Time (12)	Courier: CIRCLE ONE
Sampled by:	Lynn Zicari	Lynn Zicari	8/9/2018	FedEx UPS Pickup/Dropoff
Relinquished by:	Lynn Zicari to FedEx	Lynn Zicari	8/9/2018	**For LAB USE ONLY
Received at Lab by:	Jan Scala	Jan Scala	8/13/18	Work Order # C1808033

*** By signing Centek Labs Chain of Custody, you are accepting Centek Labs Terms and Conditions listed on the reverse side.

Centek Laboratories, LLC

Date: *05-Dec-18*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20181126
Lab Order:	C1811055	**Tag Number:**	496,338
Project:	3130 Monroe Ave	**Collection Date:**	11/26/2018
Lab ID:	C1811055-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	11/30/2018 6:34:00 PM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	11/30/2018 6:34:00 PM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	11/30/2018 6:34:00 PM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	11/30/2018 6:34:00 PM
1,1-Dichloroethene	< 0.16	0.16		ug/m3	1	11/30/2018 6:34:00 PM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	11/30/2018 6:34:00 PM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	11/30/2018 6:34:00 PM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	11/30/2018 6:34:00 PM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	11/30/2018 6:34:00 PM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	11/30/2018 6:34:00 PM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	11/30/2018 6:34:00 PM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	11/30/2018 6:34:00 PM
1,3-butadiene	< 0.33	0.33		ug/m3	1	11/30/2018 6:34:00 PM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	11/30/2018 6:34:00 PM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	11/30/2018 6:34:00 PM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	11/30/2018 6:34:00 PM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	11/30/2018 6:34:00 PM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	11/30/2018 6:34:00 PM
Acetone	5100	570		ug/m3	810	12/4/2018 4:20:00 PM
Allyl chloride	< 0.47	0.47		ug/m3	1	11/30/2018 6:34:00 PM
Benzene	0.70	0.48		ug/m3	1	11/30/2018 6:34:00 PM
Benzyl chloride	< 0.86	0.86		ug/m3	1	11/30/2018 6:34:00 PM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	11/30/2018 6:34:00 PM
Bromoform	< 1.6	1.6		ug/m3	1	11/30/2018 6:34:00 PM
Bromomethane	< 0.58	0.58		ug/m3	1	11/30/2018 6:34:00 PM
Carbon disulfide	< 0.47	0.47		ug/m3	1	11/30/2018 6:34:00 PM
Carbon tetrachloride	0.63	0.19		ug/m3	1	11/30/2018 6:34:00 PM
Chlorobenzene	< 0.69	0.69		ug/m3	1	11/30/2018 6:34:00 PM
Chloroethane	< 0.40	0.40		ug/m3	1	11/30/2018 6:34:00 PM
Chloroform	< 0.73	0.73		ug/m3	1	11/30/2018 6:34:00 PM
Chloromethane	0.72	0.31		ug/m3	1	11/30/2018 6:34:00 PM
cis-1,2-Dichloroethene	< 0.16	0.16		ug/m3	1	11/30/2018 6:34:00 PM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	11/30/2018 6:34:00 PM
Cyclohexane	< 0.52	0.52		ug/m3	1	11/30/2018 6:34:00 PM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	11/30/2018 6:34:00 PM
Ethyl acetate	110	43		ug/m3	81	12/4/2018 3:43:00 PM
Ethylbenzene	< 0.65	0.65		ug/m3	1	11/30/2018 6:34:00 PM
Freon 11	1.4	0.84		ug/m3	1	11/30/2018 6:34:00 PM
Freon 113	< 1.1	1.1		ug/m3	1	11/30/2018 6:34:00 PM
Freon 114	< 1.0	1.0		ug/m3	1	11/30/2018 6:34:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *05-Dec-18*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20181126
Lab Order:	C1811055	**Tag Number:**	496,338
Project:	3130 Monroe Ave	**Collection Date:**	11/26/2018
Lab ID:	C1811055-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
Freon 12	2.5	0.74		ug/m3	1	11/30/2018 6:34:00 PM
Heptane	< 0.61	0.61		ug/m3	1	11/30/2018 6:34:00 PM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	11/30/2018 6:34:00 PM
Hexane	< 0.53	0.53		ug/m3	1	11/30/2018 6:34:00 PM
Isopropyl alcohol	1000	290		ug/m3	810	12/4/2018 4:20:00 PM
m&p-Xylene	< 1.3	1.3		ug/m3	1	11/30/2018 6:34:00 PM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	11/30/2018 6:34:00 PM
Methyl Ethyl Ketone	2.2	0.88		ug/m3	1	11/30/2018 6:34:00 PM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	11/30/2018 6:34:00 PM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	11/30/2018 6:34:00 PM
Methylene chloride	< 0.52	0.52		ug/m3	1	11/30/2018 6:34:00 PM
o-Xylene	< 0.65	0.65		ug/m3	1	11/30/2018 6:34:00 PM
Propylene	< 0.26	0.26		ug/m3	1	11/30/2018 6:34:00 PM
Styrene	< 0.64	0.64		ug/m3	1	11/30/2018 6:34:00 PM
Tetrachloroethylene	51	10		ug/m3	10	12/1/2018 3:13:00 AM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	11/30/2018 6:34:00 PM
Toluene	2.1	0.57		ug/m3	1	11/30/2018 6:34:00 PM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	11/30/2018 6:34:00 PM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	11/30/2018 6:34:00 PM
Trichloroethene	0.86	0.16		ug/m3	1	11/30/2018 6:34:00 PM
Vinyl acetate	< 0.53	0.53		ug/m3	1	11/30/2018 6:34:00 PM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	11/30/2018 6:34:00 PM
Vinyl chloride	< 0.10	0.10		ug/m3	1	11/30/2018 6:34:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *05-Dec-18*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	OS-1-20181126
Lab Order:	C1811055	**Tag Number:**	347,1167
Project:	3130 Monroe Ave	**Collection Date:**	11/26/2018
Lab ID:	C1811055-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	11/30/2018 7:14:00 PM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	11/30/2018 7:14:00 PM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	11/30/2018 7:14:00 PM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	11/30/2018 7:14:00 PM
1,1-Dichloroethene	< 0.16	0.16		ug/m3	1	11/30/2018 7:14:00 PM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	11/30/2018 7:14:00 PM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	11/30/2018 7:14:00 PM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	11/30/2018 7:14:00 PM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	11/30/2018 7:14:00 PM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	11/30/2018 7:14:00 PM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	11/30/2018 7:14:00 PM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	11/30/2018 7:14:00 PM
1,3-butadiene	< 0.33	0.33		ug/m3	1	11/30/2018 7:14:00 PM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	11/30/2018 7:14:00 PM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	11/30/2018 7:14:00 PM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	11/30/2018 7:14:00 PM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	11/30/2018 7:14:00 PM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	11/30/2018 7:14:00 PM
Acetone	19	7.1		ug/m3	10	12/1/2018 3:49:00 AM
Allyl chloride	< 0.47	0.47		ug/m3	1	11/30/2018 7:14:00 PM
Benzene	0.80	0.48		ug/m3	1	11/30/2018 7:14:00 PM
Benzyl chloride	< 0.86	0.86		ug/m3	1	11/30/2018 7:14:00 PM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	11/30/2018 7:14:00 PM
Bromoform	< 1.6	1.6		ug/m3	1	11/30/2018 7:14:00 PM
Bromomethane	< 0.58	0.58		ug/m3	1	11/30/2018 7:14:00 PM
Carbon disulfide	< 0.47	0.47		ug/m3	1	11/30/2018 7:14:00 PM
Carbon tetrachloride	0.63	0.19		ug/m3	1	11/30/2018 7:14:00 PM
Chlorobenzene	< 0.69	0.69		ug/m3	1	11/30/2018 7:14:00 PM
Chloroethane	< 0.40	0.40		ug/m3	1	11/30/2018 7:14:00 PM
Chloroform	< 0.73	0.73		ug/m3	1	11/30/2018 7:14:00 PM
Chloromethane	0.93	0.31		ug/m3	1	11/30/2018 7:14:00 PM
cis-1,2-Dichloroethene	< 0.16	0.16		ug/m3	1	11/30/2018 7:14:00 PM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	11/30/2018 7:14:00 PM
Cyclohexane	< 0.52	0.52		ug/m3	1	11/30/2018 7:14:00 PM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	11/30/2018 7:14:00 PM
Ethyl acetate	0.50	0.54	J	ug/m3	1	11/30/2018 7:14:00 PM
Ethylbenzene	< 0.65	0.65		ug/m3	1	11/30/2018 7:14:00 PM
Freon 11	1.6	0.84		ug/m3	1	11/30/2018 7:14:00 PM
Freon 113	< 1.1	1.1		ug/m3	1	11/30/2018 7:14:00 PM
Freon 114	< 1.0	1.0		ug/m3	1	11/30/2018 7:14:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *05-Dec-18*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	OS-1-20181126
Lab Order:	C1811055	**Tag Number:**	347,1167
Project:	3130 Monroe Ave	**Collection Date:**	11/26/2018
Lab ID:	C1811055-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
Freon 12	2.8	0.74		ug/m3	1	11/30/2018 7:14:00 PM
Heptane	< 0.61	0.61		ug/m3	1	11/30/2018 7:14:00 PM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	11/30/2018 7:14:00 PM
Hexane	0.42	0.53	J	ug/m3	1	11/30/2018 7:14:00 PM
Isopropyl alcohol	2.2	0.37		ug/m3	1	11/30/2018 7:14:00 PM
m&p-Xylene	< 1.3	1.3		ug/m3	1	11/30/2018 7:14:00 PM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	11/30/2018 7:14:00 PM
Methyl Ethyl Ketone	< 0.88	0.88		ug/m3	1	11/30/2018 7:14:00 PM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	11/30/2018 7:14:00 PM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	11/30/2018 7:14:00 PM
Methylene chloride	< 0.52	0.52		ug/m3	1	11/30/2018 7:14:00 PM
o-Xylene	< 0.65	0.65		ug/m3	1	11/30/2018 7:14:00 PM
Propylene	< 0.26	0.26		ug/m3	1	11/30/2018 7:14:00 PM
Styrene	< 0.64	0.64		ug/m3	1	11/30/2018 7:14:00 PM
Tetrachloroethylene	< 1.0	1.0		ug/m3	1	11/30/2018 7:14:00 PM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	11/30/2018 7:14:00 PM
Toluene	2.1	0.57		ug/m3	1	11/30/2018 7:14:00 PM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	11/30/2018 7:14:00 PM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	11/30/2018 7:14:00 PM
Trichloroethene	< 0.16	0.16		ug/m3	1	11/30/2018 7:14:00 PM
Vinyl acetate	< 0.53	0.53		ug/m3	1	11/30/2018 7:14:00 PM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	11/30/2018 7:14:00 PM
Vinyl chloride	< 0.10	0.10		ug/m3	1	11/30/2018 7:14:00 PM

Qualifiers:

**	Quantitation Limit
B	Analyte detected in the associated Method Blank
H	Holding times for preparation or analysis exceeded
JN	Non-routine analyte. Quantitation estimated.
S	Spike Recovery outside accepted recovery limits
.	Results reported are not blank corrected
E	Estimated Value above quantitation range
J	Analyte detected below quantitation limit
ND	Not Detected at the Limit of Detection

Centek Laboratories, LLC

Date: *05-Dec-18*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20181126
Lab Order:	C1811055	**Tag Number:**	195,271
Project:	3130 Monroe Ave	**Collection Date:**	11/26/2018
Lab ID:	C1811055-003A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	11/30/2018 7:54:00 PM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	11/30/2018 7:54:00 PM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	11/30/2018 7:54:00 PM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	11/30/2018 7:54:00 PM
1,1-Dichloroethene	< 0.16	0.16		ug/m3	1	11/30/2018 7:54:00 PM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	11/30/2018 7:54:00 PM
1,2,4-Trimethylbenzene	0.54	0.74	J	ug/m3	1	11/30/2018 7:54:00 PM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	11/30/2018 7:54:00 PM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	11/30/2018 7:54:00 PM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	11/30/2018 7:54:00 PM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	11/30/2018 7:54:00 PM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	11/30/2018 7:54:00 PM
1,3-butadiene	< 0.33	0.33		ug/m3	1	11/30/2018 7:54:00 PM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	11/30/2018 7:54:00 PM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	11/30/2018 7:54:00 PM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	11/30/2018 7:54:00 PM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	11/30/2018 7:54:00 PM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	11/30/2018 7:54:00 PM
Acetone	39000	6900		ug/m3	9720	12/4/2018 6:13:00 PM
Allyl chloride	< 0.47	0.47		ug/m3	1	11/30/2018 7:54:00 PM
Benzene	1.2	0.48		ug/m3	1	11/30/2018 7:54:00 PM
Benzyl chloride	< 0.86	0.86		ug/m3	1	11/30/2018 7:54:00 PM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	11/30/2018 7:54:00 PM
Bromoform	< 1.6	1.6		ug/m3	1	11/30/2018 7:54:00 PM
Bromomethane	< 0.58	0.58		ug/m3	1	11/30/2018 7:54:00 PM
Carbon disulfide	< 0.47	0.47		ug/m3	1	11/30/2018 7:54:00 PM
Carbon tetrachloride	0.57	0.19		ug/m3	1	11/30/2018 7:54:00 PM
Chlorobenzene	< 0.69	0.69		ug/m3	1	11/30/2018 7:54:00 PM
Chloroethane	< 0.40	0.40		ug/m3	1	11/30/2018 7:54:00 PM
Chloroform	1.5	0.73		ug/m3	1	11/30/2018 7:54:00 PM
Chloromethane	1.1	0.31		ug/m3	1	11/30/2018 7:54:00 PM
cis-1,2-Dichloroethene	< 0.16	0.16		ug/m3	1	11/30/2018 7:54:00 PM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	11/30/2018 7:54:00 PM
Cyclohexane	< 0.52	0.52		ug/m3	1	11/30/2018 7:54:00 PM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	11/30/2018 7:54:00 PM
Ethyl acetate	420	130		ug/m3	243	12/4/2018 4:59:00 PM
Ethylbenzene	< 0.65	0.65		ug/m3	1	11/30/2018 7:54:00 PM
Freon 11	1.3	0.84		ug/m3	1	11/30/2018 7:54:00 PM
Freon 113	< 1.1	1.1		ug/m3	1	11/30/2018 7:54:00 PM
Freon 114	< 1.0	1.0		ug/m3	1	11/30/2018 7:54:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *05-Dec-18*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20181126
Lab Order:	C1811055	**Tag Number:**	195,271
Project:	3130 Monroe Ave	**Collection Date:**	11/26/2018
Lab ID:	C1811055-003A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
Freon 12	2.2	0.74		ug/m3	1	11/30/2018 7:54:00 PM
Heptane	0.41	0.61	J	ug/m3	1	11/30/2018 7:54:00 PM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	11/30/2018 7:54:00 PM
Hexane	< 0.53	0.53		ug/m3	1	11/30/2018 7:54:00 PM
Isopropyl alcohol	4200	880		ug/m3	2430	12/4/2018 5:36:00 PM
m&p-Xylene	0.87	1.3	J	ug/m3	1	11/30/2018 7:54:00 PM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	11/30/2018 7:54:00 PM
Methyl Ethyl Ketone	14	8.8		ug/m3	10	12/1/2018 4:26:00 AM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	11/30/2018 7:54:00 PM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	11/30/2018 7:54:00 PM
Methylene chloride	< 0.52	0.52		ug/m3	1	11/30/2018 7:54:00 PM
o-Xylene	< 0.65	0.65		ug/m3	1	11/30/2018 7:54:00 PM
Propylene	< 0.26	0.26		ug/m3	1	11/30/2018 7:54:00 PM
Styrene	< 0.64	0.64		ug/m3	1	11/30/2018 7:54:00 PM
Tetrachloroethylene	160	10		ug/m3	10	12/1/2018 4:26:00 AM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	11/30/2018 7:54:00 PM
Toluene	14	5.7		ug/m3	10	12/1/2018 4:26:00 AM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	11/30/2018 7:54:00 PM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	11/30/2018 7:54:00 PM
Trichloroethene	1.3	0.16		ug/m3	1	11/30/2018 7:54:00 PM
Vinyl acetate	< 0.53	0.53		ug/m3	1	11/30/2018 7:54:00 PM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	11/30/2018 7:54:00 PM
Vinyl chloride	< 0.10	0.10		ug/m3	1	11/30/2018 7:54:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Labs - Chain of Custody

Centek Laboratories
143 Midler Park Drive
Syracuse, NY 13206
315-431-9730
www.CentekLabs.com
Vapor Intrusion & IAQ

Site Name: 3130 Monroe Ave.
Project: 3130 Monroe Ave.
PO#: 45-15-042-OP-04
Quote # Q-15
Canister Order #: 7763

Detection Limit	Report Level
☐ 5ppbv	☐ Level I
☐ 1ug/M3	☐ Level II
☑ 1ug/M3 + 0.2 NYS	☑ Cat "B" Like
☐	☐

TAT Turnaround Time:	Check One	Rush TAT Surcharge %	Due Date:
5 Business Days	☑	0%	
4 Business Days	☐	25%	
3 Business Days	☐	50%	
2 Business Days	☐	75%	
*Next Day by 5pm	☐	100%	
*Next Day by Noon	☐	150%	
*Same Day	☐	200%	

*For Same and Next Day TAT Please Notify Lab

Company: Ravi Engineering

Report to:
Address: 2110 S. Clinton Ave Ste 1
City, State, Zip Rochester NY 14618
Email: LZicari@raviengs.com
WMcAlpin@raviengs.com
Phone: (585)697-6975

Company: Check Here If Same: ☑

Invoice to:
Address:
City, State, Zip
Email:
Phone:

Sample ID	Date Sampled	Canister Number	Regulator Number	Analysis Request	Field Vacuum Start / Stop	Labs Vacuum** Rec'd/Analysis	Comments
~~AS-1-20181126~~	~~11-20-18~~	~~496~~	~~338~~	~~TO-15~~ 11/26	~~30 / 3~~	/	~~Vacant Space~~ 09:29
~~OS-1-20181126~~	~~11-26-18~~	~~347~~	~~1167~~	~~TO-15~~ 11/26	~~29 / 1~~	/	~~Outdoor Space~~ 09:51
~~AS-2-20181126~~	~~11-20-18~~	~~195~~	~~271~~	~~TO-15~~ 11/26/18	~~29 / 3~~	/	~~Nail Salon~~ 09:35
	~~11-26-18~~	11/26/18			/	/	
					/	/	
					/	/	
AS-1-20181126	11-26-2018	496	338	TO-15	30 / 3	-1 /	Vacant space
OS-1-20181126	11-26-2018	347	1167	TO-15	29 / 1	-1 /	outdoor space
AS-2-20181126	11-26-2018	195	271	TO-15	29 / 3	-2 /	nail salon
					/	/	
					/	/	
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					/	/	
					/	/	
					/	/	

Chain of Custody	Print Name	Signature	Date/Time
Sampled by:	Whitney McAlpin		11-26-18 / 09:29
Relinquished by:	Whitney McAlpin		11-27-18 / 09:34
Received at Lab by:	Van Scala		11-28-18

Courier: CIRCLE ONE
FedEx UPS Pickup/Dropoff

**For LAB USE ONLY
Work Order # C1811055

***Chain of Custody must be completed in full. Lack of any missing information will affect your Turn Around Times (TAT)

*** By signing Centek Labs Chain of Custody, you are accepting Centek Labs Terms and Conditions listed on the reverse side.

Centek Laboratories, LLC

Date: *23-Apr-19*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20190415
Lab Order:	C1904047	**Tag Number:**	243,337
Project:	3130 Monroe Ave	**Collection Date:**	4/15/2019
Lab ID:	C1904047-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	4/20/2019 7:25:00 AM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	4/20/2019 7:25:00 AM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	4/20/2019 7:25:00 AM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	4/20/2019 7:25:00 AM
1,1-Dichloroethene	< 0.16	0.16		ug/m3	1	4/20/2019 7:25:00 AM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	4/20/2019 7:25:00 AM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	4/20/2019 7:25:00 AM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	4/20/2019 7:25:00 AM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	4/20/2019 7:25:00 AM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	4/20/2019 7:25:00 AM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	4/20/2019 7:25:00 AM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	4/20/2019 7:25:00 AM
1,3-butadiene	< 0.33	0.33		ug/m3	1	4/20/2019 7:25:00 AM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	4/20/2019 7:25:00 AM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	4/20/2019 7:25:00 AM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	4/20/2019 7:25:00 AM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	4/20/2019 7:25:00 AM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	4/20/2019 7:25:00 AM
Acetone	3200	570		ug/m3	810	4/22/2019 6:28:00 PM
Allyl chloride	< 0.47	0.47		ug/m3	1	4/20/2019 7:25:00 AM
Benzene	0.54	0.48		ug/m3	1	4/20/2019 7:25:00 AM
Benzyl chloride	< 0.86	0.86		ug/m3	1	4/20/2019 7:25:00 AM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	4/20/2019 7:25:00 AM
Bromoform	< 1.6	1.6		ug/m3	1	4/20/2019 7:25:00 AM
Bromomethane	< 0.58	0.58		ug/m3	1	4/20/2019 7:25:00 AM
Carbon disulfide	< 0.47	0.47		ug/m3	1	4/20/2019 7:25:00 AM
Carbon tetrachloride	0.57	0.19		ug/m3	1	4/20/2019 7:25:00 AM
Chlorobenzene	< 0.69	0.69		ug/m3	1	4/20/2019 7:25:00 AM
Chloroethane	< 0.40	0.40		ug/m3	1	4/20/2019 7:25:00 AM
Chloroform	0.59	0.73	J	ug/m3	1	4/20/2019 7:25:00 AM
Chloromethane	1.1	0.31		ug/m3	1	4/20/2019 7:25:00 AM
cis-1,2-Dichloroethene	< 0.16	0.16		ug/m3	1	4/20/2019 7:25:00 AM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	4/20/2019 7:25:00 AM
Cyclohexane	< 0.52	0.52		ug/m3	1	4/20/2019 7:25:00 AM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	4/20/2019 7:25:00 AM
Ethyl acetate	110	50		ug/m3	90	4/22/2019 10:57:00 AM
Ethylbenzene	< 0.65	0.65		ug/m3	1	4/20/2019 7:25:00 AM
Freon 11	1.6	0.84		ug/m3	1	4/20/2019 7:25:00 AM
Freon 113	< 1.1	1.1		ug/m3	1	4/20/2019 7:25:00 AM
Freon 114	< 1.0	1.0		ug/m3	1	4/20/2019 7:25:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *23-Apr-19*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20190415
Lab Order:	C1904047	**Tag Number:**	243,337
Project:	3130 Monroe Ave	**Collection Date:**	4/15/2019
Lab ID:	C1904047-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
Freon 12	2.9	0.74		ug/m3	1	4/20/2019 7:25:00 AM
Heptane	< 0.61	0.61		ug/m3	1	4/20/2019 7:25:00 AM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	4/20/2019 7:25:00 AM
Hexane	< 0.53	0.53		ug/m3	1	4/20/2019 7:25:00 AM
Isopropyl alcohol	190	34		ug/m3	90	4/22/2019 10:57:00 AM
m&p-Xylene	0.69	1.3	J	ug/m3	1	4/20/2019 7:25:00 AM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	4/20/2019 7:25:00 AM
Methyl Ethyl Ketone	1.1	0.88		ug/m3	1	4/20/2019 7:25:00 AM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	4/20/2019 7:25:00 AM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	4/20/2019 7:25:00 AM
Methylene chloride	1.9	0.52		ug/m3	1	4/20/2019 7:25:00 AM
o-Xylene	< 0.65	0.65		ug/m3	1	4/20/2019 7:25:00 AM
Propylene	< 0.26	0.26		ug/m3	1	4/20/2019 7:25:00 AM
Styrene	< 0.64	0.64		ug/m3	1	4/20/2019 7:25:00 AM
Tetrachloroethylene	8.5	1.0		ug/m3	1	4/20/2019 7:25:00 AM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	4/20/2019 7:25:00 AM
Toluene	2.3	0.57		ug/m3	1	4/20/2019 7:25:00 AM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	4/20/2019 7:25:00 AM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	4/20/2019 7:25:00 AM
Trichloroethene	0.38	0.16		ug/m3	1	4/20/2019 7:25:00 AM
Vinyl acetate	< 0.53	0.53		ug/m3	1	4/20/2019 7:25:00 AM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	4/20/2019 7:25:00 AM
Vinyl chloride	< 0.10	0.10		ug/m3	1	4/20/2019 7:25:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *23-Apr-19*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20190415
Lab Order:	C1904047	**Tag Number:**	539,258
Project:	3130 Monroe Ave	**Collection Date:**	4/15/2019
Lab ID:	C1904047-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	4/20/2019 6:43:00 AM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	4/20/2019 6:43:00 AM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	4/20/2019 6:43:00 AM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	4/20/2019 6:43:00 AM
1,1-Dichloroethene	< 0.16	0.16		ug/m3	1	4/20/2019 6:43:00 AM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	4/20/2019 6:43:00 AM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	4/20/2019 6:43:00 AM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	4/20/2019 6:43:00 AM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	4/20/2019 6:43:00 AM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	4/20/2019 6:43:00 AM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	4/20/2019 6:43:00 AM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	4/20/2019 6:43:00 AM
1,3-butadiene	< 0.33	0.33		ug/m3	1	4/20/2019 6:43:00 AM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	4/20/2019 6:43:00 AM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	4/20/2019 6:43:00 AM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	4/20/2019 6:43:00 AM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	4/20/2019 6:43:00 AM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	4/20/2019 6:43:00 AM
Acetone	24000	5200		ug/m3	7290	4/22/2019 5:51:00 PM
Allyl chloride	< 0.47	0.47		ug/m3	1	4/20/2019 6:43:00 AM
Benzene	0.99	0.48		ug/m3	1	4/20/2019 6:43:00 AM
Benzyl chloride	< 0.86	0.86		ug/m3	1	4/20/2019 6:43:00 AM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	4/20/2019 6:43:00 AM
Bromoform	< 1.6	1.6		ug/m3	1	4/20/2019 6:43:00 AM
Bromomethane	< 0.58	0.58		ug/m3	1	4/20/2019 6:43:00 AM
Carbon disulfide	< 0.47	0.47		ug/m3	1	4/20/2019 6:43:00 AM
Carbon tetrachloride	0.57	0.19		ug/m3	1	4/20/2019 6:43:00 AM
Chlorobenzene	< 0.69	0.69		ug/m3	1	4/20/2019 6:43:00 AM
Chloroethane	< 0.40	0.40		ug/m3	1	4/20/2019 6:43:00 AM
Chloroform	3.8	0.73		ug/m3	1	4/20/2019 6:43:00 AM
Chloromethane	< 0.31	0.31		ug/m3	1	4/20/2019 6:43:00 AM
cis-1,2-Dichloroethene	< 0.16	0.16		ug/m3	1	4/20/2019 6:43:00 AM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	4/20/2019 6:43:00 AM
Cyclohexane	< 0.52	0.52		ug/m3	1	4/20/2019 6:43:00 AM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	4/20/2019 6:43:00 AM
Ethyl acetate	1200	400		ug/m3	729	4/22/2019 5:14:00 PM
Ethylbenzene	1.3	0.65		ug/m3	1	4/20/2019 6:43:00 AM
Freon 11	1.5	0.84		ug/m3	1	4/20/2019 6:43:00 AM
Freon 113	< 1.1	1.1		ug/m3	1	4/20/2019 6:43:00 AM
Freon 114	< 1.0	1.0		ug/m3	1	4/20/2019 6:43:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *23-Apr-19*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20190415
Lab Order:	C1904047	**Tag Number:**	539,258
Project:	3130 Monroe Ave	**Collection Date:**	4/15/2019
Lab ID:	C1904047-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
Freon 12	2.4	0.74		ug/m3	1	4/20/2019 6:43:00 AM
Heptane	0.74	0.61		ug/m3	1	4/20/2019 6:43:00 AM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	4/20/2019 6:43:00 AM
Hexane	< 0.53	0.53		ug/m3	1	4/20/2019 6:43:00 AM
Isopropyl alcohol	2000	270		ug/m3	729	4/22/2019 5:14:00 PM
m&p-Xylene	4.1	1.3		ug/m3	1	4/20/2019 6:43:00 AM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	4/20/2019 6:43:00 AM
Methyl Ethyl Ketone	5.3	0.88		ug/m3	1	4/20/2019 6:43:00 AM
Methyl Isobutyl Ketone	0.90	1.2	J	ug/m3	1	4/20/2019 6:43:00 AM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	4/20/2019 6:43:00 AM
Methylene chloride	1.5	0.52		ug/m3	1	4/20/2019 6:43:00 AM
o-Xylene	1.2	0.65		ug/m3	1	4/20/2019 6:43:00 AM
Propylene	< 0.26	0.26		ug/m3	1	4/20/2019 6:43:00 AM
Styrene	0.51	0.64	J	ug/m3	1	4/20/2019 6:43:00 AM
Tetrachloroethylene	4.4	1.0		ug/m3	1	4/20/2019 6:43:00 AM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	4/20/2019 6:43:00 AM
Toluene	18	0.57		ug/m3	1	4/20/2019 6:43:00 AM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	4/20/2019 6:43:00 AM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	4/20/2019 6:43:00 AM
Trichloroethene	0.27	0.16		ug/m3	1	4/20/2019 6:43:00 AM
Vinyl acetate	< 0.53	0.53		ug/m3	1	4/20/2019 6:43:00 AM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	4/20/2019 6:43:00 AM
Vinyl chloride	< 0.10	0.10		ug/m3	1	4/20/2019 6:43:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *23-Apr-19*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	OS-1-20190415
Lab Order:	C1904047	**Tag Number:**	458,382
Project:	3130 Monroe Ave	**Collection Date:**	4/15/2019
Lab ID:	C1904047-003A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	4/20/2019 6:00:00 AM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	4/20/2019 6:00:00 AM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	4/20/2019 6:00:00 AM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	4/20/2019 6:00:00 AM
1,1-Dichloroethene	< 0.16	0.16		ug/m3	1	4/20/2019 6:00:00 AM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	4/20/2019 6:00:00 AM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	4/20/2019 6:00:00 AM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	4/20/2019 6:00:00 AM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	4/20/2019 6:00:00 AM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	4/20/2019 6:00:00 AM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	4/20/2019 6:00:00 AM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	4/20/2019 6:00:00 AM
1,3-butadiene	< 0.33	0.33		ug/m3	1	4/20/2019 6:00:00 AM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	4/20/2019 6:00:00 AM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	4/20/2019 6:00:00 AM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	4/20/2019 6:00:00 AM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	4/20/2019 6:00:00 AM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	4/20/2019 6:00:00 AM
Acetone	54	7.1		ug/m3	10	4/22/2019 2:23:00 PM
Allyl chloride	< 0.47	0.47		ug/m3	1	4/20/2019 6:00:00 AM
Benzene	0.42	0.48	J	ug/m3	1	4/20/2019 6:00:00 AM
Benzyl chloride	< 0.86	0.86		ug/m3	1	4/20/2019 6:00:00 AM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	4/20/2019 6:00:00 AM
Bromoform	< 1.6	1.6		ug/m3	1	4/20/2019 6:00:00 AM
Bromomethane	< 0.58	0.58		ug/m3	1	4/20/2019 6:00:00 AM
Carbon disulfide	< 0.47	0.47		ug/m3	1	4/20/2019 6:00:00 AM
Carbon tetrachloride	0.57	0.19		ug/m3	1	4/20/2019 6:00:00 AM
Chlorobenzene	< 0.69	0.69		ug/m3	1	4/20/2019 6:00:00 AM
Chloroethane	< 0.40	0.40		ug/m3	1	4/20/2019 6:00:00 AM
Chloroform	< 0.73	0.73		ug/m3	1	4/20/2019 6:00:00 AM
Chloromethane	1.2	0.31		ug/m3	1	4/20/2019 6:00:00 AM
cis-1,2-Dichloroethene	< 0.16	0.16		ug/m3	1	4/20/2019 6:00:00 AM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	4/20/2019 6:00:00 AM
Cyclohexane	< 0.52	0.52		ug/m3	1	4/20/2019 6:00:00 AM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	4/20/2019 6:00:00 AM
Ethyl acetate	1.4	0.54		ug/m3	1	4/20/2019 6:00:00 AM
Ethylbenzene	< 0.65	0.65		ug/m3	1	4/20/2019 6:00:00 AM
Freon 11	1.9	0.84		ug/m3	1	4/20/2019 6:00:00 AM
Freon 113	0.84	1.1	J	ug/m3	1	4/20/2019 6:00:00 AM
Freon 114	< 1.0	1.0		ug/m3	1	4/20/2019 6:00:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: *23-Apr-19*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	OS-1-20190415
Lab Order:	C1904047	**Tag Number:**	458,382
Project:	3130 Monroe Ave	**Collection Date:**	4/15/2019
Lab ID:	C1904047-003A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC-DCE-1,1DCE		**TO-15**				Analyst: **RJP**
Freon 12	3.1	0.74		ug/m3	1	4/20/2019 6:00:00 AM
Heptane	< 0.61	0.61		ug/m3	1	4/20/2019 6:00:00 AM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	4/20/2019 6:00:00 AM
Hexane	< 0.53	0.53		ug/m3	1	4/20/2019 6:00:00 AM
Isopropyl alcohol	3.7	0.37		ug/m3	1	4/20/2019 6:00:00 AM
m&p-Xylene	< 1.3	1.3		ug/m3	1	4/20/2019 6:00:00 AM
Methyl Butyl Ketone	< 1.2	1.2		ug/m3	1	4/20/2019 6:00:00 AM
Methyl Ethyl Ketone	0.83	0.88	J	ug/m3	1	4/20/2019 6:00:00 AM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	4/20/2019 6:00:00 AM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	4/20/2019 6:00:00 AM
Methylene chloride	1.1	0.52		ug/m3	1	4/20/2019 6:00:00 AM
o-Xylene	< 0.65	0.65		ug/m3	1	4/20/2019 6:00:00 AM
Propylene	< 0.26	0.26		ug/m3	1	4/20/2019 6:00:00 AM
Styrene	< 0.64	0.64		ug/m3	1	4/20/2019 6:00:00 AM
Tetrachloroethylene	< 1.0	1.0		ug/m3	1	4/20/2019 6:00:00 AM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	4/20/2019 6:00:00 AM
Toluene	0.68	0.57		ug/m3	1	4/20/2019 6:00:00 AM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	4/20/2019 6:00:00 AM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	4/20/2019 6:00:00 AM
Trichloroethene	< 0.16	0.16		ug/m3	1	4/20/2019 6:00:00 AM
Vinyl acetate	< 0.53	0.53		ug/m3	1	4/20/2019 6:00:00 AM
Vinyl Bromide	< 0.66	0.66		ug/m3	1	4/20/2019 6:00:00 AM
Vinyl chloride	< 0.10	0.10		ug/m3	1	4/20/2019 6:00:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

RAVI ENGINEERING & LAND SURVEYING, P.C.

Appendix C
Groundwater Laboratory Data

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier:	MW-1		
Lab Sample ID:	170791-01	**Date Sampled:**	3/2/2017
Matrix:	Groundwater	**Date Received:**	3/3/2017

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		3/8/2017 17:23
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		3/8/2017 17:23
1,1,2-Trichloroethane	< 2.00	ug/L		3/8/2017 17:23
1,1-Dichloroethane	< 2.00	ug/L		3/8/2017 17:23
1,1-Dichloroethene	< 2.00	ug/L		3/8/2017 17:23
1,2,3-Trichlorobenzene	< 5.00	ug/L		3/8/2017 17:23
1,2,4-Trichlorobenzene	< 5.00	ug/L		3/8/2017 17:23
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		3/8/2017 17:23
1,2-Dibromoethane	< 2.00	ug/L		3/8/2017 17:23
1,2-Dichlorobenzene	< 2.00	ug/L		3/8/2017 17:23
1,2-Dichloroethane	< 2.00	ug/L		3/8/2017 17:23
1,2-Dichloropropane	< 2.00	ug/L		3/8/2017 17:23
1,3-Dichlorobenzene	< 2.00	ug/L		3/8/2017 17:23
1,4-Dichlorobenzene	< 2.00	ug/L		3/8/2017 17:23
1,4-dioxane	< 20.0	ug/L		3/8/2017 17:23
2-Butanone	< 10.0	ug/L		3/8/2017 17:23
2-Hexanone	< 5.00	ug/L		3/8/2017 17:23
4-Methyl-2-pentanone	< 5.00	ug/L		3/8/2017 17:23
Acetone	< 10.0	ug/L		3/8/2017 17:23
Benzene	< 1.00	ug/L		3/8/2017 17:23
Bromochloromethane	< 5.00	ug/L		3/8/2017 17:23
Bromodichloromethane	< 2.00	ug/L		3/8/2017 17:23
Bromoform	< 5.00	ug/L		3/8/2017 17:23
Bromomethane	< 2.00	ug/L		3/8/2017 17:23
Carbon disulfide	< 2.00	ug/L		3/8/2017 17:23
Carbon Tetrachloride	< 2.00	ug/L		3/8/2017 17:23
Chlorobenzene	< 2.00	ug/L		3/8/2017 17:23

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier:	MW-1		
Lab Sample ID:	170791-01	**Date Sampled:**	3/2/2017
Matrix:	Groundwater	**Date Received:**	3/3/2017

Chloroethane	< 2.00	ug/L	3/8/2017	17:23
Chloroform	< 2.00	ug/L	3/8/2017	17:23
Chloromethane	< 2.00	ug/L	3/8/2017	17:23
cis-1,2-Dichloroethene	< 2.00	ug/L	3/8/2017	17:23
cis-1,3-Dichloropropene	< 2.00	ug/L	3/8/2017	17:23
Cyclohexane	< 10.0	ug/L	3/8/2017	17:23
Dibromochloromethane	< 2.00	ug/L	3/8/2017	17:23
Dichlorodifluoromethane	< 2.00	ug/L	3/8/2017	17:23
Ethylbenzene	< 2.00	ug/L	3/8/2017	17:23
Freon 113	< 2.00	ug/L	3/8/2017	17:23
Isopropylbenzene	< 2.00	ug/L	3/8/2017	17:23
m,p-Xylene	< 2.00	ug/L	3/8/2017	17:23
Methyl acetate	< 2.00	ug/L	3/8/2017	17:23
Methyl tert-butyl Ether	< 2.00	ug/L	3/8/2017	17:23
Methylcyclohexane	< 2.00	ug/L	3/8/2017	17:23
Methylene chloride	< 5.00	ug/L	3/8/2017	17:23
o-Xylene	< 2.00	ug/L	3/8/2017	17:23
Styrene	< 5.00	ug/L	3/8/2017	17:23
Tetrachloroethene	< 2.00	ug/L	3/8/2017	17:23
Toluene	< 2.00	ug/L	3/8/2017	17:23
trans-1,2-Dichloroethene	< 2.00	ug/L	3/8/2017	17:23
trans-1,3-Dichloropropene	< 2.00	ug/L	3/8/2017	17:23
Trichloroethene	< 2.00	ug/L	3/8/2017	17:23
Trichlorofluoromethane	< 2.00	ug/L	3/8/2017	17:23
Vinyl chloride	< 2.00	ug/L	3/8/2017	17:23

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-1
Lab Sample ID: 170791-01 **Date Sampled:** 3/2/2017
Matrix: Groundwater **Date Received:** 3/3/2017

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**106**	81.2 - 120		3/8/2017	17:23
4-Bromofluorobenzene	**87.2**	82.4 - 112		3/8/2017	17:23
Pentafluorobenzene	**94.3**	90.2 - 112		3/8/2017	17:23
Toluene-D8	**96.4**	89.9 - 109		3/8/2017	17:23

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x39899.D

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier:	MW-2		
Lab Sample ID:	170791-02	**Date Sampled:**	3/2/2017
Matrix:	Groundwater	**Date Received:**	3/3/2017

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		3/8/2017 20:49
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		3/8/2017 20:49
1,1,2-Trichloroethane	< 2.00	ug/L		3/8/2017 20:49
1,1-Dichloroethane	< 2.00	ug/L		3/8/2017 20:49
1,1-Dichloroethene	< 2.00	ug/L		3/8/2017 20:49
1,2,3-Trichlorobenzene	< 5.00	ug/L		3/8/2017 20:49
1,2,4-Trichlorobenzene	< 5.00	ug/L		3/8/2017 20:49
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		3/8/2017 20:49
1,2-Dibromoethane	< 2.00	ug/L		3/8/2017 20:49
1,2-Dichlorobenzene	< 2.00	ug/L		3/8/2017 20:49
1,2-Dichloroethane	< 2.00	ug/L		3/8/2017 20:49
1,2-Dichloropropane	< 2.00	ug/L		3/8/2017 20:49
1,3-Dichlorobenzene	< 2.00	ug/L		3/8/2017 20:49
1,4-Dichlorobenzene	< 2.00	ug/L		3/8/2017 20:49
1,4-dioxane	< 20.0	ug/L		3/8/2017 20:49
2-Butanone	< 10.0	ug/L		3/8/2017 20:49
2-Hexanone	< 5.00	ug/L		3/8/2017 20:49
4-Methyl-2-pentanone	< 5.00	ug/L		3/8/2017 20:49
Acetone	**6.60**	ug/L	J	3/8/2017 20:49
Benzene	< 1.00	ug/L		3/8/2017 20:49
Bromochloromethane	< 5.00	ug/L		3/8/2017 20:49
Bromodichloromethane	< 2.00	ug/L		3/8/2017 20:49
Bromoform	< 5.00	ug/L		3/8/2017 20:49
Bromomethane	< 2.00	ug/L		3/8/2017 20:49
Carbon disulfide	< 2.00	ug/L		3/8/2017 20:49
Carbon Tetrachloride	< 2.00	ug/L		3/8/2017 20:49
Chlorobenzene	< 2.00	ug/L		3/8/2017 20:49

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier:	MW-2		
Lab Sample ID:	170791-02	**Date Sampled:**	3/2/2017
Matrix:	Groundwater	**Date Received:**	3/3/2017

Chloroethane	< 2.00	ug/L		3/8/2017	20:49
Chloroform	< 2.00	ug/L		3/8/2017	20:49
Chloromethane	< 2.00	ug/L		3/8/2017	20:49
cis-1,2-Dichloroethene	< 2.00	ug/L		3/8/2017	20:49
cis-1,3-Dichloropropene	< 2.00	ug/L		3/8/2017	20:49
Cyclohexane	< 10.0	ug/L		3/8/2017	20:49
Dibromochloromethane	< 2.00	ug/L		3/8/2017	20:49
Dichlorodifluoromethane	< 2.00	ug/L		3/8/2017	20:49
Ethylbenzene	< 2.00	ug/L		3/8/2017	20:49
Freon 113	< 2.00	ug/L		3/8/2017	20:49
Isopropylbenzene	< 2.00	ug/L		3/8/2017	20:49
m,p-Xylene	**1.94**	ug/L	J	3/8/2017	20:49
Methyl acetate	< 2.00	ug/L		3/8/2017	20:49
Methyl tert-butyl Ether	< 2.00	ug/L		3/8/2017	20:49
Methylcyclohexane	< 2.00	ug/L		3/8/2017	20:49
Methylene chloride	< 5.00	ug/L		3/8/2017	20:49
o-Xylene	**1.99**	ug/L	J	3/8/2017	20:49
Styrene	< 5.00	ug/L		3/8/2017	20:49
Tetrachloroethene	< 2.00	ug/L		3/8/2017	20:49
Toluene	< 2.00	ug/L		3/8/2017	20:49
trans-1,2-Dichloroethene	< 2.00	ug/L		3/8/2017	20:49
trans-1,3-Dichloropropene	< 2.00	ug/L		3/8/2017	20:49
Trichloroethene	< 2.00	ug/L		3/8/2017	20:49
Trichlorofluoromethane	< 2.00	ug/L		3/8/2017	20:49
Vinyl chloride	< 2.00	ug/L		3/8/2017	20:49

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-2
Lab Sample ID: 170791-02 **Date Sampled:** 3/2/2017
Matrix: Groundwater **Date Received:** 3/3/2017

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**106**	81.2 - 120		3/8/2017	20:49
4-Bromofluorobenzene	**93.6**	82.4 - 112		3/8/2017	20:49
Pentafluorobenzene	**95.4**	90.2 - 112		3/8/2017	20:49
Toluene-D8	**95.0**	89.9 - 109		3/8/2017	20:49

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x39908.D

Report Prepared Thursday, March 09, 2017

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier:	MW-3		
Lab Sample ID:	170791-03	**Date Sampled:**	3/2/2017
Matrix:	Groundwater	**Date Received:**	3/3/2017

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		3/8/2017 18:09
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		3/8/2017 18:09
1,1,2-Trichloroethane	< 2.00	ug/L		3/8/2017 18:09
1,1-Dichloroethane	< 2.00	ug/L		3/8/2017 18:09
1,1-Dichloroethene	< 2.00	ug/L		3/8/2017 18:09
1,2,3-Trichlorobenzene	< 5.00	ug/L		3/8/2017 18:09
1,2,4-Trichlorobenzene	< 5.00	ug/L		3/8/2017 18:09
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		3/8/2017 18:09
1,2-Dibromoethane	< 2.00	ug/L		3/8/2017 18:09
1,2-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:09
1,2-Dichloroethane	< 2.00	ug/L		3/8/2017 18:09
1,2-Dichloropropane	< 2.00	ug/L		3/8/2017 18:09
1,3-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:09
1,4-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:09
1,4-dioxane	< 20.0	ug/L		3/8/2017 18:09
2-Butanone	< 10.0	ug/L		3/8/2017 18:09
2-Hexanone	< 5.00	ug/L		3/8/2017 18:09
4-Methyl-2-pentanone	< 5.00	ug/L		3/8/2017 18:09
Acetone	< 10.0	ug/L		3/8/2017 18:09
Benzene	< 1.00	ug/L		3/8/2017 18:09
Bromochloromethane	< 5.00	ug/L		3/8/2017 18:09
Bromodichloromethane	< 2.00	ug/L		3/8/2017 18:09
Bromoform	< 5.00	ug/L		3/8/2017 18:09
Bromomethane	< 2.00	ug/L		3/8/2017 18:09
Carbon disulfide	< 2.00	ug/L		3/8/2017 18:09
Carbon Tetrachloride	< 2.00	ug/L		3/8/2017 18:09
Chlorobenzene	< 2.00	ug/L		3/8/2017 18:09

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier:	MW-3		
Lab Sample ID:	170791-03	**Date Sampled:**	3/2/2017
Matrix:	Groundwater	**Date Received:**	3/3/2017

Chloroethane	< 2.00	ug/L		3/8/2017	18:09
Chloroform	< 2.00	ug/L		3/8/2017	18:09
Chloromethane	< 2.00	ug/L		3/8/2017	18:09
cis-1,2-Dichloroethene	< 2.00	ug/L		3/8/2017	18:09
cis-1,3-Dichloropropene	< 2.00	ug/L		3/8/2017	18:09
Cyclohexane	< 10.0	ug/L		3/8/2017	18:09
Dibromochloromethane	< 2.00	ug/L		3/8/2017	18:09
Dichlorodifluoromethane	< 2.00	ug/L		3/8/2017	18:09
Ethylbenzene	< 2.00	ug/L		3/8/2017	18:09
Freon 113	< 2.00	ug/L		3/8/2017	18:09
Isopropylbenzene	< 2.00	ug/L		3/8/2017	18:09
m,p-Xylene	< 2.00	ug/L		3/8/2017	18:09
Methyl acetate	< 2.00	ug/L		3/8/2017	18:09
Methyl tert-butyl Ether	< 2.00	ug/L		3/8/2017	18:09
Methylcyclohexane	< 2.00	ug/L		3/8/2017	18:09
Methylene chloride	< 5.00	ug/L		3/8/2017	18:09
o-Xylene	< 2.00	ug/L		3/8/2017	18:09
Styrene	< 5.00	ug/L		3/8/2017	18:09
Tetrachloroethene	**1.92**	ug/L	J	3/8/2017	18:09
Toluene	< 2.00	ug/L		3/8/2017	18:09
trans-1,2-Dichloroethene	< 2.00	ug/L		3/8/2017	18:09
trans-1,3-Dichloropropene	< 2.00	ug/L		3/8/2017	18:09
Trichloroethene	< 2.00	ug/L		3/8/2017	18:09
Trichlorofluoromethane	< 2.00	ug/L		3/8/2017	18:09
Vinyl chloride	< 2.00	ug/L		3/8/2017	18:09

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-3
Lab Sample ID: 170791-03 **Date Sampled:** 3/2/2017
Matrix: Groundwater **Date Received:** 3/3/2017

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**107**	81.2 - 120		3/8/2017	18:09
4-Bromofluorobenzene	**88.1**	82.4 - 112		3/8/2017	18:09
Pentafluorobenzene	**96.2**	90.2 - 112		3/8/2017	18:09
Toluene-D8	**96.4**	89.9 - 109		3/8/2017	18:09

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x39901.D

Report Prepared Thursday, March 09, 2017

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier:	MW-4		
Lab Sample ID:	170791-04	**Date Sampled:**	3/2/2017
Matrix:	Groundwater	**Date Received:**	3/3/2017

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		3/8/2017 18:32
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		3/8/2017 18:32
1,1,2-Trichloroethane	< 2.00	ug/L		3/8/2017 18:32
1,1-Dichloroethane	< 2.00	ug/L		3/8/2017 18:32
1,1-Dichloroethene	< 2.00	ug/L		3/8/2017 18:32
1,2,3-Trichlorobenzene	< 5.00	ug/L		3/8/2017 18:32
1,2,4-Trichlorobenzene	< 5.00	ug/L		3/8/2017 18:32
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		3/8/2017 18:32
1,2-Dibromoethane	< 2.00	ug/L		3/8/2017 18:32
1,2-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:32
1,2-Dichloroethane	< 2.00	ug/L		3/8/2017 18:32
1,2-Dichloropropane	< 2.00	ug/L		3/8/2017 18:32
1,3-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:32
1,4-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:32
1,4-dioxane	< 20.0	ug/L		3/8/2017 18:32
2-Butanone	< 10.0	ug/L		3/8/2017 18:32
2-Hexanone	< 5.00	ug/L		3/8/2017 18:32
4-Methyl-2-pentanone	< 5.00	ug/L		3/8/2017 18:32
Acetone	< 10.0	ug/L		3/8/2017 18:32
Benzene	< 1.00	ug/L		3/8/2017 18:32
Bromochloromethane	< 5.00	ug/L		3/8/2017 18:32
Bromodichloromethane	< 2.00	ug/L		3/8/2017 18:32
Bromoform	< 5.00	ug/L		3/8/2017 18:32
Bromomethane	< 2.00	ug/L		3/8/2017 18:32
Carbon disulfide	< 2.00	ug/L		3/8/2017 18:32
Carbon Tetrachloride	< 2.00	ug/L		3/8/2017 18:32
Chlorobenzene	< 2.00	ug/L		3/8/2017 18:32

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier:	MW-4		
Lab Sample ID:	170791-04	**Date Sampled:**	3/2/2017
Matrix:	Groundwater	**Date Received:**	3/3/2017

Chloroethane	< 2.00	ug/L	3/8/2017	18:32
Chloroform	< 2.00	ug/L	3/8/2017	18:32
Chloromethane	< 2.00	ug/L	3/8/2017	18:32
cis-1,2-Dichloroethene	< 2.00	ug/L	3/8/2017	18:32
cis-1,3-Dichloropropene	< 2.00	ug/L	3/8/2017	18:32
Cyclohexane	< 10.0	ug/L	3/8/2017	18:32
Dibromochloromethane	< 2.00	ug/L	3/8/2017	18:32
Dichlorodifluoromethane	< 2.00	ug/L	3/8/2017	18:32
Ethylbenzene	< 2.00	ug/L	3/8/2017	18:32
Freon 113	< 2.00	ug/L	3/8/2017	18:32
Isopropylbenzene	< 2.00	ug/L	3/8/2017	18:32
m,p-Xylene	< 2.00	ug/L	3/8/2017	18:32
Methyl acetate	< 2.00	ug/L	3/8/2017	18:32
Methyl tert-butyl Ether	< 2.00	ug/L	3/8/2017	18:32
Methylcyclohexane	< 2.00	ug/L	3/8/2017	18:32
Methylene chloride	< 5.00	ug/L	3/8/2017	18:32
o-Xylene	< 2.00	ug/L	3/8/2017	18:32
Styrene	< 5.00	ug/L	3/8/2017	18:32
Tetrachloroethene	< 2.00	ug/L	3/8/2017	18:32
Toluene	< 2.00	ug/L	3/8/2017	18:32
trans-1,2-Dichloroethene	< 2.00	ug/L	3/8/2017	18:32
trans-1,3-Dichloropropene	< 2.00	ug/L	3/8/2017	18:32
Trichloroethene	< 2.00	ug/L	3/8/2017	18:32
Trichlorofluoromethane	< 2.00	ug/L	3/8/2017	18:32
Vinyl chloride	< 2.00	ug/L	3/8/2017	18:32

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-4
Lab Sample ID: 170791-04 **Date Sampled:** 3/2/2017
Matrix: Groundwater **Date Received:** 3/3/2017

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**107**	81.2 - 120		3/8/2017	18:32
4-Bromofluorobenzene	**84.3**	82.4 - 112		3/8/2017	18:32
Pentafluorobenzene	**95.0**	90.2 - 112		3/8/2017	18:32
Toluene-D8	**99.6**	89.9 - 109		3/8/2017	18:32

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x39902.D

Report Prepared Thursday, March 09, 2017

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier:	T-736 Trip Blank		
Lab Sample ID:	170791-05	**Date Sampled:**	3/2/2017
Matrix:	Water	**Date Received:**	3/3/2017

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		3/8/2017 16:59
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		3/8/2017 16:59
1,1,2-Trichloroethane	< 2.00	ug/L		3/8/2017 16:59
1,1-Dichloroethane	< 2.00	ug/L		3/8/2017 16:59
1,1-Dichloroethene	< 2.00	ug/L		3/8/2017 16:59
1,2,3-Trichlorobenzene	< 5.00	ug/L		3/8/2017 16:59
1,2,4-Trichlorobenzene	< 5.00	ug/L		3/8/2017 16:59
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		3/8/2017 16:59
1,2-Dibromoethane	< 2.00	ug/L		3/8/2017 16:59
1,2-Dichlorobenzene	< 2.00	ug/L		3/8/2017 16:59
1,2-Dichloroethane	< 2.00	ug/L		3/8/2017 16:59
1,2-Dichloropropane	< 2.00	ug/L		3/8/2017 16:59
1,3-Dichlorobenzene	< 2.00	ug/L		3/8/2017 16:59
1,4-Dichlorobenzene	< 2.00	ug/L		3/8/2017 16:59
1,4-dioxane	< 20.0	ug/L		3/8/2017 16:59
2-Butanone	< 10.0	ug/L		3/8/2017 16:59
2-Hexanone	< 5.00	ug/L		3/8/2017 16:59
4-Methyl-2-pentanone	< 5.00	ug/L		3/8/2017 16:59
Acetone	< 10.0	ug/L		3/8/2017 16:59
Benzene	< 1.00	ug/L		3/8/2017 16:59
Bromochloromethane	< 5.00	ug/L		3/8/2017 16:59
Bromodichloromethane	< 2.00	ug/L		3/8/2017 16:59
Bromoform	< 5.00	ug/L		3/8/2017 16:59
Bromomethane	< 2.00	ug/L		3/8/2017 16:59
Carbon disulfide	< 2.00	ug/L		3/8/2017 16:59
Carbon Tetrachloride	< 2.00	ug/L		3/8/2017 16:59
Chlorobenzene	< 2.00	ug/L		3/8/2017 16:59

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier:	T-736 Trip Blank		
Lab Sample ID:	170791-05	**Date Sampled:**	3/2/2017
Matrix:	Water	**Date Received:**	3/3/2017

Chloroethane	< 2.00	ug/L		3/8/2017 16:59
Chloroform	< 2.00	ug/L		3/8/2017 16:59
Chloromethane	< 2.00	ug/L		3/8/2017 16:59
cis-1,2-Dichloroethene	< 2.00	ug/L		3/8/2017 16:59
cis-1,3-Dichloropropene	< 2.00	ug/L		3/8/2017 16:59
Cyclohexane	< 10.0	ug/L		3/8/2017 16:59
Dibromochloromethane	< 2.00	ug/L		3/8/2017 16:59
Dichlorodifluoromethane	< 2.00	ug/L		3/8/2017 16:59
Ethylbenzene	< 2.00	ug/L		3/8/2017 16:59
Freon 113	< 2.00	ug/L		3/8/2017 16:59
Isopropylbenzene	< 2.00	ug/L		3/8/2017 16:59
m,p-Xylene	< 2.00	ug/L		3/8/2017 16:59
Methyl acetate	< 2.00	ug/L		3/8/2017 16:59
Methyl tert-butyl Ether	< 2.00	ug/L		3/8/2017 16:59
Methylcyclohexane	< 2.00	ug/L		3/8/2017 16:59
Methylene chloride	< 5.00	ug/L		3/8/2017 16:59
o-Xylene	< 2.00	ug/L		3/8/2017 16:59
Styrene	< 5.00	ug/L		3/8/2017 16:59
Tetrachloroethene	< 2.00	ug/L		3/8/2017 16:59
Toluene	< 2.00	ug/L		3/8/2017 16:59
trans-1,2-Dichloroethene	< 2.00	ug/L		3/8/2017 16:59
trans-1,3-Dichloropropene	< 2.00	ug/L		3/8/2017 16:59
Trichloroethene	< 2.00	ug/L		3/8/2017 16:59
Trichlorofluoromethane	< 2.00	ug/L		3/8/2017 16:59
Vinyl chloride	< 2.00	ug/L		3/8/2017 16:59

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave

Sample Identifier: T-736 Trip Blank
Lab Sample ID: 170791-05 **Date Sampled:** 3/2/2017
Matrix: Water **Date Received:** 3/3/2017

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**107**	81.2 - 120		3/8/2017	16:59
4-Bromofluorobenzene	**86.1**	82.4 - 112		3/8/2017	16:59
Pentafluorobenzene	**97.6**	90.2 - 112		3/8/2017	16:59
Toluene-D8	**94.2**	89.9 - 109		3/8/2017	16:59

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x39898.D

Report Prepared Thursday, March 09, 2017

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Analytical Report Appendix

The reported results relate only to the samples as they have been received by the laboratory.

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All soil/sludge samples have been reported on a dry weight basis, unless qualified "reported as received". Other solids are reported as received.

Low level Volatiles blank reports for soil/solid matrix are based on a nominal 5 gram weight. Sample results and reporting limits are based on actual weight, which may be more or less than 5 grams.

The Chain of Custody provides additional information, including compliance with sample condition requirements upon receipt. Sample condition requirements are defined under the 2003 NELAC Standard, sections 5.5.8.3.1 and 5.5.8.3.2.

NYSDOH ELAP does not certify for all parameters. Paradigm Environmental Services or the indicated subcontracted laboratory does hold certification for all analytes where certification is offered by ELAP unless otherwise specified. Aliquots separated for certain tests, such as TCLP, are indicated on the Chain of Custody and final reports with an "A" suffix.

Data qualifiers are used, when necessary, to provide additional information about the data. This information may be communicated as a flag or as text at the bottom of the report. Please refer to the following list of analyte-specific, frequently used data flags and their meaning:

"<" = Analyzed for but not detected at or above the quantitation limit.
"E" = Result has been estimated, calibration limit exceeded.
"Z" = See case narrative.
"D" = Sample, Laboratory Control Sample, or Matrix Spike Duplicate results above Relative Percent Difference limit.
"M" = Matrix spike recoveries outside QC limits. Matrix bias indicated.
"B" = Method blank contained trace levels of analyte. Refer to included method blank report.
"J" = Result estimated between the quantitation limit and half the quantitation limit.
"L" = Laboratory Control Sample recovery outside accepted QC limits.
"P" = Concentration differs by more than 40% between the primary and secondary analytical columns.
"NC" = Not calculable. Applicable to RPD if sample or duplicate result is non-detect or estimated (see primary report for data flags). Applicable to MS if sample is greater or equal to ten times the spike added. Applicable to sample surrogates or MS if sample dilution is 10x or higher.
"" = Indicates any recoveries outside associated acceptance windows. Surrogate outliers in samples are presumed matrix effects. LCS demonstrates method compliance unless otherwise noted.*
"(1)" = Indicates data from primary column used for QC calculation.
"A" = denotes a parameter for which ELAP does not offer approval as part of their laboratory certification program.
"F" = denotes a parameter for which Paradigm does not carry certification, the results for which should therefore only be used where ELAP certification is not required, such as personal exposure assessment.

GENERAL TERMS AND CONDITIONS
LABORATORY SERVICES

These Terms and Conditions embody the whole agreement of the parties in the absence of a signed and executed contract between the Laboratory (LAB) and Client. They shall supersede all previous communications, representations, or agreements, either verbal or written, between the parties. The LAB specifically rejects all additional, inconsistent, or conflicting terms, whether printed or otherwise set forth in any purchase order or other communication from the Client to the LAB. The invalidity or unenforceability in whole or in part of any provision, term, or condition hereof shall not affect in any way the validity or enforceability of the remainder of the Terms and Conditions. No waiver by LAB of any provision, term, or condition hereof or of any breach by or obligation of the Client hereunder shall constitute a waiver of such provision, term, or condition on any other occasion or a waiver of any other breach by or obligation of the Client. This agreement shall be administered and interpreted under the laws of the state which services are procured.

Warranty. Recognizing that the nature of many samples is unknown and that some may contain potentially hazardous components, LAB warrants only that it will perform testing services, obtain findings, and prepare reports in accordance with generally accepted analytical laboratory principles and practices at the time of performance of services. LAB makes no other warranty, express or implied.

Scope and Compensation. LAB agrees to perform the services described in the chain of custody to which these terms and conditions are attached. Unless the parties agree in writing to the contrary, the duties of LAB shall not be construed to exceed the services specifically described. LAB will use LAB default method for all tests unless specified otherwise on the Work Order.
Payment terms are net 30 days from the date of invoice. All overdue payments are subject to an interest charge of one and one-half percent (1-1/2%) per month or a portion thereof. Client shall also be responsible for costs of collection, including payment of reasonable attorney fees if such expense is incurred. The prices, unless stated, do not include any sale, use or other taxes. Such taxes will be added to invoice prices when required.

Prices. Compensation for services performed will be based on the current Lab Analytical Fee Schedule or on quotations agreed to in writing by the parties. Turnaround time based charges are determined from the time of resolution of all work order questions. Testimony, court appearances or data compilation for legal action will be charged separately. Evaluation and reporting of initial screening runs may incur additional fees.

Limitations of Liability. In the event of any error, omission, or other professional negligence, the sole and exclusive responsibility of LAB shall be to re-perform the deficient work at its own expense and LAB shall have no other liability whatsoever. All claims shall be deemed waived unless made in writing and received by LAB within ninety (90) days following completion of services.
LAB shall have no liability, obligation, or responsibility of any kind for losses, costs, expenses, or other damages (including but not limited to any special, direct, incidental or consequential damages) with respect to LAB's services or results.
All results provided by LAB are strictly for the use of its clients and LAB is in no way responsible for the use of such results by clients or third parties. All reports should be considered in their entirety, and LAB is not responsible for the separation, detachment, or other use of any portion of these reports. Client may not assign the lab report without the written consent of the LAB.
Client covenants and agrees, at its/his/her sole expense, to indemnify, protect, defend, and save harmless the LAB from and against any and all damages, losses, liabilities, obligations, penalties, claims, litigation, demands, defenses, judgments, suits, actions, proceedings, costs, disbursements and/or expenses (including, without limitation attorneys' and experts' fees and disbursements) of any kind whatsoever which may at any time be imposed upon, incurred by or asserted or awarded against client relating to, resulting from or arising out of (a) the breach of this agreement by this client, (b) the negligence of the client in handling, delivering or disclosing any hazardous substance, (c) the violation of the Client of any applicable law, (d) non-compliance by the Client with any environmental permit or (e) a material misrepresentation in disclosing the materials to be tested.

Hazard Disclosure. Client represents and warrants that any sample delivered to LAB will be preceded or accompanied by complete written disclosure of the presence of any hazardous substances known or suspected by Client. Client further warrants that any sample containing any hazardous substance that is to be delivered to LAB will be packaged, labeled, transported, and delivered properly and in accordance with applicable laws.

Sample Handling. Prior to LAB's acceptance of any sample (or after any revocation of acceptance), the entire risk of loss or of damage to such sample remains with Client. Samples are accepted when receipt is acknowledged on chain of custody documentation. In no event will LAB have any responsibility for the action or inaction of any carrier shipping or delivering any sample to or from LAB premises.
Client authorizes LAB to proceed with the analysis of samples as received by the laboratory, recognizing that any samples not in compliance with all current DOH-ELAP-NELAP requirements for containers, preservation or holding time will be noted as such on the final report.
Disposal of hazardous waste samples is the responsibility of the Client. If the Client does not wish such samples returned, LAB may add storage and disposal fees to the final invoice. Maximum storage time for samples is 30 days after completion of analysis unless modified by applicable state or federal laws. Client will be required to give the LAB written instructions concerning disposal of these samples.
LAB reserves the absolute right, exercisable at any time, to refuse to receive delivery of, refuse to accept, or revoke acceptance of any sample, which, in the sole judgment of LAB (a) is of unsuitable volume, (b) may be or become unsuitable for or may pose a risk in handling, transport, or processing for any health, safety, environmental or other reason whether or not due to the presence in the sample of any hazardous substance, and whether or not such presence has been disclosed to LAB by Client or (c) if the condition or sample date make the sample unsuitable for analysis.

Legal Responsibility. LAB is solely responsible for performance of this contract, and no affiliated company, director, officer, employee, or agent shall have any legal responsibility hereunder, whether in contract or tort including negligence.

Assignment. LAB may assign its performance obligations under this contract to other parties, as it deems necessary. LAB shall disclose to Client any assignee (subcontractor) by ELAP ID # on the submitted final report.

Force Majeure. LAB shall have no responsibility or liability to the Client for any failure or delay in performance by LAB, which results in whole or in part from any cause or circumstance beyond the reasonable control of LAB. Such causes and circumstances shall include, but not limited to, acts of God, acts or orders of any government authority, strikes or other labor disputes, natural disasters, accidents, wars, civil disturbances, difficulties or delays in transportation, mail or delivery services, inability to obtain sufficient services or supplies from LAB's usual suppliers, or any other cause beyond LAB's reasonable control.

Law. This contract shall be continued under the laws of the State of New York without regard to its conflicts of laws provision.

179 Lake Avenue, Rochester, NY 14608 Office (585) 647-2530 Fax (585) 647-3311

PARADIGM ENVIRONMENTAL SERVICES, INC.

CHAIN OF CUSTODY

REPORT TO:		INVOICE TO:		
CLIENT: RAVI		CLIENT: SAME		LAB PROJECT ID: 170791
ADDRESS:		ADDRESS:		
CITY:	STATE: ZIP	CITY:	STATE: ZIP:	Quotation #:
PHONE: 585-697-2071		PHONE:		Email: LZICARI@RAVIENG.COM DMORTON@RAVIENG.COM
ATTN: Lynn Zicari		ATTN:		

PROJECT REFERENCE: 3130 MONROE AVE

Matrix Codes:
AQ - Aqueous Liquid; NQ - Non-Aqueous Liquid; WA - Water; WG - Groundwater; DW - Drinking Water; WW - Wastewater; SO - Soil; SL - Sludge; SD - Solid; PT - Paint; WP - Wipe; CK - Caulk; OL - Oil; AR - Air

REQUESTED ANALYSIS

DATE COLLECTED	TIME COLLECTED	COMPOSITE	GRAB	SAMPLE IDENTIFIER	MATRIX CODES	NUMBER OF CONTAINERS	TCL VOC	REMARKS	PARADIGM LAB SAMPLE NUMBER
3/2/17	16:00		X	MW-1	WG	2	X		01
↓	11:30		↓	MW-2	↓	2	X		02
	13:30			MW-3		2	X		03
↓	14:45		↓	MW-4	↓	2	X		04
				T-736		1	X	TRIP Blank	05
								13°C iced started in field 3/2/17 1801hrs NO water seals client dropped off not by Val	

Turnaround Time		Report Supplements			
Availability contingent upon lab approval; additional fees may apply.					
Standard 5 day	X	None Required		None Required	
10 day		Batch QC		Basic EDD	
Rush 3 day		Category A		NYSDEC EDD	X
Rush 2 day		Category B	X		
Rush 1 day					
Other		Other		Other EDD	
please indicate date needed:		please indicate package needed:		please indicate EDD needed :	

Lynn Zicari	3/2/17	Total Cost:
Sampled By	Date/Time	
Lynn Zicari	3/2/17 17:57	
Relinquished By	Date/Time	
Val Vail	3/2/17 1757	P.I.F.
Received By	Date/Time	
	3/3/17 09:46	
Received @ Lab By	Date/Time	

By signing this form, client agrees to Paradigm Terms and Conditions (reverse).

See additional page for sample conditions.

Chain of Custody Supplement

Client: Ravi Engineering **Completed by:** Glen Pezzulo

Lab Project ID: 170791 **Date:** 3/3/17

Sample Condition Requirements

Per NELAC/ELAP 210/241/242/243/244

Condition	NELAC compliance with the sample condition requirements upon receipt: Yes	No	N/A
Container Type	X		
Comments			
Transferred to method-compliant container			X
Headspace (<1 mL)	X		
Comments			
Preservation	X		
Comments			
Chlorine Absent (<0.10 ppm per test strip)			X
Comments			
Holding Time	X		
Comments			
Temperature	X		
Comments	13°C iced started in field		
Sufficient Sample Quantity	X		
Comments			

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier:	HLA-MW-2-2018		
Lab Sample ID:	184515-01	**Date Sampled:**	10/1/2018
Matrix:	Groundwater	**Date Received:**	10/2/2018

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		10/4/2018 15:45
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		10/4/2018 15:45
1,1,2-Trichloroethane	< 2.00	ug/L		10/4/2018 15:45
1,1-Dichloroethane	< 2.00	ug/L		10/4/2018 15:45
1,1-Dichloroethene	< 2.00	ug/L		10/4/2018 15:45
1,2,3-Trichlorobenzene	< 5.00	ug/L		10/4/2018 15:45
1,2,4-Trichlorobenzene	< 5.00	ug/L		10/4/2018 15:45
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		10/4/2018 15:45
1,2-Dibromoethane	< 2.00	ug/L		10/4/2018 15:45
1,2-Dichlorobenzene	< 2.00	ug/L		10/4/2018 15:45
1,2-Dichloroethane	< 2.00	ug/L		10/4/2018 15:45
1,2-Dichloropropane	< 2.00	ug/L		10/4/2018 15:45
1,3-Dichlorobenzene	< 2.00	ug/L		10/4/2018 15:45
1,4-Dichlorobenzene	< 2.00	ug/L		10/4/2018 15:45
1,4-Dioxane	< 20.0	ug/L		10/4/2018 15:45
2-Butanone	< 10.0	ug/L		10/4/2018 15:45
2-Hexanone	< 5.00	ug/L		10/4/2018 15:45
4-Methyl-2-pentanone	< 5.00	ug/L		10/4/2018 15:45
Acetone	< 10.0	ug/L		10/4/2018 15:45
Benzene	< 1.00	ug/L		10/4/2018 15:45
Bromochloromethane	< 5.00	ug/L		10/4/2018 15:45
Bromodichloromethane	< 2.00	ug/L		10/4/2018 15:45
Bromoform	< 5.00	ug/L		10/4/2018 15:45
Bromomethane	< 2.00	ug/L		10/4/2018 15:45
Carbon disulfide	< 2.00	ug/L		10/4/2018 15:45
Carbon Tetrachloride	< 2.00	ug/L		10/4/2018 15:45
Chlorobenzene	< 2.00	ug/L		10/4/2018 15:45

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: HLA-MW-2-2018
Lab Sample ID: 184515-01 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Chloroethane	< 2.00	ug/L	10/4/2018	15:45
Chloroform	< 2.00	ug/L	10/4/2018	15:45
Chloromethane	< 2.00	ug/L	10/4/2018	15:45
cis-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	15:45
cis-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	15:45
Cyclohexane	< 10.0	ug/L	10/4/2018	15:45
Dibromochloromethane	< 2.00	ug/L	10/4/2018	15:45
Dichlorodifluoromethane	< 2.00	ug/L	10/4/2018	15:45
Ethylbenzene	< 2.00	ug/L	10/4/2018	15:45
Freon 113	< 2.00	ug/L	10/4/2018	15:45
Isopropylbenzene	< 2.00	ug/L	10/4/2018	15:45
m,p-Xylene	< 2.00	ug/L	10/4/2018	15:45
Methyl acetate	< 2.00	ug/L	10/4/2018	15:45
Methyl tert-butyl Ether	< 2.00	ug/L	10/4/2018	15:45
Methylcyclohexane	< 2.00	ug/L	10/4/2018	15:45
Methylene chloride	< 5.00	ug/L	10/4/2018	15:45
o-Xylene	< 2.00	ug/L	10/4/2018	15:45
Styrene	< 5.00	ug/L	10/4/2018	15:45
Tetrachloroethene	< 2.00	ug/L	10/4/2018	15:45
Toluene	< 2.00	ug/L	10/4/2018	15:45
trans-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	15:45
trans-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	15:45
Trichloroethene	< 2.00	ug/L	10/4/2018	15:45
Trichlorofluoromethane	< 2.00	ug/L	10/4/2018	15:45
Vinyl chloride	< 2.00	ug/L	10/4/2018	15:45

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: HLA-MW-2-2018
Lab Sample ID: 184515-01 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**104**	80.7 - 121		10/4/2018	15:45
4-Bromofluorobenzene	**101**	74.3 - 121		10/4/2018	15:45
Pentafluorobenzene	**95.3**	86.2 - 111		10/4/2018	15:45
Toluene-D8	**97.8**	86.2 - 112		10/4/2018	15:45

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x54773.D

Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier:	MW-2-2018		
Lab Sample ID:	184515-02	**Date Sampled:**	10/1/2018
Matrix:	Groundwater	**Date Received:**	10/2/2018

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		10/4/2018 16:08
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		10/4/2018 16:08
1,1,2-Trichloroethane	< 2.00	ug/L		10/4/2018 16:08
1,1-Dichloroethane	< 2.00	ug/L		10/4/2018 16:08
1,1-Dichloroethene	< 2.00	ug/L		10/4/2018 16:08
1,2,3-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:08
1,2,4-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:08
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		10/4/2018 16:08
1,2-Dibromoethane	< 2.00	ug/L		10/4/2018 16:08
1,2-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:08
1,2-Dichloroethane	< 2.00	ug/L		10/4/2018 16:08
1,2-Dichloropropane	< 2.00	ug/L		10/4/2018 16:08
1,3-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:08
1,4-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:08
1,4-Dioxane	< 20.0	ug/L		10/4/2018 16:08
2-Butanone	< 10.0	ug/L		10/4/2018 16:08
2-Hexanone	< 5.00	ug/L		10/4/2018 16:08
4-Methyl-2-pentanone	< 5.00	ug/L		10/4/2018 16:08
Acetone	**7.98**	ug/L	J	10/4/2018 16:08
Benzene	< 1.00	ug/L		10/4/2018 16:08
Bromochloromethane	< 5.00	ug/L		10/4/2018 16:08
Bromodichloromethane	< 2.00	ug/L		10/4/2018 16:08
Bromoform	< 5.00	ug/L		10/4/2018 16:08
Bromomethane	< 2.00	ug/L		10/4/2018 16:08
Carbon disulfide	< 2.00	ug/L		10/4/2018 16:08
Carbon Tetrachloride	< 2.00	ug/L		10/4/2018 16:08
Chlorobenzene	< 2.00	ug/L		10/4/2018 16:08

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-2-2018
Lab Sample ID: 184515-02 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Chloroethane	< 2.00	ug/L	10/4/2018	16:08
Chloroform	< 2.00	ug/L	10/4/2018	16:08
Chloromethane	< 2.00	ug/L	10/4/2018	16:08
cis-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	16:08
cis-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	16:08
Cyclohexane	< 10.0	ug/L	10/4/2018	16:08
Dibromochloromethane	< 2.00	ug/L	10/4/2018	16:08
Dichlorodifluoromethane	< 2.00	ug/L	10/4/2018	16:08
Ethylbenzene	< 2.00	ug/L	10/4/2018	16:08
Freon 113	< 2.00	ug/L	10/4/2018	16:08
Isopropylbenzene	< 2.00	ug/L	10/4/2018	16:08
m,p-Xylene	< 2.00	ug/L	10/4/2018	16:08
Methyl acetate	< 2.00	ug/L	10/4/2018	16:08
Methyl tert-butyl Ether	< 2.00	ug/L	10/4/2018	16:08
Methylcyclohexane	< 2.00	ug/L	10/4/2018	16:08
Methylene chloride	< 5.00	ug/L	10/4/2018	16:08
o-Xylene	< 2.00	ug/L	10/4/2018	16:08
Styrene	< 5.00	ug/L	10/4/2018	16:08
Tetrachloroethene	< 2.00	ug/L	10/4/2018	16:08
Toluene	< 2.00	ug/L	10/4/2018	16:08
trans-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	16:08
trans-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	16:08
Trichloroethene	< 2.00	ug/L	10/4/2018	16:08
Trichlorofluoromethane	< 2.00	ug/L	10/4/2018	16:08
Vinyl chloride	< 2.00	ug/L	10/4/2018	16:08

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-2-2018
Lab Sample ID: 184515-02 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**101**	80.7 - 121		10/4/2018	16:08
4-Bromofluorobenzene	**99.4**	74.3 - 121		10/4/2018	16:08
Pentafluorobenzene	**95.6**	86.2 - 111		10/4/2018	16:08
Toluene-D8	**96.5**	86.2 - 112		10/4/2018	16:08

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x54774.D

Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier:	MW-3-2018		
Lab Sample ID:	184515-03	**Date Sampled:**	10/1/2018
Matrix:	Groundwater	**Date Received:**	10/2/2018

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		10/4/2018 16:32
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		10/4/2018 16:32
1,1,2-Trichloroethane	< 2.00	ug/L		10/4/2018 16:32
1,1-Dichloroethane	< 2.00	ug/L		10/4/2018 16:32
1,1-Dichloroethene	< 2.00	ug/L		10/4/2018 16:32
1,2,3-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:32
1,2,4-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:32
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		10/4/2018 16:32
1,2-Dibromoethane	< 2.00	ug/L		10/4/2018 16:32
1,2-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:32
1,2-Dichloroethane	< 2.00	ug/L		10/4/2018 16:32
1,2-Dichloropropane	< 2.00	ug/L		10/4/2018 16:32
1,3-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:32
1,4-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:32
1,4-Dioxane	< 20.0	ug/L		10/4/2018 16:32
2-Butanone	< 10.0	ug/L		10/4/2018 16:32
2-Hexanone	< 5.00	ug/L		10/4/2018 16:32
4-Methyl-2-pentanone	< 5.00	ug/L		10/4/2018 16:32
Acetone	< 10.0	ug/L		10/4/2018 16:32
Benzene	< 1.00	ug/L		10/4/2018 16:32
Bromochloromethane	< 5.00	ug/L		10/4/2018 16:32
Bromodichloromethane	< 2.00	ug/L		10/4/2018 16:32
Bromoform	< 5.00	ug/L		10/4/2018 16:32
Bromomethane	< 2.00	ug/L		10/4/2018 16:32
Carbon disulfide	< 2.00	ug/L		10/4/2018 16:32
Carbon Tetrachloride	< 2.00	ug/L		10/4/2018 16:32
Chlorobenzene	< 2.00	ug/L		10/4/2018 16:32

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier:	MW-3-2018		
Lab Sample ID:	184515-03	**Date Sampled:**	10/1/2018
Matrix:	Groundwater	**Date Received:**	10/2/2018

Chloroethane	< 2.00	ug/L		10/4/2018	16:32
Chloroform	< 2.00	ug/L		10/4/2018	16:32
Chloromethane	< 2.00	ug/L		10/4/2018	16:32
cis-1,2-Dichloroethene	**1.19**	ug/L	J	10/4/2018	16:32
cis-1,3-Dichloropropene	< 2.00	ug/L		10/4/2018	16:32
Cyclohexane	< 10.0	ug/L		10/4/2018	16:32
Dibromochloromethane	< 2.00	ug/L		10/4/2018	16:32
Dichlorodifluoromethane	< 2.00	ug/L		10/4/2018	16:32
Ethylbenzene	< 2.00	ug/L		10/4/2018	16:32
Freon 113	< 2.00	ug/L		10/4/2018	16:32
Isopropylbenzene	< 2.00	ug/L		10/4/2018	16:32
m,p-Xylene	< 2.00	ug/L		10/4/2018	16:32
Methyl acetate	< 2.00	ug/L		10/4/2018	16:32
Methyl tert-butyl Ether	< 2.00	ug/L		10/4/2018	16:32
Methylcyclohexane	< 2.00	ug/L		10/4/2018	16:32
Methylene chloride	< 5.00	ug/L		10/4/2018	16:32
o-Xylene	< 2.00	ug/L		10/4/2018	16:32
Styrene	< 5.00	ug/L		10/4/2018	16:32
Tetrachloroethene	< 2.00	ug/L		10/4/2018	16:32
Toluene	< 2.00	ug/L		10/4/2018	16:32
trans-1,2-Dichloroethene	< 2.00	ug/L		10/4/2018	16:32
trans-1,3-Dichloropropene	< 2.00	ug/L		10/4/2018	16:32
Trichloroethene	< 2.00	ug/L		10/4/2018	16:32
Trichlorofluoromethane	< 2.00	ug/L		10/4/2018	16:32
Vinyl chloride	< 2.00	ug/L		10/4/2018	16:32

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-3-2018
Lab Sample ID: 184515-03 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**102**	80.7 - 121		10/4/2018	16:32
4-Bromofluorobenzene	**98.2**	74.3 - 121		10/4/2018	16:32
Pentafluorobenzene	**94.6**	86.2 - 111		10/4/2018	16:32
Toluene-D8	**95.3**	86.2 - 112		10/4/2018	16:32

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x54775.D

Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier:	MW-4-2018		
Lab Sample ID:	184515-04	**Date Sampled:**	10/1/2018
Matrix:	Groundwater	**Date Received:**	10/2/2018

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		10/4/2018 16:55
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		10/4/2018 16:55
1,1,2-Trichloroethane	< 2.00	ug/L		10/4/2018 16:55
1,1-Dichloroethane	< 2.00	ug/L		10/4/2018 16:55
1,1-Dichloroethene	< 2.00	ug/L		10/4/2018 16:55
1,2,3-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:55
1,2,4-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:55
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		10/4/2018 16:55
1,2-Dibromoethane	< 2.00	ug/L		10/4/2018 16:55
1,2-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:55
1,2-Dichloroethane	< 2.00	ug/L		10/4/2018 16:55
1,2-Dichloropropane	< 2.00	ug/L		10/4/2018 16:55
1,3-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:55
1,4-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:55
1,4-Dioxane	< 20.0	ug/L		10/4/2018 16:55
2-Butanone	< 10.0	ug/L		10/4/2018 16:55
2-Hexanone	< 5.00	ug/L		10/4/2018 16:55
4-Methyl-2-pentanone	< 5.00	ug/L		10/4/2018 16:55
Acetone	< 10.0	ug/L		10/4/2018 16:55
Benzene	< 1.00	ug/L		10/4/2018 16:55
Bromochloromethane	< 5.00	ug/L		10/4/2018 16:55
Bromodichloromethane	< 2.00	ug/L		10/4/2018 16:55
Bromoform	< 5.00	ug/L		10/4/2018 16:55
Bromomethane	< 2.00	ug/L		10/4/2018 16:55
Carbon disulfide	< 2.00	ug/L		10/4/2018 16:55
Carbon Tetrachloride	< 2.00	ug/L		10/4/2018 16:55
Chlorobenzene	< 2.00	ug/L		10/4/2018 16:55

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-4-2018
Lab Sample ID: 184515-04 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Chloroethane	< 2.00	ug/L	10/4/2018	16:55
Chloroform	< 2.00	ug/L	10/4/2018	16:55
Chloromethane	< 2.00	ug/L	10/4/2018	16:55
cis-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	16:55
cis-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	16:55
Cyclohexane	< 10.0	ug/L	10/4/2018	16:55
Dibromochloromethane	< 2.00	ug/L	10/4/2018	16:55
Dichlorodifluoromethane	< 2.00	ug/L	10/4/2018	16:55
Ethylbenzene	< 2.00	ug/L	10/4/2018	16:55
Freon 113	< 2.00	ug/L	10/4/2018	16:55
Isopropylbenzene	< 2.00	ug/L	10/4/2018	16:55
m,p-Xylene	< 2.00	ug/L	10/4/2018	16:55
Methyl acetate	< 2.00	ug/L	10/4/2018	16:55
Methyl tert-butyl Ether	< 2.00	ug/L	10/4/2018	16:55
Methylcyclohexane	< 2.00	ug/L	10/4/2018	16:55
Methylene chloride	< 5.00	ug/L	10/4/2018	16:55
o-Xylene	< 2.00	ug/L	10/4/2018	16:55
Styrene	< 5.00	ug/L	10/4/2018	16:55
Tetrachloroethene	< 2.00	ug/L	10/4/2018	16:55
Toluene	< 2.00	ug/L	10/4/2018	16:55
trans-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	16:55
trans-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	16:55
Trichloroethene	< 2.00	ug/L	10/4/2018	16:55
Trichlorofluoromethane	< 2.00	ug/L	10/4/2018	16:55
Vinyl chloride	< 2.00	ug/L	10/4/2018	16:55

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 184515

Client: **Ravi Engineering & Land Surveying, P.C.**

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-4-2018

Lab Sample ID: 184515-04 **Date Sampled:** 10/1/2018

Matrix: Groundwater **Date Received:** 10/2/2018

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**102**	80.7 - 121		10/4/2018	16:55
4-Bromofluorobenzene	**92.0**	74.3 - 121		10/4/2018	16:55
Pentafluorobenzene	**93.6**	86.2 - 111		10/4/2018	16:55
Toluene-D8	**94.5**	86.2 - 112		10/4/2018	16:55

Method Reference(s): EPA 8260C
EPA 5030C

Data File: x54776.D

Report Prepared Monday, October 8, 2018

Analytical Report Appendix

The reported results relate only to the samples as they have been received by the laboratory.

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All soil/sludge samples have been reported on a dry weight basis, unless qualified "reported as received". Other solids are reported as received.

Low level Volatiles blank reports for soil/solid matrix are based on a nominal 5 gram weight. Sample results and reporting limits are based on actual weight, which may be more or less than 5 grams.

The Chain of Custody provides additional information, including compliance with sample condition requirements upon receipt. Sample condition requirements are defined under the 2003 NELAC Standard, sections 5.5.8.3.1 and 5.5.8.3.2.

NYSDOH ELAP does not certify for all parameters. Paradigm Environmental Services or the indicated subcontracted laboratory does hold certification for all analytes where certification is offered by ELAP unless otherwise specified. Aliquots separated for certain tests, such as TCLP, are indicated on the Chain of Custody and final reports with an "A" suffix.

Data qualifiers are used, when necessary, to provide additional information about the data. This information may be communicated as a flag or as text at the bottom of the report. Please refer to the following list of analyte-specific, frequently used data flags and their meaning:

"<" = Analyzed for but not detected at or above the quantitation limit.
"E" = Result has been estimated, calibration limit exceeded.
"Z" = See case narrative.
"D" = Sample, Laboratory Control Sample, or Matrix Spike Duplicate results above Relative Percent Difference limit.
"M" = Matrix spike recoveries outside QC limits. Matrix bias indicated.
"B" = Method blank contained trace levels of analyte. Refer to included method blank report.
"J" = Result estimated between the quantitation limit and half the quantitation limit.
"L" = Laboratory Control Sample recovery outside accepted QC limits.
"P" = Concentration differs by more than 40% between the primary and secondary analytical columns.
"NC" = Not calculable. Applicable to RPD if sample or duplicate result is non-detect or estimated (see primary report for data flags). Applicable to MS if sample is greater or equal to ten times the spike added. Applicable to sample surrogates or MS if sample dilution is 10x or higher.
"" = Indicates any recoveries outside associated acceptance windows. Surrogate outliers in samples are presumed matrix effects. LCS demonstrates method compliance unless otherwise noted.*
"(1)" = Indicates data from primary column used for QC calculation.
"A" = denotes a parameter for which ELAP does not offer approval as part of their laboratory certification program.
"F" = denotes a parameter for which Paradigm does not carry certification, the results for which should therefore only be used where ELAP certification is not required, such as personal exposure assessment.

GENERAL TERMS AND CONDITIONS
LABORATORY SERVICES

These Terms and Conditions embody the whole agreement of the parties in the absence of a signed and executed contract between the Laboratory (LAB) and Client. They shall supersede all previous communications, representations, or agreements, either verbal or written, between the parties. The LAB specifically rejects all additional, inconsistent, or conflicting terms, whether printed or otherwise set forth in any purchase order or other communication from the Client to the LAB. The invalidity or unenforceability in whole or in part of any provision, term or condition hereof shall not affect in any way the validity or enforceability of the remainder of the Terms and Conditions. No waiver by LAB of any provision, term, or condition hereof or of any breach by or obligation of the Client hereunder shall constitute a waiver of such provision, term, or condition on any other occasion or a waiver of any other breach by or obligation of the Client. This agreement shall be administered and interpreted under the laws of the state which services are procured.

Warranty. Recognizing that the nature of many samples is unknown and that some may contain potentially hazardous components, LAB warrants only that it will perform testing services, obtain findings, and prepare reports in accordance with generally accepted analytical laboratory principles and practices at the time of performance of services. LAB makes no other warranty, express or implied.

Scope and Compensation. LAB agrees to perform the services described in the chain of custody to which these terms and conditions are attached. Unless the parties agree in writing to the contrary, the duties of LAB shall not be construed to exceed the services specifically described. LAB wi use LAB default method for all tests unless specified otherwise on the Work Order.
Payment terms are net 30 days from the date of invoice. All overdue payments are subject to an interest charge of one and one-half percent (1-1/2%) per month or a portion thereof. Client shall also be responsible for costs of collection, including payment of reasonable attorney fees if such expense is incurred. The prices, unless stated, do not include any sale, use or other taxes. Such taxes will be added to invoice prices when required.

Prices. Compensation for services performed will be based on the current Lab Analytical Fee Schedule or on quotations agreed to in writing by the parties. Turnaround time based charges are determined from the time of resolution of all work order questions. Testimony, court appearances or data compilation for legal action will be charged separately. Evaluation and reporting of initial screening runs may incur additional fees.

Limitations of Liability. In the event of any error, omission, or other professional negligence, the sole and exclusive responsibility of LAB shall be to re-perform the deficient work at its own expense and LAB shall have no other liability whatsoever. All claims shall be deemed waived unless made in writing and received by LAB within ninety (90) days following completion of services.
LAB shall have no liability, obligation, or responsibility of any kind for losses, costs, expenses, or other damages (including but not limited to any special, direct, incidental or consequential damages) with respect to LAB's services or results.
All results provided by LAB are strictly for the use of its clients and LAB is in no way responsible for the use of such results by clients or third parties. All reports should be considered in their entirety, and LAB is not responsible for the separation, detachment, or other use of any portion of these reports. Client may not assign the lab report without the written consent of the LAB.
Client covenants and agrees, at its/his/her sole expense, to indemnify, protect, defend, and save harmless the LAB from and against any and all damages, losses, liabilities, obligations, penalties, claims, litigation, demands, defenses, judgments, suits, actions, proceedings, costs, disbursements and/or expenses (including, without limitation attorneys' and experts' fees and disbursements) of any kind whatsoever which may at any time be imposed upon, incurred by or asserted or awarded against client relating to, resulting from or arising out of (a) the breach of this agreement by this client, (b) the negligence of the client in handling, delivering or disclosing any hazardous substance, (c) the violation of the Client of any applicable law, (d) non-compliance by the Client with any environmental permit or (e) a material misrepresentation in disclosing the materials to be tested.

Hazard Disclosure. Client represents and warrants that any sample delivered to LAB will be preceded or accompanied by complete written disclosure of the presence of any hazardous substances known or suspected by Client. Client further warrants that any sample containing any hazardous substance that is to be delivered to LAB will be packaged, labeled, transported, and delivered properly and in accordance with applicable laws.

Sample Handling. Prior to LAB's acceptance of any sample (or after any revocation of acceptance), the entire risk of loss or of damage to such sample remains with Client. Samples are accepted when receipt is acknowledged on chain of custody documentation. In no event will LAB have any responsibility for the action or inaction of any carrier shipping or delivering any sample to or from LAB premises.
Client authorizes LAB to proceed with the analysis of samples as received by the laboratory, recognizing that any samples not in compliance with all current DOH-ELAP-NELAP requirements for containers, preservation or holding time will be noted as such on the final report.
Disposal of hazardous waste samples is the responsibility of the Client. If the Client does not wish such samples returned, LAB may add storage and disposal fees to the final invoice. Maximum storage time for samples is 30 days after completion of analysis unless modified by applicable state or federal laws. Client will be required to give the LAB written instructions concerning disposal of these samples.
LAB reserves the absolute right, exercisable at any time, to refuse to receive delivery of, refuse to accept, or revoke acceptance of any sample, which, in the sole judgment of LAB (a) is of unsuitable volume, (b) may be or become unsuitable for or may pose a risk in handling, transport, or processing for any health, safety, environmental or other reason whether or not due to the presence in the sample of any hazardous substance, and whether or not such presence has been disclosed to LAB by Client or (c) if the condition or sample date make the sample unsuitable for analysis.

Legal Responsibility. LAB is solely responsible for performance of this contract, and no affiliated company, director, officer, employee, or agent shall have any legal responsibility hereunder, whether in contract or tort including negligence.

Assignment. LAB may assign its performance obligations under this contract to other parties, as it deems necessary. LAB shall disclose to Client any assignee (subcontractor) by ELAP ID # on the submitted final report.

Force Majeure. LAB shall have no responsibility or liability to the Client for any failure or delay in performance by LAB, which results in whole or in part from any cause or circumstance beyond the reasonable control of LAB. Such causes and circumstances shall include, but not limited to, acts of God, acts or orders of any government authority, strikes or other labor disputes, natural disasters, accidents, wars, civil disturbances, difficulties or delays in transportation, mail or delivery services, inability to obtain sufficient services or supplies from LAB's usual suppliers, or any other cause beyond LAB's reasonable control.

Law. This contract shall be continued under the laws of the State of New York without regard to its conflicts of laws provision.

179 Lake Avenue, Rochester, NY 14608 Office (585) 647-2530 Fax (585) 647-3311

CHAIN OF CUSTODY

PARADIGM ENVIRONMENTAL SERVICES, INC.

REPORT TO:		INVOICE TO:		
CLIENT:	RAVI	CLIENT:	SAME	LAB PROJECT ID: 184515
ADDRESS:		ADDRESS:		
CITY: STATE: ZIP		CITY: STATE: ZIP:		Quotation #:
PHONE:	585-645-5295	PHONE:		Email: WmcAlpin@ravieng.com pmorton@ravieng.com
ATTN:	Pete Morton	ATTN:		

PROJECT REFERENCE
3130 Monroe Ave
45-17-008

Matrix Codes:
AQ - Aqueous Liquid; NQ - Non-Aqueous Liquid; WA - Water; WG - Groundwater; DW - Drinking Water; WW - Wastewater; SO - Soil; SL - Sludge; SD - Solid; PT - Paint; WP - Wipe; CK - Caulk; OL - Oil; AR - Air

REQUESTED ANALYSIS

DATE COLLECTED	TIME COLLECTED	COMPOSITE	GRAB	SAMPLE IDENTIFIER	MATRIX CODES	NUMBER OF CONTAINERS	TCL VOA	REMARKS	PARADIGM LAB SAMPLE NUMBER
10/1/18	12:45		X	HCA-MW-2-2018	WG	2			01
	13:40			MW-2-2018					02
	1505			MW-3-2018					03
	1610			MW-4-2018					04

13°C iced started in field
10/1/18 1725 Molly Vail
custody seals N/A client delivered

Turnaround Time		Report Supplements			
Availability contingent upon lab approval; additional fees may apply.					
Standard 5 day	X	None Required		None Required	
10 day		Batch QC		Basic EDD	
Rush 3 day		Category A		NYSDEC EDD	X
Rush 2 day		Category B	X		
Rush 1 day					
Other		Other		Other EDD	
please indicate date needed:		please indicate package needed:		please indicate EDD needed :	

Lynn Zecara	10/1/18		Total Cost:
Sampled By	Date/Time		
Lynn Zecara	10/1/18	17:23	
Relinquished By	Date/Time		
Molly Vail	10/1/18	1723	P.I.F.
Received By	Date/Time		
[signature]	10/2/18	10:01	
Received @ Lab By	Date/Time		

By signing this form, client agrees to Paradigm Terms and Conditions (reverse).

See additional page for sample conditions.

Chain of Custody Supplement

Client: Ravi **Completed by:** Glenn Pezzulo

Lab Project ID: 184515 **Date:** 10/2/18

Sample Condition Requirements

Per NELAC/ELAP 210/241/242/243/244

Condition	*NELAC compliance with the sample condition requirements upon receipt* Yes	No	N/A
Container Type	X		
Comments			
Transferred to method-compliant container			X
Headspace (<1 mL)	X		
Comments			
Preservation	X		
Comments			
Chlorine Absent (<0.10 ppm per test strip)			X
Comments			
Holding Time	X		
Comments			
Temperature	X		
Comments	13 °C iced started in field 10/1/18 17:25		
Sufficient Sample Quantity	X		
Comments			

RAVI ENGINEERING & LAND SURVEYING, P.C.

Appendix D
Low Flow Sampling Data Logs

LOW-FLOW SAMPLING DATA LOG

RAVI ENGINEERING & LAND SURVEYING, P.C.

Site Location: Speedy's Cleaner's 3130 Monroe Avenue	Well ID: HLA-MW-2
Client: Christopher Williams Agency	START Depth to Water: 6.8 ft bgs
Project Number: 45-15-042 P	Depth to Bottom: 13 ft bgs
Date of Sampling: 3-2-17	Well Information: 1"Diameter PVC
Field Personnel: LZ, AH	Weather Conditions: Sunny, 25° F
PURGING METHOD: Peristaltic pump, low flow	Pump Intake Depth: 12.01 ft bgs

Time Elapsed (Min)	pH (± 0.1 unit)		SPECIFIC CONDUCTIVITY (mS/cm) (3%)		Redox Potential (mV)(± 10 mV)		DISSOLVED OXYGEN (MG/L) (10%)		TURBIDITY (NTU) (10%>5)		TEMPERATURE (degrees C) (3%)		FLOW RATE (ml/min)
	READING	CHANGE	READING	CHANGE	READING	CHANGE	READING	CHANGE %	READING	CHANGE %	READING	CHANGE	
0	5.85		0.001		69		18.59		18.4		7.46		
5	5.87	-0.02	0.001	0	89	-20	16.62	10.6	18.8	-2.174	7.62	-2.145	
10	5.9	-0.03	0.001	0	98	-9	15.82	4.8	18.5	1.596	7.83	-2.756	
15	5.96	-0.06	0.001	0	99	-1	15.42	2.5	18.9	-2.162	8.01	-2.299	
20	5.96	0	0.001	0	97	2	15.21	1.4	18	4.762	8.1	-1.124	
25													
30													
35													
40													
45													
50													
55													
60													
65													
70													
75													
80													
85													
90													
95													
100													
105													

LOW-FLOW SAMPLING DATA LOG

RAVI ENGINEERING & LAND SURVEYING, P.C.

Site Location: Speedy's Cleaner's 3130 Monroe Avenue	Well ID: MW-2
Client: Christopher Williams Agency	START Depth to Water: 13 ft bgs
Project Number: 45-15-042 P	Depth to Bottom: 15 ft bgs
Date of Sampling: 3-2-17	Well Information: 2"PVC
Field Personnel: LZ, AH	Weather Conditions: Sunny, 25° F
PURGING METHOD: Peristaltic pump, low flow	Pump Intake Depth: 15 ft bgs

Time Elapsed (Min)	pH (± 0.1 unit)		SPECIFIC CONDUCTIVITY (mS/cm) (3%)		Redox Potential (mV)(± 10 mV)		DISSOLVED OXYGEN (MG/L) (10%)		TURBIDITY (NTU) (10%>5)		TEMPERATURE (degrees C) (3%)		FLOW RATE (ml/min)
	READING	CHANGE	READING	% CHANGE	READING	CHANGE	READING	% CHANGE	READING	% CHANGE	READING	% CHANGE	
0	6.83		2.06		-92		6.52		127		8.37		
5	6.84	-0.01	2.06	0	-100	8	6.01	7.82209	115	9.449	8.5	-1.553	
10	6.83	0.01	2.03	1.456	-95	-5	6.18	-2.8286	41	64.35	8.59	-1.059	
15	6.82	0.01	2.00	1.478	-98	3	5.58	9.70874	22.3	45.61	9.28	-8.033	
20	6.82	0	2.00	0	-101	3	5.37	3.76344	19.2	13.9	9.52	-2.586	
25	6.82	0	2.00	0	-103	2	5.09	5.21415	21.3	-10.94	9.53	-0.105	
30													
35	Well ran dry. Sample was collected when the well had sufficiently recharged.												
40													
45													
50													
55													
60													
65													
70													
75													
80													
85													
90													
95													
100													
105													

LOW-FLOW SAMPLING DATA LOG

RAVI ENGINEERING & LAND SURVEYING, P.C.

Site Location: Speedy's Cleaner's 3130 Monroe Avenue	Well ID: MW-3
Client: Christopher Williams Agency	START Depth to Water: 10.7 ft bgs
Project Number: 45-15-042 P	Depth to Bottom: 15 ft bgs
Date of Sampling: 3-2-17	Well Information: 2" PVC
Field Personnel: LZ, AH	Weather Conditions: Sunny, 25° F
PURGING METHOD: Peristaltic pump, low flow	Pump Intake Depth: 14 ft bgs

Time Elapsed (Min)	pH (± 0.1 unit)		SPECIFIC CONDUCTIVITY (mS/cm) (3%)		Redox Potential (mV)(± 10 mV)		DISSOLVED OXYGEN (MG/L) (10%)		TURBIDITY (NTU) (10%>5)		TEMPERATURE (degrees C) (3%)		FLOW RATE (ml/min)
	READING	CHANGE	READING	% CHANGE	READING	CHANGE	READING	% CHANGE	READING	% CHANGE	READING	% CHANGE	
0	6.89		0.875		84		14.63		20.4		9.83		
5	6.85	-0.04	0.882	-0.8	100	-16	12.37	15.45	16.2	20.59	9.8	0.305	
10	6.82	-0.03	0.889	-0.794	102	-2	10.82	12.53	12.6	22.22	9.76	0.408	
15	6.8	-0.02	0.896	-0.787	102	0	10.02	7.394	11.7	7.143	9.81	-0.512	
20	6.81	0.01	0.907	-1.228	101	1	8.94	10.78	11.2	4.274	9.86	-0.51	
25	6.81	0	0.921	-1.544	98	3	8.08	9.62	10.2	8.929	10.02	-1.623	
30	6.82	0.01	0.937	-1.737	95	3	7.31	9.53	10.1	0.98	9.96	0.599	
35	6.83	0.01	0.941	-0.427	89	6	7.07	3.283	9.8	2.97	10.01	-0.502	

LOW-FLOW SAMPLING DATA LOG

RAVI ENGINEERING & LAND SURVEYING, P.C.

Site Location: Speedy's Cleaner's 3130 Monroe Avenue	Well ID: MW-4
Client: Christopher Williams Agency	START Depth to Water: 8.65 ft bgs
Project Number: 45-15-042 P	Depth to Bottom: 15 ft bgs
Date of Sampling: 3-2-17	Well Information: 2" PVC
Field Personnel: LZ, AH	Weather Conditions: Sunny, 25° F
PURGING METHOD: Peristaltic pump, low flow	Pump Intake Depth: 14 ft bgs

Time Elapsed (Min)	pH (± 0.1 unit)		SPECIFIC CONDUCTIVITY (mS/cm) (3%)		Redox Potential (mV)(± 10 mV)		DISSOLVED OXYGEN (MG/L) (10%)		TURBIDITY (NTU) (10%>5)		TEMPERATURE (degrees C) (3%)		FLOW RATE (ml/min)
	READING	CHANGE	READING	CHANGE	READING	CHANGE	READING	% CHANGE	READING	% CHANGE	READING	% CHANGE	
0	6.46		0.001		104		16.45		23.8		8.33		
5	6.4	0.06	0.001	0	85	19	16.11	2.067	23.8	0	8.17	1.921	
10	6.35	0.05	0.001	0	66	19	16.05	0.372	23.6	0.84	8.03	1.714	
15	6.27	0.08	0.001	0	55	11	15.91	0.872	22.1	6.356	7.91	1.494	
20	6.31	-0.04	0.001	0	36	19	15.56	2.2	22.4	-1.357	7.78	1.643	
25	6.34	-0.03	0.001	0	27	9	15.48	0.514	21.5	4.018	7.62	2.057	
30	6.2	0.14	0.001	0	37	-10	15.4	0.517	21	2.326	7.56	0.787	
35	6.12	0.08	0.001	0	28	9	15.28	0.779	21.5	-2.381	7.43	1.72	
40													
45													
50													
55													
60													
65													
70													
75													
80													
85													
90													
95													
100													
105													

LOW-FLOW SAMPLING DATA LOG

RAVI ENGINEERING & LAND SURVEYING, P.C.

Site Location: Speedy's Cleaner's 3130 Monroe Avenue	Well ID: HLA-MW-2-2018
Client: Christopher Williams Agency	START Depth to Water: 7.21ft bgs/ End depth 7.19
Project Number: 45-15-042 P	Depth to Bottom: 13 ft bgs
Date of Sampling: 10/1/18	Well Information: 1"Diameter PVC
Field Personnel: LZ, WM	Weather Conditions: 51F, Cloudy
PURGING METHOD: Peristaltic pump, low flow	Pump Intake Depth: 10.5 ft bgs

Time Elapsed (Min)	pH (± 0.1 unit)		SPECIFIC CONDUCTIVITY (mS/cm) (3%)		Redox Potential (mV)(± 10 mV)		DISSOLVED OXYGEN (MG/L) (10%)		TURBIDITY (NTU) (10%>5)		TEMPERATURE (degrees C) (3%)		FLOW RATE (ml/min)
	READING	CHANGE	READING	CHANGE	READING	CHANGE	READING	CHANGE %	READING	CHANGE %	READING	CHANGE	
0	7.59		0.002		-115		10.61		185		16.71		
5	6.59	1	0.001	50	-78	-37	9.88	6.9	214	-15.676	16.71	0	
10	6.6	-0.01	0.001	0	-73	-5	9.56	3.2	218	-1.8692	16.61	0.59844	
15	6.88	-0.28	0	100	-75	2	9.45	1.2	218	0	16.51	0.60205	
20	6.89	-0.01	0.002	#DIV/0!	-72	-3	9.28	1.8	215	1.37615	16.42	0.54512	
25	6.92	-0.03	0.002	0	-68	-4	9.06	2.4	211	1.86047	16.38	0.24361	
30	6.9	0.02	0.005	-150	-63	-5	8.85	2.3	203	3.79147	16.37	0.06105	
35	6.89	0.01	0.001	80	-58	-5	8.67	2.0	202	0.49261	16.34	0.18326	
40	6.85	0.04	0.005	-400	-51	-7	8.56	1.3	203	-0.495	16.28	0.3672	
45	6.92	-0.07	0.003	40	-53	2	8.5	0.7	204	-0.4926	16.19	0.55283	
50	6.94	-0.02	0.002	33.3333	-52	-1	8.27	2.7	204	0	16.13	0.3706	
55	6.93	0.01	0.004	-100	-50	-2	8.24	0.4	203	0.4902	16.05	0.49597	
60	7.14	-0.21	0.002	50	-57	7	8.18	0.7	204	-0.4926	15.97	0.49844	
65	7.17	-0.03	0.003	-50	-55	-2	8.13	0.6	203	0.4902	15.9	0.43832	
70	7.36	-0.19	0.002	33.3333	-67	12	8.1	0.4	205	-0.9852	15.81	0.56604	
75	7.22	0.14	0.003	-50	-59	-8	7.91	2.3	203	0.97561	15.8	0.06325	
80	7.09	0.13	0.004	-33.333	-53	-6	7.7	2.7	203	0	15.74	0.37975	
85	7.07	0.02	0.002	50	-51	-2	7.64	0.8	195	3.94089	15.68	0.38119	
90	7.07	0	0.001	50	-48	-3	7.59	0.7	197	-1.0256	15.59	0.57398	
95	7.04	0.03	0.001	0	-38	-10	7.6	-0.1	199	-1.0152	15.46	0.83387	
100	6.71	0.33	0.000	100	-30	-8	7.62	-0.3	199	0	15.26	1.29366	
105	6.76	-0.05	0.000	#DIV/0!	-27	-3	7.68	-0.8	205	-3.0151	14.99	1.76933	
110	6.78	-0.02	0.000	#DIV/0!	-25	-2	7.71	-0.4	209	-1.9512	14.81	1.2008	
115	7.05	-0.27	0.003	#DIV/0!	-39	14	7.84	-1.7	211	-0.9569	14.62	1.28292	
120	7.03	0.02	0.000	96.6667	-44	5	7.58	3.3	204	3.31754	14.78	-1.0944	

LOW-FLOW SAMPLING DATA LO

RAVI ENGINEERING & LAND SURVEYING, P.C.

Site Location: Speedy's Cleaner's 3130 Monroe Avenue	Well ID: MW-2-2018
Client: Christopher Williams Agency	START Depth to Water: 13.51 ft bgs
Project Number: 45-15-042 P	Depth to Bottom: 14.89 ft bgs
Date of Sampling: 9/28/18	Well Information: 2"PVC
Field Personnel: LZ, WM	Weather Conditions: 51 F, Cloudy
PURGING METHOD: Peristaltic pump, low flow	Pump Intake Depth: 14.5 ft. bgs

Time Elapsed (Min)	pH (± 0.1 unit)		SPECIFIC CONDUCTIVITY (mS/cm) (3%)		Redox Potential (mV)(± 10 mV)		DISSOLVED OXYGEN (MG/L) (10%)		TURBIDITY (NTU) (10%>5)		TEMPERATURE (degrees C) (3%)		FLOW RATE (ml/min)
	READING	CHANGE	READING	% CHANGE	READING	CHANGE	READING	% CHANGE	READING	% CHANGE	READING	% CHANGE	
0	7.3		0.008		-108		8.58		206		14.4		
5	7.3	0	0.008	0	-108	0	8.58	0.0	206	0	14.4	0	
10	7.2	0.1	0	100	-132	24	8.46	1.4	213	-3.3981	14.22	1.25	
15	7.27	-0.07	0.001	#DIV/0!	-123	-9	8.26	2.4	213	0	14.18	0.28129	
20	7.17	0.1	0.001	0	-110	-13	6.61	20.0	214	-0.4695	14.12	0.42313	
25	7.09	0.08	0	100	-104	-6	5.03	23.9	215	-0.4673	14.07	0.35411	

LOW-FLOW SAMPLING DATA LOG

RAVI ENGINEERING & LAND SURVEYING, P.C.

Site Location: Speedy's Cleaner's 3130 Monroe Avenue	Well ID: MW-3-2018
Client: Christopher Williams Agency	START Depth to Water: 10.7 ft bgs
Project Number: 45-15-042 P	Depth to Bottom: 15 ft bgs
Date of Sampling: 9/28/18	Well Information: 2" PVC
Field Personnel: LZ, WM	Weather Conditions: 51 F, Cloudy
PURGING METHOD: Peristaltic pump, low flow	Pump Intake Depth: 14 ft bgs

Time Elapsed (Min)	pH (± 0.1 unit)		SPECIFIC CONDUCTIVITY (mS/cm) (3%)		Redox Potential (mV)(± 10 mV)		DISSOLVED OXYGEN (MG/L) (10%)		TURBIDITY (NTU) (10%>5)		TEMPERATURE (degrees C) (3%)		FLOW RATE (ml/min)
	READING	CHANGE	READING	% CHANGE	READING	CHANGE	READING	% CHANGE	READING	% CHANGE	READING	% CHANGE	
0	7.57		0.001		-115		7.50		220		13.97		
5	7.46	0.11	0.001	0	-111	-4	7.37	1.7	219	0.45455	14.09	-0.859	
10	7.30	0.16	0.000	100	-87	-24	7.21	2.2	216	1.36986	14.34	-1.7743	
15	7.18	0.12	0.000	#DIV/0!	-88	1	7.18	0.4	214	0.92593	14.44	-0.6974	
20	7.28	-0.1	0.000	#DIV/0!	-105	17	7.15	0.4	213	0.46729	14.49	-0.3463	
25	7.28	0	0.000	#DIV/0!	-120	15	7.16	-0.1	212	0.46948	14.53	-0.2761	
30	7.28	0	0.000	#DIV/0!	-121	1	7.15	0.1	212	0	14.53	0	
35	7.28	0	0.000	#DIV/0!	-128	7	7.10	0.7	212	0	14.53	0	
40	7.28	0	0.000	#DIV/0!	-127	-1	7.01	1.3	212	0	14.53	0	

LOW-FLOW SAMPLING DATA LOG

RAVI ENGINEERING & LAND SURVEYING, P.C.

Site Location: Speedy's Cleaner's 3130 Monroe Avenue	Well ID: MW-4-2018
Client: Christopher Williams Agency	START Depth to Water: 8.65 ft bgs
Project Number: 45-15-042 P	Depth to Bottom: 15 ft bgs
Date of Sampling: 9/28/18	Well Information: 2" PVC
Field Personnel: LZ, WM	Weather Conditions: 53F, Cloudy
PURGING METHOD: Peristaltic pump, low flow	Pump Intake Depth: 14 ft bgs

Time Elapsed (Min)	pH (± 0.1 unit)		SPECIFIC CONDUCTIVITY (mS/cm) (3%)		Redox Potential (mV)(± 10 mV)		DISSOLVED OXYGEN (MG/L) (10%)		TURBIDITY (NTU) (10%>5)		TEMPERATURE (degrees C) (3%)		FLOW RATE (ml/min)
	READING	CHANGE	READING	CHANGE	READING	CHANGE	READING	% CHANGE	READING	% CHANGE	READING	% CHANGE	
0	6.85		0.001		-130		8.37		217		14.12		
5	6.91	-0.06	0.001	0	-126	-4	7.89	5.7	215	0.92166	14.39	-1.9122	
10	6.83	0.08	0.001	0	-107	-19	7.64	3.2	212	1.39535	14.65	-1.8068	
15	6.78	0.05	0.002	-100	-104	-3	7.46	2.4	209	1.41509	14.9	-1.7065	
20	6.78	0	0.002	0	-108	4	7.3	2.1	207	0.95694	15.07	-1.1409	
25	6.78	0	0.002	0	-110	2	7.21	1.2	203	1.93237	15.13	-0.3981	
30	6.83	-0.05	0.002	0	-114	4	7.12	1.2	201	0.98522	15.17	-0.2644	

RAVI ENGINEERING & LAND SURVEYING, P.C.

Appendix E
Data Usability Summary Reports

DATA USABILITY SUMMARY REPORT (DUSR)

3130 Monroe Ave.
Rochester, NY
NYSDEC BCP # C 828109

SDG: C1703065

3 Air Samples

Prepared for:

Ravi Engineering & Land Surveying, P.C.
2110 South Clinton Avenue, Suite 1
Rochester, NY 14618

May 2017

EDU Environmental Data Usability 10028 Deer Park Dr. Dansville, NY 14437 585.991.9156

Table of Contents

Tables

REVIEWER'S NARRATIVE
SDG C1703065

The data associated with this Sample Delivery Group (SDG) C1703065, analyzed by Centek Laboratories, LLC Syracuse, NY have been reviewed in accordance with assessment criteria provided by the New York State Department of Environmental Conservation following the review procedures provided in the USEPA Functional Guidelines for evaluating organic and inorganic data.

All analytical results reported by the laboratory are considered valid and acceptable except results that have been qualified as rejected, "R". Results qualified as estimated "J", or as non-detects, "U", are considered usable for the purpose of evaluating water and/or soil quality. However, these qualifiers indicate that the accuracy and/or precision of the analytical result is questionable. A summary of all data that have been qualified and the reasons for qualification are provided in the following data usability summary report (DUSR).

Two facts should be noted by all data users. First, the "R" qualifier means that the associated value is unusable. In other words, due to significant quality control (QC) problems, the analysis is invalid and provides no information as to whether the analyte is present or not. Values qualified with an "R" should not appear on the final data tables because they cannot be relied upon, even as the last resort. Second, no analyte concentration, even if it has passed all QC tests, is guaranteed to be accurate. Strict QC serves to increase confidence in data, but any value potentially contains error.

Reviewer's Signature: Michael K. Perry Date: 5/10/17

Michael K. Perry
Chemist

1.0 SUMMARY

SITE:	3130 Monroe Avenue Rochester, NY
SAMPLING DATE:	March 21, 2017
SAMPLE TYPE:	3 air samples
LABORATORY:	Centek Laboratories, LLC Syracuse, NY
SDG No.:	C1703065

2.0 INTRODUCTION

This data usability summary report (DUSR) was prepared in accordance with guidance provided by the New York State Department of Environmental Conservation (NYSDEC). The DUSR is based on a review and evaluation of the laboratory analytical data package. Specifically, the NYSDEC guidance recommends review and evaluation of the following elements of the data package:

- Completeness of the data package as defined under the requirements of the NYSDEC Analytical Services Protocols (ASP) Category B or the United States Environmental Protection Agency (USEPA) Contract Laboratory Program (CLP) deliverables,
- Compliance with established analyte holding times,
- Adherence to quality control (QC) limits and specifications for blanks, instrument tuning and calibration, surrogate recoveries, spike recoveries, laboratory duplicate analyses, and other QC criteria,
- Adherence to established analytical protocols,
- Conformance of data summary sheets with raw analytical data, and
- Use of correct data qualifiers.

Data deficiencies, analytical protocol deviations, and quality control problems identified using the review criteria above and their effect on the analytical results are discussed in this report.

3.0 SAMPLE AND ANALYSIS SUMMARY

The data package consists of analytical results for 3 air samples collected on March 21, 2017. These samples were analyzed for TO-15 volatile organic compounds.

All laboratory analyses were performed by Centek Laboratories, LLC, Syracuse, NY and analyzed as SDG C1703065. The analytical results were provided in NYSDEC ASP Category B format, which includes all raw analytical data and laboratory QC data.

4.0 GUIDANCE DOCUMENTS AND DATA REVIEW CRITERIA

The guidance documents used for reviewing laboratory quality control (QC) data and assigning data qualifiers (flags) to analytical results are listed in Table 4-1. The QC limits established in the documents applicable to this data review were used to assess the quality of the analytical results. In some cases, however, QC limits established internally by the laboratory were taken into account to determine data quality.

The QC criteria considered for assessing the usability of the reported analytical results provided for each analyte type (i.e. VOCs, SVOCs, metals, etc.) are listed in Table 4-2. These criteria may vary with the analytical method utilized by the laboratory. These criteria comply with the guidance recommended in Section 2.0 above.

5.0 DATA VALIDATION QUALIFIERS

The letter qualifiers (flags) used to define data usability are described briefly below. These letters are assigned by the data validator to analytical results having questionable accuracy and/or precision as determined by reviewing the laboratory QC data associated with the analytical results.

TABLE 4-1

DATA VALIDATION GUIDANCE DOCUMENTS

Analyte Type	Validation Guidance
VOCs	USEPA, 2008, Validating Volatile Organic Compounds By Gas Chromatography/Mass Spectrometry; SW-846 Method 8260B; SOP # HW-24, Rev. 2. USEPA, 2008, Statement of Work for Organic Analysis of Low/Medium Concentration of Volatile Organic Compounds SOM01.2; SOP HW-33, Rev. 2.
SVOCs	USEPA, 2007, Statement of Work for Organic Analysis of Low/Medium Concentration of Semivolatile Organic Compounds SOM01.2; SOP HW-35, Rev. 1.
Pesticides/PCBs	USEPA, 2006, CLP Organics Data Review and Preliminary Review (CLP/SOW OLMO 4.3); SOP # HW-6, Rev. 14, Part C.
Metals	USEPA, 2006, Validation of Metals for the Contract Laboratory Program (CLP) based on SOW ILMO 5.3 (SOP Revision 13), SOP # HW-2, Rev. 13.
Gen Chemistry	NYSDEC, 2005, Analytical Services Protocols (ASP)
VOCs (Ambient air)	USEPA, 2006, Validating Air Samples, Volatile Organic Analysis of Ambient Air in Canister by Method TO-15; SOP # HW-31, Rev. 4.

TABLE 4-2

QUALITY CONTROL CRITERIA USED FOR VALIDATING LABORATORY ANALYTICAL DATA

VOCs	SVOCs	Pesticides/PCBs	Metals	Gen Chemistry	Method TO-15
Completeness of Pkg Sample Condition Holding Time System Monitoring Compounds Lab Control Sample Matrix Spikes Blanks Instrument Tuning Internal Standards Initial Calibration Continuing Calibration Lab Qualifiers Field Duplicate	Completeness of Pkg Sample Condition Holding Time Surrogate Recoveries Lab Control Sample Matrix Spikes Blanks Instrument Tuning Internal Standards Initial Calibration Continuing Calibration Lab Qualifiers Field Duplicate	Completeness of Pkg Sample Condition Holding Time Surrogate Recoveries Matrix Spikes Blanks Instrument Calibration & Verification Analyte ID Lab Qualifiers Field Duplicate	Completeness of Pkg Sample Condition Holding Time Initial/Continuing Calibration CRDL Standards Blanks Interference Check Sample Spike Recoveries Lab Duplicate Lab Control Sample ICP Serial Dilutions Lab Qualifiers Field Duplicate	Completeness of Pkg Sample Condition Holding Times Calibration Lab Control Samples Blanks Spike Recoveries Lab Duplicates	Completeness of Pkg Sample Condition Holding Time Canister Certification Lab Control Sample Instrument Tuning Blanks Initial Calibration & System Performance Daily Calibration Field Duplicate

The laboratory may also use various letters and symbols to flag analytical results generated when QC limits were exceeded. The meanings of these flags may differ from those used by the independent data validator. Those used by the laboratory are provided with the analytical results.

NOTE: The assignment of data qualifiers by the data reviewer (validator) to laboratory analytical results should not necessarily be interpreted by the data user as a measure of laboratory ability or proficiency. Rather, the qualifiers are intended to provide a measure of data accuracy and precision to the data user, which, for example, may provide a level of confidence in determining whether or not standards or cleanup objectives have been met.

U The analyte was analyzed for but was not detected at or above the sample quantitation limit.

J The analyte was positively identified; the associated numerical value is the *approximate* concentration of the analyte in the sample. (The magnitude of any ± value associated with the result is not determined by data validation).

UJ The analyte was not detected above the reported sample quantitation limit. However, the reported quantitation limit is *approximate* and may or may not represent the actual limit of quantitation necessary to accurately and precisely measure the analyte in the sample.

R The sample result is rejected (i.e., is unusable) due to serious deficiencies in the ability to analyze the sample and meet quality control criteria. The presence or absence of the analyte cannot be verified.

N The analysis indicates the presence of an analyte for which there is presumptive evidence to make a "tentative identification".

JN The analyte is considered to be "presumptively present." The associated numerical value represents its *approximate* concentration.

The validated analytical results are attached to this report. Validation qualifiers (flags) are indicated using red ink. Data sheets having qualified data are signed and dated by the data reviewer.

6.0 RESULTS OF THE DATA REVIEW

The results of the data review are summarized in Table 6-1. The table lists the samples where QC criteria were found to exceed acceptable limits and the actions taken to qualify the associated analytical results.

7.0 TOTAL USABLE DATA

For SDG C1703065, three samples were analyzed and results were reported for 192 analyses. Even though some results were flagged with a "J" as estimated, all results (100%) are considered usable. See the summary table for the flagged analytes and the associated QC reasons.

Table 6-1 TO-15

SAMPLES AFFECTED	ANALYTES	ACTION	QC VIOLATION	COMMENTS
All undiluted samples	Bromomethane Freon 11 Methyl butyl ketone Vinyl Bromide	J detects	LCS >130 %	Detected results are estimated
All undiluted samples	Isopropyl Alcohol	J detects/UJ non-detects	CCV > 30 %	Results are estimated

ACRONYMS

BSP	Blank Spike
CCAL	Continuing Calibration
CCB	Continuing Calibration Blank
CCV	Continuing Calibration Verification
CRDL	Contract Required Detection Limit
CRQL	Contract Required Quantitation Limit
%D	Percent Difference
ICAL	Initial Calibration
ICB	Initial Calibration Blank
IS	Internal Standard
LCS	Laboratory Control Sample
MS/MSD	Matrix Spike/Matrix Spike Duplicate
QA	Quality Assurance
QC	Quality Control
%R	Percent recovery
RPD	Relative Percent Difference
RRF	Relative Response Factor
%RSD	Percent Relative Standard Deviation
TAL	Target Analyte List (metals)
TCL	Target Compound List (organics)

Appendix A

Validated Analytical Results

CENTEK LABORATORIES, LLC
143 Midler Park Drive * Syracuse, NY 13206
Phone (315) 431-9730 * Emergency 24/7 (315) 416-2752
NYSDOH ELAP Certificate No. 11830

Analytical Report

Lynn Zicari
Ravi Engineering & Land Surveying, P.C.
2110 South Clinton Avenue, Suite 1
Rochester, NY 14618

TEL: (585) 223-3660
FAX
RE: 3130 Monroe

Tuesday, March 28, 2017
Order No.: C1703065

Dear Lynn Zicari:

Centek Laboratories, LLC received 3 sample(s) on 3/23/2017 for the analyses presented in the following report.

I certify that this data package is in compliance with the terms and conditions of the Contract, both technically and for completeness. Release of the data contained in this hardcopy data package and/or in the computer readable data submitted has been authorized by the Laboratory Manager or his designee, as verified by the following signature.

All method blanks, laboratory spikes, and/or matrix spikes met quality assurance objective except as indicated in the case narrative. All samples were received and analyzed within the EPA recommended holding times. Test results are not Method Blank (MB) corrected for contamination.

Centek Laboratories is distinctively qualified to meet your needs for precise and timely volatile organic compound analysis. We perform all analyses according to EPA, NIOSH or OSHA-approved analytical methods. Centek Laboratories is dedicated to providing quality analyses and exceptional customer service. Samples were analyzed using the methods outlined in the following references:

Compendium of Methods for the Determination of Toxic Organic Compounds, Compendium Method TO-15, January 1999.

Centek Laboratories SOP TS-80

Analytical results relate to samples as received at laboratory. We do our best to make our reporting format clear and understandable and hope you are thoroughly satisfied with our services.

Please contact your client service representative at (315) 431-9730 or myself, if you would like any additional information regarding this report.

Sincerely,

William Dobbin
Lead Technical Director

Disclaimer: The test results and procedures utilized, and laboratory interpretations of the data obtained by Centek as contained in this report are believed by Centek to be accurate and reliable for sample(s) tested. In accepting this report, the customer agrees that the full extent of any and all liability for actual and consequential damages of Centek for the services performed shall be equal to the fee charged to the customer for the services as liquidated damages. ELAP does not offer certification for the following parameters by this method at present time, they are: 4-ethyltoluene, ethyl acetate, propylene, tetrahydrofuran, 4-PCH, sulfur derived and silcon series compounds.

Centek Laboratories, LLC Terms and Conditions

Sample Submission

All samples sent to Centek Laboratories should be accompanied by our Request for Analysis Form or Chain of Custody Form. A Chain of Custody will be provided with each order shipped for all sampling events, or if needed, one is available at our website www.CentekLabs.com. Samples received after 3:00pm are considered to be a part of the next day's business.

Sample Media

Samples can be collected in an canister or a Tedlar bag. Depending on your analytical needs, Centek Laboratories may receive a bulk, liquid, soil or other matrix sample for headspace analysis.

Blanks

Every sample is run with a surrogate or tracer compound at a pre-established concentration. The surrogate compound run with each sample is used as a standard to measure the performance of each run of the instrument. If required, a Minican can be provided containing nitrogen to be run as a trip blank with your samples.

Sampling Equipment

Centek Laboratories will be happy to provide the canisters to carry-out your sampling event at no charge. The necessary accessories, such as regulators, tubing or personal sampling belts, are also provided to meet your sampling needs. The customer is responsible for all shipping charges to the client's destination and return shipping to the laboratory. Client assumes all responsibility for lost, stolen and any dameges of equipment.

Turn Around time (TAT)

Centek Laboratories will provide results to its clients in one business-week by 6:00pm EST after receipt of samples. For example, if samples are received on a Monday they are due on the following Monday by 6:00pm EST. Results are faxed or emailed to the requested location indicated on the Chain of Custody. Non-routine analysis may require more than the one business-week turnaround time. Please confirm non-routine sample turnaround times.

Reporting

Results are emailed or faxed at no additional charge. A hard copy of the result report is mailed within 24 hours of the faxing or emailing of your results. Cat "B" like packages are within 3-4 weeks from time of analysis. Standard Electronic Disk Deliverables (EDD) is also available at no additional charge.

Payment Terms

Payment for all purchases shall be due within 30 days from date of invoice. The client agrees to pay a finance charge of 1.5% per month on the overdue balance and cost of collection, including attorney fees, if collection proceedings are necessary. You must have a completed credit application on file to extend credit. Purchase orders or checks information must be submitted for us to release results

Rush Turnaround Samples

Expedited turn around times is available. Please confirm rush turnaround times with Client Services before submitting samples.

Applicable Surcharges for Rush Turnaround Samples:
Same day TAT = 200%
Next business day TAT by Noon = 150%
Next business day TAT by 6:00pm = 100%
Second business day TAT by 6:00pm = 75%
Third business day TAT by 6:00pm = 50%
Fourth business day TAT by 6:00pm = 35%
Fifth business day = Standard

Statement of Confidentiality

Centek Laboratories, LLC is aware of the importance of the confidentiality of results to many of our clients. Your name and data will be held in the strictest of confidence. We will not accept business that may constitute a conflict of interest. We commonly sign Confidential Nondisclosure Agreements with clients prior to beginning work. All research, results and reports will be kept strictly confidential. Secrecy Agreements and Disclosure Statements will be signed for the client if so specified. Results will be provided only to the addressee specified on the Chain of Custody Form submitted with the samples unless law requires release. Written permission is required from the addressee to release results to any other party.

Limitation on Liability

Centek Laboratories, LLC warrants the test results to be accurate to the methodology and sample type for each sample submitted to Centek Laboratories, LLC. In no event shall Centek Laboratories, LLC be liable for direct, indirect, special, punitive, incidental, exemplary or consequential damages, or any damages whatsoever, even if Centek Laboratories, LLC has been previously advised of the possibility of such damages whether in an action under contract, negligence, or any other theory, arising out of or in connection with the use, inability to use or performance of the information, services, products and materials available from the laboratory or this site. These limitations shall apply notwithstanding any failure of essential purpose of any limited remedy. Because some jurisdictions do not allow limitations on how long an implied warranty lasts, or the exclusion or limitation of liability for consequential or incidental damages, the above limitations may not apply to you. This is a comprehensive limitation of

liability that applies to all damages of any kind, including (without limitation) compensatory, direct, indirect or consequential damages, loss of data, income or profit and or loss of or damage to property and claims of third parties.

CENTEK LABORATORIES, LLC

Date: *13-Apr-17*

CLIENT: Ravi Engineering & Land Surveying, P.C.

Project: 3130 Monroe

Lab Order: C1703065

CASE NARRATIVE

Samples were analyzed using the methods outlined in the following references:

Centek Laboratories, LLC SOP TS-80
Compendium of Methods for the Determination of Toxic Organic Compounds, Compendium Method TO-15, January 1999

All method blanks, laboratory spikes, and/or matrix spikes met quality assurance objective except as indicated in the corrective action report(s). All samples were received and analyzed within the EPA recommended holding times. Test results are not Method Blank (MB) corrected for contamination.

NYSDEC ASP samples:
Canisters should be evacuated to a reading of less than or equal to 50 millitorr prior to shipment to sampling personnel. The vacuum in the canister will be field checked prior to sampling, and must read 28" of Hg (±2", vacuum, absolute) before a sample can be collected. After the sample has been collected, the pressure of the canister will be read and recorded again, and must be 5" of Hg (±1", vacuum, absolute) for the sample to be valid. Once received at the laboratory, the canister vacuum should be confirmed to be 5" of Hg,±1". Please record and report the pressure/vacuum of received canisters on the sample receipt paperwork. A pressure/vacuum reading should also be taken just prior to the withdrawal of sample from the canister, and recorded on the sample preparation log sheet. All regulators are calibrated to meet these requirements before they leave the laboratory. However, due to environmental conditions and use of the equipment Centek can not guarantee that this criteria can always be achieved.

Centek Labs - Chain of Custody

Centek Laboratories

143 Midler Park Drive
Syracuse, NY 13206
315-431-9730
www.CentekLabs.com

Vapor Intrusion & IAQ

Site Name.
Project: 3130 Monroe
PO#:
Quote # Q-3P
Canister Order #: 6385

Detection Limit		Report Level	
☐	5ppbv	☐	Level I
☑	1ug/M3	☐	Level II
☐	1ug/M3 +TCE .25	☑	Cat "B" Like

TAT Turnaround Time:	Check One	Rush TAT Surcharge %	Due Date:
5 Business Days	☑	0%	
4 Business Days	☐	25%	
3 Business Days	☐	50%	
2 Business Days	☐	75%	
*Next Day by 5pm	☐	100%	
*Next Day by Noon	☐	150%	
*Same Day	☐	200%	

*For Same and Next Day TAT Please Notify Lab

Company: Ravi Engineering + Land Surveying PC
Report to:
Address: 2110 S. Clinton Ave
City, State, Zip: Roch NY 14618
Email: [illegible] @ [illegible]raviengs.com
Phone: (585) 697-2071

Company:
Check Here If Same: ☒
Invoice to:
Address:
City, State, Zip
Email:
Phone:

Sample ID	Date Sampled	Canister Number	Regulator Number	Analysis Request	Field Vacuum Start / Stop	Labs Vacuum** Rec'V/Analysis	Comments
AS-1-20170321	3/21/2017	189	378	TO-15	730 / 11.5	-7 /	Eyeglass store [illegible]
AS-2-20170321	↓	353	109	↓	730 / 10	-9 /	Nail salon [illegible]
OS-1-20170321	↓	479	155	↓	29.5 / 3	-2 /	outdoor behind bldg
					/	/	
					/	/	
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10:12
10:19
5:12

Chain of Custody	Print Name	Signature	Date/Time	Courier: CIRCLE ONE
Sampled by:	Lynn Zicari	Lynn Zicari	3/21/17	(FedEx) UPS Pickup/Dropoff
Relinquished by:	Lynn Zicari	Lynn Zicari	3/22/17	**For LAB USE ONLY
Received at Lab by:	Jen Scala	[signature]	3-22-17	Work Order # C1703065

*** By signing Centek Labs Chain of Custody, you are accepting Centek Labs Terms and Conditions listed on the reverse side.

Centek Laboratories

Date: *13-Apr-17*

CENTEK LABORATORIES, LLC

CLIENT: Ravi Engineering & Land Surveying, P.C.
Project: 3130 Monroe
Lab Order: C1703065

Work Order Sample Summary

Lab Sample ID	Client Sample ID	Tag Number	Collection Date	Date Received
C1703065-001A	AS-1-20170321	189,378	3/21/2017	3/23/2017
C1703065-002A	AS-2-20170321	333,109	3/21/2017	3/23/2017
C1703065-003A	OS-1-20170321	479,155	3/21/2017	3/23/2017

Centek Laboratories, LLC

Date: *30-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20170321
Lab Order:	C1703065	**Tag Number:**	189,378
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
FIELD PARAMETERS		FLD				Analyst:
Lab Vacuum In	-1			"Hg		3/23/2017
Lab Vacuum Out	-30			"Hg		3/23/2017
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		TO-15				Analyst: RJP
1,1,1-Trichloroethane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,1,2,2-Tetrachloroethane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,1,2-Trichloroethane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,1-Dichloroethane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,1-Dichloroethene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,2,4-Trichlorobenzene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,2,4-Trimethylbenzene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,2-Dibromoethane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,2-Dichlorobenzene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,2-Dichloroethane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,2-Dichloropropane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,3,5-Trimethylbenzene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,3-butadiene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,3-Dichlorobenzene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,4-Dichlorobenzene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
1,4-Dioxane	< 0.30	0.30		ppbV	1	3/23/2017 11:26:00 PM
2,2,4-trimethylpentane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
4-ethyltoluene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Acetone	780	81		ppbV	270	3/24/2017 10:03:00 PM
Allyl chloride	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Benzene	0.29	0.15		ppbV	1	3/23/2017 11:26:00 PM
Benzyl chloride	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Bromodichloromethane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Bromoform	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Bromomethane	< 0.15	0.15	UJ	ppbV	1	3/23/2017 11:26:00 PM
Carbon disulfide	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Carbon tetrachloride	0.050	0.040		ppbV	1	3/23/2017 11:26:00 PM
Chlorobenzene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Chloroethane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Chloroform	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Chloromethane	0.66	0.15		ppbV	1	3/23/2017 11:26:00 PM
cis-1,2-Dichloroethene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
cis-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Cyclohexane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Dibromochloromethane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Ethyl acetate	14	4.0		ppbV	27	3/24/2017 9:25:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

MEP 5/11/17

Centek Laboratories, LLC

Date: 30-Mar-17

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20170321
Lab Order:	C1703065	**Tag Number:**	189,378
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: RJP
Ethylbenzene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Freon 11	0.29 J	0.15		ppbV	1	3/23/2017 11:26:00 PM
Freon 113	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Freon 114	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Freon 12	0.41	0.15		ppbV	1	3/23/2017 11:26:00 PM
Heptane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Hexachloro-1,3-butadiene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Hexane	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Isopropyl alcohol	110	40		ppbV	270	3/24/2017 10:03:00 PM
m&p-Xylene	0.14	0.30	J	ppbV	1	3/23/2017 11:26:00 PM
Methyl Butyl Ketone	< 0.30 UJ	0.30		ppbV	1	3/23/2017 11:26:00 PM
Methyl Ethyl Ketone	5.1	8.1	J	ppbV	27	3/24/2017 9:25:00 PM
Methyl Isobutyl Ketone	< 0.30	0.30		ppbV	1	3/23/2017 11:26:00 PM
Methyl tert-butyl ether	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Methylene chloride	0.23	0.15		ppbV	1	3/23/2017 11:26:00 PM
o-Xylene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Propylene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Styrene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Tetrachloroethylene	4.6	4.0		ppbV	27	3/24/2017 9:25:00 PM
Tetrahydrofuran	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Toluene	0.93	0.15		ppbV	1	3/23/2017 11:26:00 PM
trans-1,2-Dichloroethene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
trans-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Trichloroethene	0.19	0.040		ppbV	1	3/23/2017 11:26:00 PM
Vinyl acetate	< 0.15	0.15		ppbV	1	3/23/2017 11:26:00 PM
Vinyl Bromide	< 0.15 UJ	0.15		ppbV	1	3/23/2017 11:26:00 PM
Vinyl chloride	< 0.040	0.040		ppbV	1	3/23/2017 11:26:00 PM
Surr: Bromofluorobenzene	91.0	70-130		%REC	1	3/23/2017 11:26:00 PM

MKP 5/11/17

Qualifiers:

**	Quantitation Limit	,	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

Centek Laboratories, LLC

Date: 30-Mar-17

CLIENT:	Ravi Engineering & Land Surveying, P.C.	Client Sample ID:	AS-1-20170321
Lab Order:	C1703065	Tag Number:	189,378
Project:	3130 Monroe	Collection Date:	3/21/2017
Lab ID:	C1703065-001A	Matrix:	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		TO-15				Analyst: RJP
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	3/23/2017 11:26:00 PM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	3/23/2017 11:26:00 PM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	3/23/2017 11:26:00 PM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	3/23/2017 11:26:00 PM
1,1-Dichloroethene	< 0.59	0.59		ug/m3	1	3/23/2017 11:26:00 PM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	3/23/2017 11:26:00 PM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/23/2017 11:26:00 PM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	3/23/2017 11:26:00 PM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/23/2017 11:26:00 PM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	3/23/2017 11:26:00 PM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	3/23/2017 11:26:00 PM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/23/2017 11:26:00 PM
1,3-butadiene	< 0.33	0.33		ug/m3	1	3/23/2017 11:26:00 PM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/23/2017 11:26:00 PM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/23/2017 11:26:00 PM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	3/23/2017 11:26:00 PM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	3/23/2017 11:26:00 PM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	3/23/2017 11:26:00 PM
Acetone	1900	190		ug/m3	270	3/24/2017 10:03:00 PM
Allyl chloride	< 0.47	0.47		ug/m3	1	3/23/2017 11:26:00 PM
Benzene	0.93	0.48		ug/m3	1	3/23/2017 11:26:00 PM
Benzyl chloride	< 0.86	0.86		ug/m3	1	3/23/2017 11:26:00 PM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	3/23/2017 11:26:00 PM
Bromoform	< 1.6	1.6		ug/m3	1	3/23/2017 11:26:00 PM
Bromomethane	< 0.58	0.58	JJ	ug/m3	1	3/23/2017 11:26:00 PM
Carbon disulfide	< 0.47	0.47		ug/m3	1	3/23/2017 11:26:00 PM
Carbon tetrachloride	0.31	0.25		ug/m3	1	3/23/2017 11:26:00 PM
Chlorobenzene	< 0.69	0.69		ug/m3	1	3/23/2017 11:26:00 PM
Chloroethane	< 0.40	0.40		ug/m3	1	3/23/2017 11:26:00 PM
Chloroform	< 0.73	0.73		ug/m3	1	3/23/2017 11:26:00 PM
Chloromethane	1.3	0.31		ug/m3	1	3/23/2017 11:26:00 PM
cis-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/23/2017 11:26:00 PM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/23/2017 11:26:00 PM
Cyclohexane	< 0.52	0.52		ug/m3	1	3/23/2017 11:26:00 PM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	3/23/2017 11:26:00 PM
Ethyl acetate	49	14		ug/m3	27	3/24/2017 9:25:00 PM
Ethylbenzene	< 0.65	0.65		ug/m3	1	3/23/2017 11:26:00 PM
Freon 11	1.6	0.84	J	ug/m3	1	3/23/2017 11:26:00 PM
Freon 113	< 1.1	1.1		ug/m3	1	3/23/2017 11:26:00 PM
Freon 114	< 1.0	1.0		ug/m3	1	3/23/2017 11:26:00 PM

Qualifiers:

**	Quantitation Limit	,	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

MKP 5/11/17

Centek Laboratories, LLC

Date: *30-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-1-20170321
Lab Order:	C1703065	**Tag Number:**	189,378
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-001A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				**Analyst: RJP**
Freon 12	2.0	0.74		ug/m3	1	3/23/2017 11:26:00 PM
Heptane	< 0.61	0.61		ug/m3	1	3/23/2017 11:26:00 PM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	3/23/2017 11:26:00 PM
Hexane	< 0.53	0.53		ug/m3	1	3/23/2017 11:26:00 PM
Isopropyl alcohol	270	98		ug/m3	270	3/24/2017 10:03:00 PM
m&p-Xylene	0.61	1.3	J	ug/m3	1	3/23/2017 11:26:00 PM
Methyl Butyl Ketone	< 1.2 UJ	1.2		ug/m3	1	3/23/2017 11:26:00 PM
Methyl Ethyl Ketone	15	24	J	ug/m3	27	3/24/2017 9:25:00 PM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	3/23/2017 11:26:00 PM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	3/23/2017 11:26:00 PM
Methylene chloride	0.60	0.52		ug/m3	1	3/23/2017 11:26:00 PM
o-Xylene	< 0.65	0.65		ug/m3	1	3/23/2017 11:26:00 PM
Propylene	< 0.26	0.26		ug/m3	1	3/23/2017 11:26:00 PM
Styrene	< 0.64	0.64		ug/m3	1	3/23/2017 11:26:00 PM
Tetrachloroethylene	31	27		ug/m3	27	3/24/2017 9:25:00 PM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	3/23/2017 11:26:00 PM
Toluene	3.5	0.57		ug/m3	1	3/23/2017 11:26:00 PM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/23/2017 11:26:00 PM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/23/2017 11:26:00 PM
Trichloroethene	0.54	0.21		ug/m3	1	3/23/2017 11:26:00 PM
Vinyl acetate	< 0.53	0.53		ug/m3	1	3/23/2017 11:26:00 PM
Vinyl Bromide	< 0.66 UJ	0.66		ug/m3	1	3/23/2017 11:26:00 PM
Vinyl chloride	< 0.10	0.10		ug/m3	1	3/23/2017 11:26:00 PM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

MFP 5/11/17

Centek Laboratories, LLC

Date: *30-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20170321
Lab Order:	C1703065	**Tag Number:**	333,109
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
FIELD PARAMETERS		FLD				Analyst:
Lab Vacuum In	-9			"Hg		3/23/2017
Lab Vacuum Out	-30			"Hg		3/23/2017
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		TO-15				Analyst: RJP
1,1,1-Trichloroethane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,1,2,2-Tetrachloroethane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,1,2-Trichloroethane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,1-Dichloroethane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,1-Dichloroethene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,2,4-Trichlorobenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,2,4-Trimethylbenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,2-Dibromoethane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,2-Dichlorobenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,2-Dichloroethane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,2-Dichloropropane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,3,5-Trimethylbenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,3-butadiene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,3-Dichlorobenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,4-Dichlorobenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
1,4-Dioxane	< 0.30	0.30		ppbV	1	3/24/2017 12:08:00 AM
2,2,4-trimethylpentane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
4-ethyltoluene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Acetone	16000	2200		ppbV	7290	3/24/2017 11:21:00 PM
Allyl chloride	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Benzene	0.48	0.15		ppbV	1	3/24/2017 12:08:00 AM
Benzyl chloride	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Bromodichloromethane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Bromoform	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Bromomethane	< 0.15 UJ	0.15		ppbV	1	3/24/2017 12:08:00 AM
Carbon disulfide	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Carbon tetrachloride	0.070	0.040		ppbV	1	3/24/2017 12:08:00 AM
Chlorobenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Chloroethane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Chloroform	0.27	0.15		ppbV	1	3/24/2017 12:08:00 AM
Chloromethane	0.92	0.15		ppbV	1	3/24/2017 12:08:00 AM
cis-1,2-Dichloroethene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
cis-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Cyclohexane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Dibromochloromethane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Ethyl acetate	95	110	J	ppbV	729	3/24/2017 10:44:00 PM

Qualifiers:	**	Quantitation Limit	.	Results reported are not blank corrected	
	B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range	
	H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit	
	IN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection	
	S	Spike Recovery outside accepted recovery limits			

MKP 5/11/17

Centek Laboratories, LLC

Date: *30-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20170321
Lab Order:	C1703065	**Tag Number:**	333,109
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: RJP
Ethylbenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Freon 11	0.27 J	0.15		ppbV	1	3/24/2017 12:08:00 AM
Freon 113	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Freon 114	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Freon 12	0.39	0.15		ppbV	1	3/24/2017 12:08:00 AM
Heptane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Hexachloro-1,3-butadiene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Hexane	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Isopropyl alcohol	1300	110		ppbV	729	3/24/2017 10:44:00 PM
m&p-Xylene	0.19	0.30	J	ppbV	1	3/24/2017 12:08:00 AM
Methyl Butyl Ketone	< 0.30 UJ	0.30		ppbV	1	3/24/2017 12:08:00 AM
Methyl Ethyl Ketone	1.8	0.30		ppbV	1	3/24/2017 12:08:00 AM
Methyl Isobutyl Ketone	0.40	0.30		ppbV	1	3/24/2017 12:08:00 AM
Methyl tert-butyl ether	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Methylene chloride	0.23	0.15		ppbV	1	3/24/2017 12:08:00 AM
o-Xylene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Propylene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Styrene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Tetrachloroethylene	4.3	1.5		ppbV	10	3/24/2017 2:04:00 PM
Tetrahydrofuran	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Toluene	3.0	1.5		ppbV	10	3/24/2017 2:04:00 PM
trans-1,2-Dichloroethene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
trans-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Trichloroethene	0.090	0.040		ppbV	1	3/24/2017 12:08:00 AM
Vinyl acetate	< 0.15	0.15		ppbV	1	3/24/2017 12:08:00 AM
Vinyl Bromide	< 0.15 UJ	0.15		ppbV	1	3/24/2017 12:08:00 AM
Vinyl chloride	< 0.040	0.040		ppbV	1	3/24/2017 12:08:00 AM
Surr: Bromofluorobenzene	89.0	70-130		%REC	1	3/24/2017 12:08:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

MCP 5/11/17

Centek Laboratories, LLC

Date: *30-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20170321
Lab Order:	C1703065	**Tag Number:**	333,109
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: RJP
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	3/24/2017 12:08:00 AM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	3/24/2017 12:08:00 AM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	3/24/2017 12:08:00 AM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	3/24/2017 12:08:00 AM
1,1-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:08:00 AM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	3/24/2017 12:08:00 AM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/24/2017 12:08:00 AM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	3/24/2017 12:08:00 AM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:08:00 AM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	3/24/2017 12:08:00 AM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	3/24/2017 12:08:00 AM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/24/2017 12:08:00 AM
1,3-butadiene	< 0.33	0.33		ug/m3	1	3/24/2017 12:08:00 AM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:08:00 AM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:08:00 AM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	3/24/2017 12:08:00 AM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	3/24/2017 12:08:00 AM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	3/24/2017 12:08:00 AM
Acetone	36000	5200		ug/m3	7299	3/24/2017 11:21:00 PM
Allyl chloride	< 0.47	0.47		ug/m3	1	3/24/2017 12:08:00 AM
Benzene	1.5	0.48		ug/m3	1	3/24/2017 12:08:00 AM
Benzyl chloride	< 0.86	0.86		ug/m3	1	3/24/2017 12:08:00 AM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	3/24/2017 12:08:00 AM
Bromoform	< 1.6	1.6		ug/m3	1	3/24/2017 12:08:00 AM
Bromomethane	< 0.58 NJ	0.58		ug/m3	1	3/24/2017 12:08:00 AM
Carbon disulfide	< 0.47	0.47		ug/m3	1	3/24/2017 12:08:00 AM
Carbon tetrachloride	0.44	0.25		ug/m3	1	3/24/2017 12:08:00 AM
Chlorobenzene	< 0.69	0.69		ug/m3	1	3/24/2017 12:08:00 AM
Chloroethane	< 0.40	0.40		ug/m3	1	3/24/2017 12:08:00 AM
Chloroform	1.3	0.73		ug/m3	1	3/24/2017 12:08:00 AM
Chloromethane	1.9	0.31		ug/m3	1	3/24/2017 12:08:00 AM
cis-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:08:00 AM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/24/2017 12:08:00 AM
Cyclohexane	< 0.52	0.52		ug/m3	1	3/24/2017 12:08:00 AM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	3/24/2017 12:08:00 AM
Ethyl acetate	340	400	J	ug/m3	729	3/24/2017 10:44:00 PM
Ethylbenzene	< 0.65	0.65		ug/m3	1	3/24/2017 12:08:00 AM
Freon 11	1.5 J	0.84		ug/m3	1	3/24/2017 12:08:00 AM
Freon 113	< 1.1	1.1		ug/m3	1	3/24/2017 12:08:00 AM
Freon 114	< 1.0	1.0		ug/m3	1	3/24/2017 12:08:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

MKP 5/11/17

Centek Laboratories, LLC

Date: *30-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	AS-2-20170321
Lab Order:	C1703065	**Tag Number:**	333,109
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-002A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		TO-15				Analyst: RJP
Freon 12	1.9	0.74		ug/m3	1	3/24/2017 12:08:00 AM
Heptane	< 0.61	0.61		ug/m3	1	3/24/2017 12:08:00 AM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	3/24/2017 12:08:00 AM
Hexane	< 0.53	0.53		ug/m3	1	3/24/2017 12:08:00 AM
Isopropyl alcohol	3200	270		ug/m3	729	3/24/2017 10:44:00 PM
m&p-Xylene	0.82	1.3	J	ug/m3	1	3/24/2017 12:08:00 AM
Methyl Butyl Ketone	< 1.2 NJ	1.2		ug/m3	1	3/24/2017 12:08:00 AM
Methyl Ethyl Ketone	5.4	0.88		ug/m3	1	3/24/2017 12:08:00 AM
Methyl Isobutyl Ketone	1.6	1.2		ug/m3	1	3/24/2017 12:08:00 AM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	3/24/2017 12:08:00 AM
Methylene chloride	0.80	0.52		ug/m3	1	3/24/2017 12:08:00 AM
o-Xylene	< 0.65	0.65		ug/m3	1	3/24/2017 12:08:00 AM
Propylene	< 0.26	0.26		ug/m3	1	3/24/2017 12:08:00 AM
Styrene	< 0.64	0.64		ug/m3	1	3/24/2017 12:08:00 AM
Tetrachloroethylene	29	10		ug/m3	10	3/24/2017 2:04:00 PM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	3/24/2017 12:08:00 AM
Toluene	11	5.7		ug/m3	10	3/24/2017 2:04:00 PM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:08:00 AM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/24/2017 12:08:00 AM
Trichloroethene	0.48	0.21		ug/m3	1	3/24/2017 12:08:00 AM
Vinyl acetate	< 0.53	0.53		ug/m3	1	3/24/2017 12:08:00 AM
Vinyl Bromide	< 0.66 NJ	0.66		ug/m3	1	3/24/2017 12:08:00 AM
Vinyl chloride	< 0.10	0.10		ug/m3	1	3/24/2017 12:08:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

MKP 5/4/17

Centek Laboratories, LLC

Date: *30-Mar-17*

CLIENT: Ravi Engineering & Land Surveying, P.C.
Client Sample ID: OS-1-20170321
Lab Order: C1703065
Tag Number: 479,155
Project: 3130 Monroe
Collection Date: 3/21/2017
Lab ID: C1703065-003A
Matrix: AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
FIELD PARAMETERS		FLD				Analyst:
Lab Vacuum In	-2			"Hg		3/23/2017
Lab Vacuum Out	-30			"Hg		3/23/2017
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		TO-15				Analyst: RJP
1,1,1-Trichloroethane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,1,2,2-Tetrachloroethane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,1,2-Trichloroethane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,1-Dichloroethane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,1-Dichloroethene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,2,4-Trichlorobenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,2,4-Trimethylbenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,2-Dibromoethane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,2-Dichlorobenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,2-Dichloroethene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,2-Dichloropropane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,3,5-Trimethylbenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,3-butadiene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,3-Dichlorobenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,4-Dichlorobenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
1,4-Dioxane	< 0.30	0.30		ppbV	1	3/24/2017 12:49:00 AM
2,2,4-trimethylpentane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
4-ethyltoluene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Acetone	100	12		ppbV	40	3/25/2017 12:36:00 AM
Allyl chloride	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Benzene	0.17	0.15		ppbV	1	3/24/2017 12:49:00 AM
Benzyl chloride	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Bromodichloromethane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Bromoform	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Bromomethane	< 0.15	0.15	NJ	ppbV	1	3/24/2017 12:49:00 AM
Carbon disulfide	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Carbon tetrachloride	0.060	0.040		ppbV	1	3/24/2017 12:49:00 AM
Chlorobenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Chloroethane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Chloroform	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Chloromethane	0.55	0.15		ppbV	1	3/24/2017 12:49:00 AM
cis-1,2-Dichloroethene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
cis-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Cyclohexane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Dibromochloromethane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Ethyl acetate	0.54	0.15		ppbV	1	3/24/2017 12:49:00 AM

Qualifiers:

- ** Quantitation Limit
- B Analyte detected in the associated Method Blank
- H Holding times for preparation or analysis exceeded
- JN Non-routine analyte. Quantitation estimated.
- S Spike Recovery outside accepted recovery limits
- . Results reported are not blank corrected
- E Estimated Value above quantitation range
- J Analyte detected below quantitation limit
- ND Not Detected at the Limit of Detection

MEP 5/11/17

Centek Laboratories, LLC

Date: *30-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	OS-1-20170321
Lab Order:	C1703065	**Tag Number:**	479,155
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-003A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		TO-15				Analyst: RJP
Ethylbenzene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Freon 11	0.28	0.15	J	ppbV	1	3/24/2017 12:49:00 AM
Freon 113	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Freon 114	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Freon 12	0.42	0.15		ppbV	1	3/24/2017 12:49:00 AM
Heptane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Hexachloro-1,3-butadiene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Hexane	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Isopropyl alcohol	11	1.5		ppbV	10	3/24/2017 11:59:00 PM
m&p-Xylene	< 0.30	0.30		ppbV	1	3/24/2017 12:49:00 AM
Methyl Butyl Ketone	< 0.30	0.30	UJ	ppbV	1	3/24/2017 12:49:00 AM
Methyl Ethyl Ketone	0.36	0.30		ppbV	1	3/24/2017 12:49:00 AM
Methyl Isobutyl Ketone	< 0.30	0.30		ppbV	1	3/24/2017 12:49:00 AM
Methyl tert-butyl ether	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Methylene chloride	0.20	0.15		ppbV	1	3/24/2017 12:49:00 AM
o-Xylene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Propylene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Styrene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Tetrachloroethylene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Tetrahydrofuran	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Toluene	0.29	0.15		ppbV	1	3/24/2017 12:49:00 AM
trans-1,2-Dichloroethene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
trans-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Trichloroethene	< 0.040	0.040		ppbV	1	3/24/2017 12:49:00 AM
Vinyl acetate	< 0.15	0.15		ppbV	1	3/24/2017 12:49:00 AM
Vinyl Bromide	< 0.15	0.15	UJ	ppbV	1	3/24/2017 12:49:00 AM
Vinyl chloride	< 0.040	0.040		ppbV	1	3/24/2017 12:49:00 AM
Surr: Bromofluorobenzene	92.0	70-130		%REC	1	3/24/2017 12:49:00 AM

Qualifiers:	**	Quantitation Limit	.	Results reported are not blank corrected
	B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
	H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
	JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
	S	Spike Recovery outside accepted recovery limits		

MAP 5/11/17

Centek Laboratories, LLC

Date: *30-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	OS-1-20170321
Lab Order:	C1703065	**Tag Number:**	479,155
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-003A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				**Analyst: RJP**
1,1,1-Trichloroethane	< 0.82	0.82		ug/m3	1	3/24/2017 12:49:00 AM
1,1,2,2-Tetrachloroethane	< 1.0	1.0		ug/m3	1	3/24/2017 12:49:00 AM
1,1,2-Trichloroethane	< 0.82	0.82		ug/m3	1	3/24/2017 12:49:00 AM
1,1-Dichloroethane	< 0.61	0.61		ug/m3	1	3/24/2017 12:49:00 AM
1,1-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:49:00 AM
1,2,4-Trichlorobenzene	< 1.1	1.1		ug/m3	1	3/24/2017 12:49:00 AM
1,2,4-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/24/2017 12:49:00 AM
1,2-Dibromoethane	< 1.2	1.2		ug/m3	1	3/24/2017 12:49:00 AM
1,2-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:49:00 AM
1,2-Dichloroethane	< 0.61	0.61		ug/m3	1	3/24/2017 12:49:00 AM
1,2-Dichloropropane	< 0.69	0.69		ug/m3	1	3/24/2017 12:49:00 AM
1,3,5-Trimethylbenzene	< 0.74	0.74		ug/m3	1	3/24/2017 12:49:00 AM
1,3-butadiene	< 0.33	0.33		ug/m3	1	3/24/2017 12:49:00 AM
1,3-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:49:00 AM
1,4-Dichlorobenzene	< 0.90	0.90		ug/m3	1	3/24/2017 12:49:00 AM
1,4-Dioxane	< 1.1	1.1		ug/m3	1	3/24/2017 12:49:00 AM
2,2,4-trimethylpentane	< 0.70	0.70		ug/m3	1	3/24/2017 12:49:00 AM
4-ethyltoluene	< 0.74	0.74		ug/m3	1	3/24/2017 12:49:00 AM
Acetone	240	28		ug/m3	40	3/25/2017 12:36:00 AM
Allyl chloride	< 0.47	0.47		ug/m3	1	3/24/2017 12:49:00 AM
Benzene	0.54	0.48		ug/m3	1	3/24/2017 12:49:00 AM
Benzyl chloride	< 0.86	0.86		ug/m3	1	3/24/2017 12:49:00 AM
Bromodichloromethane	< 1.0	1.0		ug/m3	1	3/24/2017 12:49:00 AM
Bromoform	< 1.6	1.6		ug/m3	1	3/24/2017 12:49:00 AM
Bromomethane	< 0.58	0.58	WJ	ug/m3	1	3/24/2017 12:49:00 AM
Carbon disulfide	< 0.47	0.47		ug/m3	1	3/24/2017 12:49:00 AM
Carbon tetrachloride	0.38	0.25		ug/m3	1	3/24/2017 12:49:00 AM
Chlorobenzene	< 0.69	0.69		ug/m3	1	3/24/2017 12:49:00 AM
Chloroethane	< 0.40	0.40		ug/m3	1	3/24/2017 12:49:00 AM
Chloroform	< 0.73	0.73		ug/m3	1	3/24/2017 12:49:00 AM
Chloromethane	1.1	0.31		ug/m3	1	3/24/2017 12:49:00 AM
cis-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:49:00 AM
cis-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/24/2017 12:49:00 AM
Cyclohexane	< 0.52	0.52		ug/m3	1	3/24/2017 12:49:00 AM
Dibromochloromethane	< 1.3	1.3		ug/m3	1	3/24/2017 12:49:00 AM
Ethyl acetate	1.9	0.54		ug/m3	1	3/24/2017 12:49:00 AM
Ethylbenzene	< 0.65	0.65		ug/m3	1	3/24/2017 12:49:00 AM
Freon 11	1.6	0.84	J	ug/m3	1	3/24/2017 12:49:00 AM
Freon 113	< 1.1	1.1		ug/m3	1	3/24/2017 12:49:00 AM
Freon 114	< 1.0	1.0		ug/m3	1	3/24/2017 12:49:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

MCP 5/11/17

Centek Laboratories, LLC

Date: *30-Mar-17*

CLIENT:	Ravi Engineering & Land Surveying, P.C.	**Client Sample ID:**	OS-1-20170321
Lab Order:	C1703065	**Tag Number:**	479,155
Project:	3130 Monroe	**Collection Date:**	3/21/2017
Lab ID:	C1703065-003A	**Matrix:**	AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.25UG/M3 CT-TCE-VC		**TO-15**				Analyst: RJP
Freon 12	2.1	0.74		ug/m3	1	3/24/2017 12:49:00 AM
Heptane	< 0.61	0.61		ug/m3	1	3/24/2017 12:49:00 AM
Hexachloro-1,3-butadiene	< 1.6	1.6		ug/m3	1	3/24/2017 12:49:00 AM
Hexane	< 0.53	0.53		ug/m3	1	3/24/2017 12:49:00 AM
Isopropyl alcohol	28	3.7		ug/m3	10	3/24/2017 11:59:00 PM
m&p-Xylene	< 1.3	1.3		ug/m3	1	3/24/2017 12:49:00 AM
Methyl Butyl Ketone	< 1.2	1.2	UJ	ug/m3	1	3/24/2017 12:49:00 AM
Methyl Ethyl Ketone	1.1	0.88		ug/m3	1	3/24/2017 12:49:00 AM
Methyl Isobutyl Ketone	< 1.2	1.2		ug/m3	1	3/24/2017 12:49:00 AM
Methyl tert-butyl ether	< 0.54	0.54		ug/m3	1	3/24/2017 12:49:00 AM
Methylene chloride	0.69	0.52		ug/m3	1	3/24/2017 12:49:00 AM
o-Xylene	< 0.65	0.65		ug/m3	1	3/24/2017 12:49:00 AM
Propylene	< 0.26	0.26		ug/m3	1	3/24/2017 12:49:00 AM
Styrene	< 0.64	0.64		ug/m3	1	3/24/2017 12:49:00 AM
Tetrachloroethylene	< 1.0	1.0		ug/m3	1	3/24/2017 12:49:00 AM
Tetrahydrofuran	< 0.44	0.44		ug/m3	1	3/24/2017 12:49:00 AM
Toluene	1.1	0.57		ug/m3	1	3/24/2017 12:49:00 AM
trans-1,2-Dichloroethene	< 0.59	0.59		ug/m3	1	3/24/2017 12:49:00 AM
trans-1,3-Dichloropropene	< 0.68	0.68		ug/m3	1	3/24/2017 12:49:00 AM
Trichloroethene	< 0.21	0.21		ug/m3	1	3/24/2017 12:49:00 AM
Vinyl acetate	< 0.53	0.53		ug/m3	1	3/24/2017 12:49:00 AM
Vinyl Bromide	< 0.66	0.66	UJ	ug/m3	1	3/24/2017 12:49:00 AM
Vinyl chloride	< 0.10	0.10		ug/m3	1	3/24/2017 12:49:00 AM

Qualifiers:

**	Quantitation Limit	.	Results reported are not blank corrected
B	Analyte detected in the associated Method Blank	E	Estimated Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limit
JN	Non-routine analyte. Quantitation estimated.	ND	Not Detected at the Limit of Detection
S	Spike Recovery outside accepted recovery limits		

MEPS 5/11/17

Appendix B

Laboratory QC Documentation

CENTEK LABORATORIES, LLC

Date: 30-Mar-17

ANALYTICAL QC SUMMARY REPORT

CLIENT: Ravi Engineering & Land Surveying, P.C.
Work Order: C1703065
Project: 3130 Monroe

TestCode: 0.25CT-TCE-VC

Sample ID ALCS1UGD-032317	SampType: LCSD	TestCode: 0.25CT-TCE-	Units: ppbV	Prep Date:	RunNo: 12071
Client ID: ZZZZZ	Batch ID: R12071	TestNo: TO-15		Analysis Date: 3/24/2017	SeqNo: 141147

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
1,1,1-Trichloroethane	0.9000	0.15	1	0	90.0	70	130	0.85	5.71	30	
1,1,2,2-Tetrachloroethane	0.8900	0.15	1	0	89.0	70	130	0.89	0	30	
1,1,2-Trichloroethane	0.9000	0.15	1	0	90.0	70	130	0.87	3.39	30	
1,1-Dichloroethane	0.8200	0.15	1	0	82.0	70	130	0.77	6.29	30	
1,1-Dichloroethene	0.8000	0.15	1	0	80.0	70	130	0.78	2.53	30	
1,2,4-Trichlorobenzene	1.100	0.15	1	0	110	70	130	1.15	4.44	30	
1,2,4-Trimethylbenzene	0.8800	0.15	1	0	88.0	70	130	0.87	1.14	30	
1,2-Dibromoethane	0.9000	0.15	1	0	90.0	70	130	0.87	3.39	30	
1,2-Dichlorobenzene	1.000	0.15	1	0	100	70	130	0.98	2.02	30	
1,2-Dichloroethane	0.8600	0.15	1	0	86.0	70	130	0.84	2.35	30	
1,2-Dichloropropane	0.8000	0.15	1	0	80.0	70	130	0.8	0	30	
1,3,5-Trimethylbenzene	0.9000	0.15	1	0	90.0	70	130	0.86	4.55	30	
1,3-butadiene	1.050	0.15	1	0	105	70	130	0.96	8.95	30	
1,3-Dichlorobenzene	1.010	0.15	1	0	101	70	130	1.03	1.95	30	
1,4-Dichlorobenzene	1.050	0.15	1	0	105	70	130	1.06	0.948	30	
1,4-Dioxane	0.8400	0.30	1	0	84.0	70	130	0.83	1.20	30	
2,2,4-trimethylpentane	0.8000	0.15	1	0	80.0	70	130	0.77	3.82	30	
4-ethyltoluene	0.9100	0.15	1	0	91.0	70	130	0.9	1.10	30	
Acetone	0.8300	0.30	1	0	83.0	70	130	0.75	10.1	30	
Allyl chloride	0.7000	0.15	1	0	70.0	70	130	0.71	1.42	30	
Benzene	0.8600	0.15	1	0	86.0	70	130	0.84	2.35	30	
Benzyl chloride	0.8300	0.15	1	0	83.0	70	130	0.9	8.09	30	
Bromodichloromethane	0.9100	0.15	1	0	91.0	70	130	0.86	5.65	30	
Bromoform	0.9700	0.15	1	0	97.0	70	130	0.99	2.04	30	
Bromomethane	1.360	0.15	1	0	136	70	130	1.24	9.23	30	S

Qualifiers:
- . Results reported are not blank corrected
- J Analyte detected below quantitation limit
- S Spike Recovery outside accepted recovery limits
- E Estimated Value above quantitation range
- ND Not Detected at the Limit of Detection
- H Holding times for preparation or analysis exceeded
- R RPD outside accepted recovery limits

CLIENT: Ravi Engineering & Land Surveying, P.C.
Work Order: C1703065
Project: 3130 Monroe

TestCode: 0.25CT-TCE-VC

Sample ID ALCS1UGD-032317 SampType: LCSD TestCode: 0.25CT-TCE- Units: ppbV Prep Date: RunNo: 12071
Client ID: ZZZZZ Batch ID: R12071 TestNo: TO-15 Analysis Date: 3/24/2017 SeqNo: 141147

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Carbon disulfide	0.8300	0.15	1	0	83.0	70	130	0.8	3.68	30	
Carbon tetrachloride	0.9200	0.040	1	0	92.0	70	130	0.87	5.59	30	
Chlorobenzene	0.9400	0.15	1	0	94.0	70	130	0.9	4.35	30	
Chloroethane	1.020	0.15	1	0	102	70	130	0.93	9.23	30	
Chloroform	0.9000	0.15	1	0	90.0	70	130	0.83	8.09	30	
Chloromethane	0.9800	0.15	1	0	98.0	70	130	1.25	24.2	30	
cis-1,2-Dichloroethene	0.7800	0.15	1	0	78.0	70	130	0.76	2.60	30	
cis-1,3-Dichloropropene	0.8000	0.15	1	0	80.0	70	130	0.78	2.53	30	
Cyclohexane	0.7500	0.15	1	0	75.0	70	130	0.76	1.32	30	
Dibromochloromethane	0.9300	0.15	1	0	93.0	70	130	0.89	4.40	30	
Ethyl acetate	0.7500	0.15	1	0	75.0	70	130	0.73	2.70	30	
Ethylbenzene	0.8600	0.15	1	0	86.0	70	130	0.84	2.35	30	
Freon 11	1.410	0.15	1	0	141	70	130	1.29	8.89	30	S
Freon 113	0.9100	0.15	1	0	91.0	70	130	0.85	6.82	30	
Freon 114	1.240	0.15	1	0	124	70	130	1.16	6.67	30	
Freon 12	1.160	0.15	1	0	116	70	130	1.03	11.9	30	
Heptane	0.7200	0.15	1	0	72.0	70	130	0.73	1.38	30	
Hexachloro-1,3-butadiene	1.150	0.15	1	0	115	70	130	1.11	3.54	30	
Hexane	0.7100	0.15	1	0	71.0	70	130	0.72	1.40	30	
Isopropyl alcohol	0.8800	0.15	1	0	88.0	70	130	0.77	13.3	30	
m&p-Xylene	1.750	0.30	2	0	87.5	70	130	1.72	1.73	30	
Methyl Butyl Ketone	0.7500	0.30	1	0	75.0	70	130	1.08	36.1	30	R
Methyl Ethyl Ketone	0.8700	0.30	1	0	87.0	70	130	0.83	4.71	30	
Methyl Isobutyl Ketone	0.7400	0.30	1	0	74.0	70	130	0.92	21.7	30	
Methyl tert-butyl ether	0.7600	0.15	1	0	76.0	70	130	0.7	8.22	30	
Methylene chloride	0.8100	0.15	1	0	81.0	70	130	0.78	3.77	30	
o-Xylene	0.8800	0.15	1	0	88.0	70	130	0.86	2.30	30	
Propylene	0.7200	0.15	1	0	72.0	70	130	0.72	0	30	
Styrene	0.8500	0.15	1	0	85.0	70	130	0.86	1.17	30	
Tetrachloroethylene	0.9800	0.15	1	0	98.0	70	130	0.92	6.32	30	
Tetrahydrofuran	0.7100	0.15	1	0	71.0	70	130	0.72	1.40	30	

Qualifiers:
- . Results reported are not blank corrected
- J Analyte detected below quantitation limit
- S Spike Recovery outside accepted recovery limits
- E Estimated Value above quantitation range
- ND Not Detected at the Limit of Detection
- H Holding times for preparation or analysis exceeded
- R RPD outside accepted recovery limits

CLIENT: Ravi Engineering & Land Surveying, P.C.
Work Order: C1703065
Project: 3130 Monroe

TestCode: 0.25CT-TCE-VC

Sample ID: ALCS1UGD-032317	SampType: LCSD	TestCode: 0.25CT-TCE-	Units: ppbV	Prep Date:	RunNo: 12071
Client ID: ZZZZZ	Batch ID: R12071	TestNo: TO-15		Analysis Date: 3/24/2017	SeqNo: 141147

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Toluene	0.8600	0.15	1	0	86.0	70	130	0.84	2.35	30	
trans-1,2-Dichloroethene	0.7900	0.15	1	0	79.0	70	130	0.76	3.87	30	
trans-1,3-Dichloropropene	0.7400	0.15	1	0	74.0	70	130	0.76	2.67	30	
Trichloroethene	0.9300	0.040	1	0	93.0	70	130	0.94	1.07	30	
Vinyl acetate	0.8600	0.15	1	0	86.0	70	130	0.86	2.30	30	
Vinyl Bromide	1.360	0.15	1	0	136	70	130	1.24	9.23	30	S
Vinyl chloride	1.030	0.040	1	0	103	70	130	0.91	12.4	30	

Sample ID: ALCS1UGD-032417	SampType: LCSD	TestCode: 0.25CT-TCE-	Units: ppbV	Prep Date:	RunNo: 12072
Client ID: ZZZZZ	Batch ID: R12072	TestNo: TO-15		Analysis Date: 3/24/2017	SeqNo: 141174

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
1,1,1-Trichloroethane	0.9400	0.15	1	0	94.0	70	130	0.91	3.24	30	
1,1,2,2-Tetrachloroethane	0.9500	0.15	1	0	95.0	70	130	0.94	1.06	30	
1,1,2-Trichloroethane	0.9600	0.15	1	0	96.0	70	130	0.94	2.11	30	
1,1-Dichloroethane	0.9000	0.15	1	0	90.0	70	130	0.82	9.30	30	
1,1-Dichloroethene	0.8800	0.15	1	0	88.0	70	130	0.81	8.28	30	
1,2,4-Trichlorobenzene	1.200	0.15	1	0	120	70	130	1.23	2.47	30	
1,2,4-Trimethylbenzene	0.9500	0.15	1	0	95.0	70	130	0.9	5.41	30	
1,2-Dibromoethane	0.9600	0.15	1	0	96.0	70	130	0.91	4.30	30	
1,2-Dichlorobenzene	1.080	0.15	1	0	108	70	130	1.04	3.77	30	
1,2-Dichloroethane	0.9600	0.15	1	0	96.0	70	130	0.89	8.70	30	
1,2-Dichloropropane	0.8700	0.15	1	0	87.0	70	130	0.81	7.14	30	
1,3,5-Trimethylbenzene	0.9700	0.15	1	0	97.0	70	130	0.93	4.21	30	
1,3-butadiene	0.8300	0.15	1	0	83.0	70	130	1.14	31.5	30	R
1,3-Dichlorobenzene	1.070	0.15	1	0	107	70	130	1.06	0.939	30	
1,4-Dichlorobenzene	1.120	0.15	1	0	112	70	130	1.07	4.57	30	
1,4-Dioxane	0.8700	0.30	1	0	87.0	70	130	0.89	2.27	30	
2,2,4-trimethylpentane	0.8300	0.15	1	0	83.0	70	130	0.81	2.44	30	
4-ethyltoluene	1.010	0.15	1	0	101	70	130	0.98	5.08	30	

Qualifiers:

- . Results reported are not blank corrected
- J Analyte detected below quantitation limit
- S Spike Recovery outside accepted recovery limits
- E Estimated Value above quantitation range
- ND Not Detected at the Limit of Detection
- H Holding times for preparation or analysis exceeded
- R RPD outside accepted recovery limits

CLIENT: Ravi Engineering & Land Surveying, P.C.
Work Order: C1703065
Project: 3130 Monroe

TestCode: 0.25CT-TCE-VC

Sample ID: ALCS1UGD-032417	SampType: LCSD	TestCode: 0.25CT-TCE-	Units: ppbV	Prep Date:	RunNo: 12072
Client ID: ZZZZZ	Batch ID: R12072	TestNo: TO-15		Analysis Date: 3/24/2017	SeqNo: 141174

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Acetone	0.9900	0.30	1	0	99.0	70	130	0.75	27.5	30	
Allyl chloride	0.7600	0.15	1	0	76.0	70	130	0.72	5.41	30	
Benzene	0.9400	0.15	1	0	94.0	70	130	0.88	6.59	30	
Benzyl chloride	0.6600	0.15	1	0	66.0	70	130	0.89	29.7	30	S
Bromodichloromethane	0.9300	0.15	1	0	93.0	70	130	0.92	1.08	30	
Bromoform	1.040	0.15	1	0	104	70	130	1.03	0.966	30	
Bromomethane	1.470	0.15	1	0	147	70	130	1.34	9.25	30	S
Carbon disulfide	0.9000	0.15	1	0	90.0	70	130	0.83	8.09	30	
Carbon tetrachloride	0.9700	0.040	1	0	97.0	70	130	0.96	1.04	30	
Chlorobenzene	0.9600	0.15	1	0	96.0	70	130	0.95	1.05	30	
Chloroethane	1.140	0.15	1	0	114	70	130	1.04	9.17	30	
Chloroform	0.9600	0.15	1	0	96.0	70	130	0.88	8.70	30	
Chloromethane	1.110	0.15	1	0	111	70	130	0.96	14.5	30	
cis-1,2-Dichloroethene	0.8500	0.15	1	0	85.0	70	130	0.77	9.88	30	
cis-1,3-Dichloropropene	0.8100	0.15	1	0	81.0	70	130	0.82	1.23	30	
Cyclohexane	0.8100	0.15	1	0	81.0	70	130	0.75	7.69	30	
Dibromochloromethane	0.9500	0.15	1	0	95.0	70	130	0.96	1.05	30	
Ethyl acetate	0.8500	0.15	1	0	85.0	70	130	0.75	12.5	30	
Ethylbenzene	0.9100	0.15	1	0	91.0	70	130	0.89	2.22	30	
Freon 11	1.790	0.15	1	0	179	70	130	1.24	36.3	30	SR
Freon 113	0.9900	0.15	1	0	99.0	70	130	0.89	10.6	30	
Freon 114	1.370	0.15	1	0	137	70	130	1.2	13.2	30	S
Freon 12	1.240	0.15	1	0	124	70	130	1.15	7.53	30	
Heptane	0.7300	0.15	1	0	73.0	70	130	0.73	0	30	
Hexachloro-1,3-butadiene	1.250	0.15	1	0	125	70	130	1.2	4.08	30	
Hexane	0.7900	0.15	1	0	79.0	70	130	0.72	9.27	30	
Isopropyl alcohol	0.9900	0.15	1	0	99.0	70	130	0.87	12.9	30	
m&p-Xylene	1.870	0.30	2	0	93.5	70	130	1.69	10.1	30	
Methyl Butyl Ketone	1.010	0.30	1	0	101	70	130	0.96	5.08	30	
Methyl Ethyl Ketone	0.9500	0.30	1	0	95.0	70	130	0.88	7.65	30	
Methyl Isobutyl Ketone	0.9200	0.30	1	0	92.0	70	130	0.96	4.26	30	

Qualifiers:

- `.` Results reported are not blank corrected
- J Analyte detected below quantitation limit
- S Spike Recovery outside accepted recovery limits
- E Estimated Value above quantitation range
- ND Not Detected at the Limit of Detection
- H Holding times for preparation or analysis exceeded
- R RPD outside accepted recovery limits

CLIENT: Ravi Engineering & Land Surveying, P.C.
Work Order: C1703065
Project: 3130 Monroe

TestCode: 0.25CT-TCE-VC

Sample ID ALCS1UG0-032417	SampType: LCSD	TestCode: 0.25CT-TCE-	Units: ppbV	Prep Date:	RunNo: 12072
Client ID: ZZZZZ	Batch ID: R12072	TestNo: TO-15		Analysis Date: 3/24/2017	SeqNo: 141174

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Methyl tert-butyl ether	0.8100	0.15	1	0	81.0	70	130	0.75	7.69	30	
Methylene chloride	0.8700	0.15	1	0	87.0	70	130	0.8	8.38	30	
o-Xylene	0.9600	0.15	1	0	96.0	70	130	0.91	5.35	30	
Propylene	0.7900	0.15	1	0	79.0	70	130	0.75	5.19	30	
Styrene	0.9000	0.15	1	0	90.0	70	130	0.9	0	30	
Tetrachloroethylene	1.040	0.15	1	0	104	70	130	1.01	2.93	30	
Tetrahydrofuran	0.7500	0.15	1	0	75.0	70	130	0.73	2.70	30	
Toluene	0.8900	0.15	1	0	89.0	70	130	0.86	3.43	30	
trans-1,2-Dichloroethene	0.8600	0.15	1	0	86.0	70	130	0.8	7.23	30	
trans-1,3-Dichloropropene	0.7900	0.15	1	0	79.0	70	130	0.75	5.19	30	
Trichloroethene	1.000	0.040	1	0	100	70	130	0.95	5.13	30	
Vinyl acetate	0.7300	0.15	1	0	73.0	70	130	0.68	18.6	30	
Vinyl Bromide	1.580	0.15	1	0	158	70	130	1.04	41.2	30	SR
Vinyl chloride	1.190	0.040	1	0	119	70	130	1.02	15.4	30	

Qualifiers:

.	Results reported are not blank corrected	E	Estimated Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limit	ND	Not Detected at the Limit of Detection	R	RPD outside accepted recovery limits
S	Spike Recovery outside accepted recovery limits				

Evaluate Continuing Calibration Report

Centek Laboratories, LLC

Data File : C:\HPCHEM\1\DATA\A0032302.D
Acq On : 23 Mar 2017 12:28 pm
Sample : A1UG_1.0
Misc : A312_1UG
MS Integration Params: RTEINT.P

Vial: 3
Operator: RJP
Inst : MSD #1
Multiplr: 1.00

Method : C:\HPCHEM\1\METHODS\A312_1UG.M (RTE Integrator)
Title : TO-15 VOA Standards for 5 point calibration
Last Update : Thu Mar 30 08:22:59 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
Max. RRF Dev : 30% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Bromochloromethane	1.000	1.000	0.0	76	0.00
2	T	Propylene	1.983	1.410	28.9	54	0.00
3	T	Freon 12	8.095	7.772	4.0	73	0.00
4	T	Chloromethane	1.208	1.068	11.6	64	0.00
5	T	Freon 114	6.032	6.310	-4.6	80	0.00
6	T	Vinyl Chloride	1.757	1.619	7.9	72	0.00
7	T	Butane	1.936	1.420	26.7	56	0.00
8	T	1,3-butadiene	1.227	1.188	3.2	75	0.00
9	T	Bromomethane	2.172	2.394	-10.2	87	0.00
10	T	Chloroethane	0.789	0.650	17.6	65	0.00
11	T	Ethanol	0.573	0.447	22.0	58	0.00
12	T	Acrolein	0.566	0.516	8.8	70	0.00
13	T	Vinyl Bromide	2.114	2.418	-14.4	90	0.00
14	T	Freon 11	7.471	8.549	-14.4	85	0.00
15	T	Acetone	0.820	0.617	24.8	57	0.00
16	T	Pentane	1.770	1.164	34.2#	51	0.00
17	T	Isopropyl alcohol	2.314	1.707	26.2	59	0.00
18	T	1,1-dichloroethene	1.573	1.118	28.9	56	0.00
19	T	Freon 113	3.434	2.733	20.4	61	0.00
20	t	t-Butyl alcohol	4.095	2.797	31.7#	52	0.00
21	T	Methylene chloride	1.519	1.092	28.1	54	0.00
22	T	Allyl chloride	2.189	2.085	4.8	72	0.00
23	T	Carbon disulfide	4.764	3.509	26.3	56	0.00
24	T	trans-1,2-dichloroethene	2.678	1.900	29.1	53	0.00
25	T	methyl tert-butyl ether	5.418	3.830	29.3	52	0.00
26	T	1,1-dichloroethane	3.249	2.326	28.4	53	0.00
27	T	Vinyl acetate	4.452	3.491	21.6	59	0.00
28	T	Methyl Ethyl Ketone	0.744	0.563	24.3	55	0.00
29	T	cis-1,2-dichloroethene	2.524	1.797	28.8	54	0.00
30	T	Hexane	2.417	1.855	23.3	59	0.00
31	T	Ethyl acetate	5.025	3.596	28.4	52	0.00
32	T	Chloroform	4.298	3.335	22.4	58	0.00
33	T	Tetrahydrofuran	1.787	1.328	25.7	57	0.00
34	T	1,2-dichloroethane	3.274	2.505	23.5	59	0.00
35	I	1,4-difluorobenzene	1.000	1.000	0.0	72	0.00
36	T	1,1,1-trichloroethane	1.029	0.816	20.7	55	0.00
37	T	Cyclohexane	0.561	0.402	28.3	53	0.00
38	T	Carbon tetrachloride	1.032	0.863	16.4	59	0.00
39	T	Benzene	1.029	0.804	21.9	56	0.00
40	T	Methyl methacrylate	0.497	0.360	27.6	52	0.00
41	T	1,4-dioxane	0.196	0.162	17.3	58	0.00
42	T	2,2,4-trimethylpentane	1.648	1.207	26.8	52	0.00
43	T	Heptane	0.629	0.454	27.8	52	0.00
44	T	Trichloroethene	0.447	0.383	14.3	59	0.00
45	T	1,2-dichloropropane	0.393	0.298	24.2	55	0.00
46	T	Bromodichloromethane	0.981	0.823	16.1	59	0.00
47	T	cis-1,3-dichloropropene	0.667	0.477	28.5	51	0.00
48	T	trans-1,3-dichloropropene	0.662	0.474	28.4	50	0.00
49	T	1,1,2-trichloroethane	0.428	0.357	16.6	58	0.00

(#) = Out of Range

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\AO032402.D Vial: 2
Acq On : 24 Mar 2017 9:17 am Operator: RJP
Sample : A1UG_1.0 Inst : MSD #1
Misc : A312_1UG Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : C:\HPCHEM\1\METHODS\A312_1UG.M (RTE Integrator)
Title : TO-15 VOA Standards for 5 point calibration
Last Update : Thu Mar 30 08:22:59 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
Max. RRF Dev : 30% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Bromochloromethane	1.000	1.000	0.0	56	0.00
2	T	Propylene	1.983	1.469	25.9	41#	0.00
3	T	Freon 12	8.095	9.766	-20.6	67	0.00
4	T	Chloromethane	1.208	1.177	2.6	52	0.00
5	T	Freon 114	6.032	7.317	-21.3	68	0.00
6	T	Vinyl Chloride	1.757	1.899	-8.1	62	0.00
7	T	Butane	1.936	1.773	8.4	51	0.00
8	T	1,3-butadiene	1.227	1.490	-21.4	68	0.00
9	T	Bromomethane	2.172	2.778	-27.9	74	0.00
10	T	Chloroethane	0.789	0.837	-6.1	62	0.00
11	T	Ethanol	0.573	0.509	11.2	49#	0.00
12	T	Acrolein	0.566	0.588	-3.9	58	0.00
13	T	Vinyl Bromide	2.114	2.297	-8.7	63	0.00
14	T	Freon 11	7.471	9.274	-24.1	67	0.00
15	T	Acetone	0.820	0.703	14.3	48#	0.00
16	T	Pentane	1.770	1.292	27.0	42#	0.00
17	T	Isopropyl alcohol	2.314	2.183	5.7	55	0.01
18	T	1,1-dichloroethene	1.573	1.306	17.0	48#	0.00
19	T	Freon 113	3.434	3.195	7.0	52	0.00
20	t	t-Butyl alcohol	4.095	3.091	24.5	42#	0.00
21	T	Methylene chloride	1.519	1.242	18.2	45#	0.00
22	T	Allyl chloride	2.189	1.550	29.2	39#	0.00
23	T	Carbon disulfide	4.764	4.041	15.2	47#	0.00
24	T	trans-1,2-dichloroethene	2.678	2.244	16.2	46#	0.00
25	T	methyl tert-butyl ether	5.418	4.174	23.0	42#	0.00
26	T	1,1-dichloroethane	3.249	2.772	14.7	46#	0.00
27	T	Vinyl acetate	4.452	3.949	11.3	49#	0.00
28	T	Methyl Ethyl Ketone	0.744	0.649	12.8	47#	0.02
29	T	cis-1,2-dichloroethene	2.524	2.090	17.2	46#	0.00
30	T	Hexane	2.417	1.836	24.0	43#	0.01
31	T	Ethyl acetate	5.025	4.054	19.3	43#	0.00
32	T	Chloroform	4.298	3.871	9.9	50#	0.00
33	T	Tetrahydrofuran	1.787	1.324	25.9	41#	0.01
34	T	1,2-dichloroethane	3.274	2.963	9.5	51	0.00
35	I	1,4-difluorobenzene	1.000	1.000	0.0	54	0.01
36	T	1,1,1-trichloroethane	1.029	0.931	9.5	48#	0.00
37	T	Cyclohexane	0.561	0.431	23.2	43#	0.00
38	T	Carbon tetrachloride	1.032	0.962	6.8	49#	0.00
39	T	Benzene	1.029	0.895	13.0	47#	0.00
40	T	Methyl methacrylate	0.497	0.410	17.5	45#	0.00
41	T	1,4-dioxane	0.196	0.182	7.1	50#	0.00
42	T	2,2,4-trimethylpentane	1.648	1.316	20.1	43#	0.00
43	T	Heptane	0.629	0.469	25.4	41#	0.00
44	T	Trichloroethene	0.447	0.425	4.9	50	0.00
45	T	1,2-dichloropropane	0.393	0.320	18.6	45#	0.00
46	T	Bromodichloromethane	0.981	0.884	9.9	48#	0.00
47	T	cis-1,3-dichloropropene	0.667	0.529	20.7	43#	0.00
48	T	trans-1,3-dichloropropene	0.662	0.500	24.5	40#	0.00
49	T	1,1,2-trichloroethane	0.428	0.397	7.2	49#	0.00

(#) = Out of Range

Appendix C

Validator Qualifications

KENNETH R. APPLIN
Geochemist/Data Validator

Ph.D., Geochemistry and Mineralogy, The Pennsylvania State University

M.S., Geochemistry and Mineralogy, The Pennsylvania State University

B.A., Geological Sciences, SUNY at Geneseo, NY

Dr. Applin has over 35 years of experience working with the geochemistry of natural waters. His prior experience includes working as an Assistant Professor of Geology at the University of Missouri-Columbia and as Chief Hydrogeologist and Geochemist with a leading engineering firm in Rochester, NY. In 1993, he established KR Applin and Associates, a small consulting business that focuses on the geochemistry of natural waters, especially as applied to problems involving the contamination of groundwater and surface water.

Dr. Applin is also an experienced analytical data validator and has provided data validation services since 1994 to a variety of clients performing brownfield cleanup projects, hazardous waste remediation, groundwater monitoring at solid waste facilities, and other projects requiring third-party data validation. Dr. Applin has several years of hands-on experience with the laboratory analysis of natural waters and has successfully completed the USEPA Region II certification courses for performing inorganic and organic analytical data validation.

MICHAEL K. PERRY
Chemist/Data Validator

B.S. Chemistry, Georgia State University, Atlanta, GA

A.A.S., Chemical Technology, Alfred State College, Alfred, NY

Mr. Perry has over 30 years of experience in the analytical laboratory business. During his early career, he spent several years as a laboratory analyst performing the analysis of soil, water, and air samples for inorganic and organic chemical parameters. During his last 20 years in the environmental laboratory business, he managed and directed two major analytical laboratories in Rochester, NY. His management responsibilities included oversight of the daily operations of the lab, staff training and supervision, the selection, purchase, and maintenance of analytical instruments, the introduction of new laboratory methods, analytical quality assurance and quality control, data acquisition and management, and other business-related activities.

Mr. Perry has an extensive working knowledge of the methods and procedures used for sampling and analyzing both inorganic and organic analytes in soil, water, and air. He is an accomplished laboratory chemist and is familiar with the analytical methods and procedures established under the USEPA Contract Laboratory Protocols (CLP), the NYSDEC Analytical Services Protocols (ASP), and the NYSDOH Environmental Laboratory Approval Program (ELAP).

DATA USABILITY SUMMARY REPORT (DUSR)

3130 Monroe Ave.
Rochester, NY
NYSDEC BCP # C 828109

SDG: C1712024

3 Air Samples

Prepared for:

Ravi Engineering & Land Surveying, P.C.
2110 South Clinton Avenue, Suite 1
Rochester, NY 14618

January 2018

EDU Environmental Data Usability 10028 Deer Park Dr. Dansville, NY 14437 585.991.9156

REVIEWER'S NARRATIVE
SDG C1712024

The data associated with this Sample Delivery Group (SDG) C1712024, analyzed by Centek Laboratories, LLC Syracuse, NY have been reviewed in accordance with assessment criteria provided by the New York State Department of Environmental Conservation following the review procedures provided in the USEPA Functional Guidelines for evaluating organic and inorganic data.

All analytical results reported by the laboratory are considered valid and acceptable except results that have been qualified as rejected, "R". Results qualified as estimated "J", or as non-detects, "U", are considered usable for the purpose of evaluating water and/or soil quality. However, these qualifiers indicate that the accuracy and/or precision of the analytical result is questionable. A summary of all data that have been qualified and the reasons for qualification are provided in the following data usability summary report (DUSR).

Two facts should be noted by all data users. First, the "R" qualifier means that the associated value is unusable. In other words, due to significant quality control (QC) problems, the analysis is invalid and provides no information as to whether the analyte is present or not. Values qualified with an "R" should not appear on the final data tables because they cannot be relied upon, even as the last resort. Second, no analyte concentration, even if it has passed all QC tests, is guaranteed to be accurate. Strict QC serves to increase confidence in data, but any value potentially contains error.

Reviewer's Signature: Michael K. Perry Date: 1/25/18

Michael K. Perry
Chemist

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Tables

1.0 SUMMARY

SITE:	3130 Monroe Avenue Rochester, NY
SAMPLING DATE:	December 05, 2017
SAMPLE TYPE:	3 air samples
LABORATORY:	Centek Laboratories, LLC Syracuse, NY
SDG No.:	C1712024

2.0 INTRODUCTION

This data usability summary report (DUSR) was prepared in accordance with guidance provided by the New York State Department of Environmental Conservation (NYSDEC). The DUSR is based on a review and evaluation of the laboratory analytical data package. Specifically, the NYSDEC guidance recommends review and evaluation of the following elements of the data package:

- Completeness of the data package as defined under the requirements of the NYSDEC Analytical Services Protocols (ASP) Category B or the United States Environmental Protection Agency (USEPA) Contract Laboratory Program (CLP) deliverables,
- Compliance with established analyte holding times,
- Adherence to quality control (QC) limits and specifications for blanks, instrument tuning and calibration, surrogate recoveries, spike recoveries, laboratory duplicate analyses, and other QC criteria,
- Adherence to established analytical protocols,
- Conformance of data summary sheets with raw analytical data, and
- Use of correct data qualifiers.

Data deficiencies, analytical protocol deviations, and quality control problems identified using the review criteria above and their effect on the analytical results are discussed in this report.

3.0 SAMPLE AND ANALYSIS SUMMARY

The data package consists of analytical results for 3 air samples collected on December 05, 2017. These samples were analyzed for TO-15 volatile organic compounds.

All laboratory analyses were performed by Centek Laboratories, LLC, Syracuse, NY and analyzed as SDG C1712024. The analytical results were provided in NYSDEC ASP Category B format, which includes all raw analytical data and laboratory QC data.

4.0 GUIDANCE DOCUMENTS AND DATA REVIEW CRITERIA

The guidance documents used for reviewing laboratory quality control (QC) data and assigning data qualifiers (flags) to analytical results are listed in Table 4-1. The QC limits established in the documents applicable to this data review were used to assess the quality of the analytical results. In some cases, however, QC limits established internally by the laboratory were taken into account to determine data quality.

The QC criteria considered for assessing the usability of the reported analytical results provided for each analyte type (i.e. VOCs, SVOCs, metals, etc.) are listed in Table 4-2. These criteria may vary with the analytical method utilized by the laboratory. These criteria comply with the guidance recommended in Section 2.0 above.

5.0 DATA VALIDATION QUALIFIERS

The letter qualifiers (flags) used to define data usability are described briefly below. These letters are assigned by the data validator to analytical results having questionable accuracy and/or precision as determined by reviewing the laboratory QC data associated with the analytical results.

TABLE 4-1

DATA VALIDATION GUIDANCE DOCUMENTS

Analyte Type	Validation Guidance
VOCs	USEPA, 2008, Validating Volatile Organic Compounds By Gas Chromatography/Mass Spectrometry; SW-846 Method 8260B; SOP # HW-24, Rev. 2. USEPA, 2008, Statement of Work for Organic Analysis of Low/Medium Concentration of Volatile Organic Compounds SOM01.2; SOP HW-33, Rev. 2.
SVOCs	USEPA, 2007, Statement of Work for Organic Analysis of Low/Medium Concentration of Semivolatile Organic Compounds SOM01.2; SOP HW-35, Rev. 1.
Pesticides/PCBs	USEPA, 2006, CLP Organics Data Review and Preliminary Review (CLP/SOW OLMO 4.3); SOP # HW-6, Rev. 14, Part C.
Metals	USEPA, 2006, Validation of Metals for the Contract Laboratory Program (CLP) based on SOW ILMO 5.3 (SOP Revision 13), SOP # HW-2, Rev. 13.
Gen Chemistry	NYSDEC, 2005, Analytical Services Protocols (ASP)
VOCs (Ambient air)	USEPA, 2006, Validating Air Samples, Volatile Organic Analysis of Ambient Air in Canister by Method TO-15; SOP # HW-31, Rev. 4.

TABLE 4-2

QUALITY CONTROL CRITERIA USED FOR VALIDATING
LABORATORY ANALYTICAL DATA

VOCs	SVOCs	Pesticides/PCBs	Metals	Gen Chemistry	Method TO-15
Completeness of Pkg	Completeness of Pkg	Completeness of Pkg	Completeness of Pkg	Completeness of Pkg	Completeness of Pkg
Sample Condition	Sample Condition	Sample Condition	Sample Condition	Sample Condition	Sample Condition
Holding Time	Holding Time	Holding Time	Holding Time	Holding Times	Holding Time
System Monitoring Compounds	Surrogate Recoveries	Surrogate Recoveries	Initial/Continuing Calibration	Calibration	Canister Certification
Lab Control Sample	Lab Control Sample	Matrix Spikes	CRDL Standards	Lab Control Samples	Lab Control Sample
Matrix Spikes	Matrix Spikes	Blanks	Blanks	Blanks	Instrument Tuning
Blanks	Blanks	Instrument Calibration & Verification	Interference Check Sample	Spike Recoveries	Blanks
Instrument Tuning	Instrument Tuning	Analyte ID	Spike Recoveries	Lab Duplicates	Initial Calibration & System Performance
Internal Standards	Internal Standards	Lab Qualifiers	Lab Duplicate		Daily Calibration
Initial Calibration	Initial Calibration	Field Duplicate	Lab Control Sample		Field Duplicate
Continuing Calibration	Continuing Calibration		ICP Serial Dilutions		
Lab Qualifiers	Lab Qualifiers		Lab Qualifiers		
Field Duplicate	Field Duplicate		Field Duplicate		

The laboratory may also use various letters and symbols to flag analytical results generated when QC limits were exceeded. The meanings of these flags may differ from those used by the independent data validator. Those used by the laboratory are provided with the analytical results.

NOTE: The assignment of data qualifiers by the data reviewer (validator) to laboratory analytical results should not necessarily be interpreted by the data user as a measure of laboratory ability or proficiency. Rather, the qualifiers are intended to provide a measure of data accuracy and precision to the data user, which, for example, may provide a level of confidence in determining whether or not standards or cleanup objectives have been met.

U The analyte was analyzed for but was not detected at or above the sample quantitation limit.

J The analyte was positively identified; the associated numerical value is the *approximate* concentration of the analyte in the sample. (The magnitude of any ± value associated with the result is not determined by data validation).

UJ The analyte was not detected above the reported sample quantitation limit. However, the reported quantitation limit is *approximate* and may or may not represent the actual limit of quantitation necessary to accurately and precisely measure the analyte in the sample.

R The sample result is rejected (i.e., is unusable) due to serious deficiencies in the ability to analyze the sample and meet quality control criteria. The presence or absence of the analyte cannot be verified.

N The analysis indicates the presence of an analyte for which there is presumptive evidence to make a "tentative identification".

JN The analyte is considered to be "presumptively present." The associated numerical value represents its *approximate* concentration.

The validated analytical results are attached to this report. Validation qualifiers (flags) are indicated using red ink. Data sheets having qualified data are signed and dated by the data reviewer.

6.0 RESULTS OF THE DATA REVIEW

The results of the data review are summarized in Table 6-1. The table lists the samples where QC criteria were found to exceed acceptable limits and the actions taken to qualify the associated analytical results.

7.0 TOTAL USABLE DATA

For SDG C1712024, three samples were analyzed and results were reported for 192 analyses. Even though some results were flagged with a "J" as estimated, all results (100%) are considered usable. See the summary table for the flagged analytes and the associated QC reasons.

Table 6-1 TO-15

SAMPLES AFFECTED	ANALYTES	ACTION	QC VIOLATION	COMMENTS
All undiluted samples	Hexachlorobutadiene 1,1,1,2-Tetrachloroethane 1,2-Dichlorobenzene 1,4-Dichlorobenzene	J detects	LCS >130 %	Detected results are estimated
All undiluted samples	Hexachlorobutadiene	J detects/UJ non-detects	CCV > 30 %	Results are estimated

ACRONYMS

BSP	Blank Spike
CCAL	Continuing Calibration
CCB	Continuing Calibration Blank
CCV	Continuing Calibration Verification
CRDL	Contract Required Detection Limit
CRQL	Contract Required Quantitation Limit
%D	Percent Difference
ICAL	Initial Calibration
ICB	Initial Calibration Blank
IS	Internal Standard
LCS	Laboratory Control Sample
MS/MSD	Matrix Spike/Matrix Spike Duplicate
QA	Quality Assurance
QC	Quality Control
%R	Percent recovery
RPD	Relative Percent Difference
RRF	Relative Response Factor
%RSD	Percent Relative Standard Deviation
TAL	Target Analyte List (metals)
TCL	Target Compound List (organics)

Appendix A

Validated Analytical Results

CENTEK LABORATORIES, LLC

Date: *08-Jan-18*

CLIENT: Ravi Engineering & Land Surveying, P.C.
Project: 3130 Monroe Ave
Lab Order: C1712024

CASE NARRATIVE

Samples were analyzed using the methods outlined in the following references:

Centek Laboratories, LLC SOP TS-80
Compendium of Methods for the Determination of Toxic Organic Compounds, Compendium Method TO-15, January 1999

All method blanks, laboratory spikes, and/or matrix spikes met quality assurance objective except as indicated in the corrective action report(s). All samples were received and analyzed within the EPA recommended holding times. Test results are not Method Blank (MB) corrected for contamination.

NYSDEC ASP samples:
Canisters should be evacuated to a reading of less than or equal to 50 millitorr prior to shipment to sampling personnel. The vacuum in the canister will be field checked prior to sampling, and must read 28" of Hg (±2", vacuum, absolute) before a sample can be collected. After the sample has been collected, the pressure of the canister will be read and recorded again, and must be 5" of Hg (±1", vacuum, absolute) for the sample to be valid. Once received at the laboratory, the canister vacuum should be confirmed to be 5" of Hg,±1". Please record and report the pressure/vacuum of received canisters on the sample receipt paperwork. A pressure/vacuum reading should also be taken just prior to the withdrawal of sample from the canister, and recorded on the sample preparation log sheet. All regulators are calibrated to meet these requirements before they leave the laboratory. However, due to environmental conditions and use of the equipment Centek can not guarantee that this criteria can always be achieved.

See Corrective Action: [3630] CC did not meet criteria.

Centek Laboratories, LLC

Corrective Action Report

Date Initiated: 08-Dec-17

Initiated By: Russell Pellegrino

Corrective Action Report ID: 3630

Department: MSVOA

Corrective Action Description

CAR Summary: CC did not meet criteria.

Description of Nonconformance Root/Cause(s): Continuing calibration did not meet criteria on 12/6//17 for ~~hexachlorocyclopentdiene~~ hexachlorobutadiene. The compound was more sensitive in the CC. The compounds in question was not found in the associated samples at a trace amount.

Description of Corrective Action w/Proposed C.A.: Since the compounds of interest was found in the associated sample, sample results should be considered bias high. If compounds remain outside criteria perform system calibration. All sets of data submitted.

Performed By: Russell Pellegrino

Completion Date: 09-Dec-17

Client Notification

Client Notification Required: No

Notified By:

Comment:

Quality Assurance Review

Nonconformance Type: Deficiency

Further Action required by QA: Recalibrate the system ASAP if compound remains outside criteria. Monitoring of all quality control remains post initial calibration. All sets of data submitted.

Approval and Closure

Technical Director / Deputy Tech. Dir.: William Dobbin

Close Date: 12-Dec-17

QA Officer Approval: Nick Scala

QA Date: 11-Dec-17

Last Updated BY russ

Updated: 08-Jan-2018 1:49 PM

Reported: 08-Jan-2018 1:49 PM

CENTEK LABORATORIES, LLC

Date: 08-Jan-18

CLIENT: Ravi Engineering & Land Surveying, P.C.
Project: 3130 Monroe Ave
Lab Order: C1712024

Work Order Sample Summary

Lab Sample ID	Client Sample ID	Tag Number	Collection Date	Date Received
C1712024-001A	AS-1-20171205	1191.1167	12/5/2017	12/8/2017
C1712024-002A	AS-2-20171205	460.310		12/8/2017
C1712024-003A	OS-1-20171205	95.272		12/8/2017

Centek Labs - Chain of Custody

Centek Laboratories
143 Midler Park Drive
Syracuse, NY 13206
315-431-9730
www.CentekLabs.com
Vapor Intrusion & IAQ

Site Name: 3130 Monroe Ave
Project: NYSDEC C-828109
PO#: 4515042-OP
Quote #: Q-3P
Canister Order #: 6403

Detection Limit	Report Level
☐ 5ppbv	☐ Level I
☐ 1ug/M3	☐ Level II
☑ 1ug/M3 +TCE .25	☑ Cat "B" Like

TAT Turnaround Time:	Check One	Rush TAT Surcharge %	Due Date:
5 Business Days	☒	0%	
4 Business Days	☐	25%	
3 Business Days	☐	50%	
2 Business Days	☐	75%	
*Next Day by 5pm	☐	100%	
*Next Day by Noon	☐	150%	
*Same Day	☐	200%	

*For Same and Next Day TAT Please Notify Lab

Company: Arvi Engineering
Report to:
Address: 2110 S. Clinton Ave
City, State, Zip: Rochester, NY 14618 Suite 1
Email: lzicari@ravieng.com
Phone: 585-697-2071

Company:
Check Here if Same: ☑
Invoice to:
Address:
City, State, Zip
Email:
Phone:

Sample ID	Date Sampled	Canister Number	Regulator Number	Analysis Request	Field Vacuum Start / Stop	Labs Vacuum** Rec'd/Analysis	Comments
AS-1-20171205	12/5/17	1191	1167	TO-15	29.5 / 3.0	-3 / -3	Bien Eyeglass
AS-2-20171205	↓	460	310	↓	29.5 / 1.0	-1 / -1	Nail Scrape
OS-1-20171205	↓	95	272	↓	30 / 2.5	-3 / -3	Outdoors
					/	/	
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Chain of Custody	Print Name	Signature	Date/Time
Sampled by:	Lynn Zicari	Lynn Zicari	12/05/17
Relinquished by:			
Received at Lab by:	Nic Mandolino		12-8-17

Courier: CIRCLE ONE
FedEx UPS Pickup/Dropoff

**For LAB USE ONLY
Work Order # C1772024

** By signing Centek Labs Chain of Custody, you are accepting Centek Labs Terms and Conditions listed on the reverse side.

Centek Laboratories, LLC

CLIENT: Ravi Engineering & Land Surveying, P.C. **Date:** 03-Jan-18

Lab Order: C1712024 **Client Sample ID:** AS-1-20171205

Project: 3130 Monroe Ave **Tag Number:** 1191.1167

Lab ID: C1712024-001A **Collection Date:** 12/5/2017

Matrix: AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
FIELD PARAMETERS		FLD				Analyst:
Lab Vacuum In	-3			"Hg		12/8/2017
Lab Vacuum Out	-30			"Hg		12/8/2017
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC		TO-15				Analyst: RJP
1,1,1-Trichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,1,2,2-Tetrachloroethane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,1,2-Trichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,1-Dichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,1-Dichloroethene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,2,4-Trichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,2,4-Trimethylbenzene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,2-Dibromoethane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,2-Dichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,2-Dichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,2-Dichloropropane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,3,5-Trimethylbenzene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,3-butediene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,3-Dichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,4-Dichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
1,4-Dioxane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
2,2,4-trimethylpentane	< 0.30	0.30		ppbV	1	12/8/2017 9:25:00 PM
4-ethyltoluene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Acetone	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Allyl chloride	700	240		ppbV	1	12/8/2017 9:25:00 PM
Benzene	< 0.15	0.15		ppbV	810	12/11/2017 3:54:00 PM
Benzyl chloride	0.29	0.15		ppbV	1	12/8/2017 9:25:00 PM
Bromodichloromethane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Bromoform	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Bromomethane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Carbon disulfide	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Carbon tetrachloride	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Chlorobenzene	0.090	0.040		ppbV	1	12/8/2017 9:25:00 PM
Chloroethane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Chloroform	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Chloromethane	0.17	0.15		ppbV	1	12/8/2017 9:25:00 PM
cis-1,2-Dichloroethane	0.59	0.15		ppbV	1	12/8/2017 9:25:00 PM
cis-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Cyclohexane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Dibromochloromethane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Ethyl acetate	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
	76	6.0		ppbV	40	12/8/2017 11:58:00 PM

Qualifiers:

**	Quantitation Limit
B	Analyte detected in the associated Method Blank
H	Holding times for preparation or analysis exceeded
JN	Non-routine analyte. Quantitation estimated.
S	Spike Recovery outside accepted recovery limits
.	Results reported are not blank corrected
E	Estimated Value above quantitation range
J	Analyte detected below quantitation limit
ND	Not Detected at the Limit of Detection

Centek Laboratories, LLC

CLIENT: Ravi Engineering & Land Surveying, P.C.
Date: 03-Jan-18

Lab Order: C1712024
Client Sample ID: AS-I-20171205

Project: 3130 Monroe Ave
Tag Number: 1191.1167

Lab ID: C1712024-001A
Collection Date: 12/5/2017

Matrix: AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC		**TO-15**				Analyst: RJP
Ethylbenzene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Freon 11	0.24	0.15		ppbV	1	12/8/2017 9:25:00 PM
Freon 113	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Freon 114	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Freon 12	0.51	0.15		ppbV	1	12/8/2017 9:25:00 PM
Heptane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Hexachloro-1,3-butadiene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Hexane	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Isopropyl alcohol	100	12		ppbV	81	12/11/2017 3:17:00 PM
m&p-Xylene	0.14	0.30	J	ppbV	1	12/8/2017 9:25:00 PM
Methyl Butyl Ketone	< 0.30	0.30		ppbV	1	12/8/2017 9:25:00 PM
Methyl Ethyl Ketone	0.64	0.30		ppbV	1	12/8/2017 9:25:00 PM
Methyl Isobutyl Ketone	< 0.30	0.30		ppbV	1	12/8/2017 9:25:00 PM
Methyl tert-butyl ether	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Methylene chloride	0.32	0.15		ppbV	1	12/8/2017 9:25:00 PM
o-Xylene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Propylene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Styrene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Tetrachloroethylene	6.2	1.5		ppbV	10	12/8/2017 11:22:00 PM
Tetrahydrofuran	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Toluene	3.1	1.5		ppbV	10	12/8/2017 11:22:00 PM
trans-1,2-Dichloroethene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
trans-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Trichloroethene	0.12	0.040		ppbV	1	12/8/2017 9:25:00 PM
Vinyl acetate	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Vinyl Bromide	< 0.15	0.15		ppbV	1	12/8/2017 9:25:00 PM
Vinyl chloride	< 0.040	0.040		ppbV	1	12/8/2017 9:25:00 PM
Surr: Bromofluorobenzene	82.0	70-130		%REC	1	12/8/2017 9:25:00 PM

MKF 1/11/18

Qualifiers:

**	Quantitation Limit
B	Analyte detected in the associated Method Blank
H	Holding times for preparation or analysis exceeded
JN	Non-routine analyte. Quantitation estimated.
S	Spike Recovery outside accepted recovery limits
-	Results reported are not blank corrected
E	Estimated Value above quantitation range
J	Analyte detected below quantitation limit
ND	Not Detected at the Limit of Detection

Centek Laboratories, LLC

CLIENT: Ravi Engineering & Land Surveying, P.C. **Date:** 03-Jan-18

Lab Order: C1712024 **Client Sample ID:** AS-2-20171205

Project: 3130 Monroe Ave **Tag Number:** 460.310

Lab ID: C1712024-002A **Collection Date:**

Analyses **Matrix:** AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
FIELD PARAMETERS						Analyst:
Lab Vacuum In	-1	FLD		"Hg		12/8/2017
Lab Vacuum Out	-30			"Hg		12/8/2017
1UG/M3 WI 0.2UG/M3 CT-TCE-VC		TO-15				Analyst: RJP
1,1,1-Trichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,1,2,2-Tetrachloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,1,2-Trichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,1-Dichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,1-Dichloroethene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,2,4-Trichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,2,4-Trimethylbenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,2-Dibromoethane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,2-Dichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,2-Dichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,2-Dichloropropane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,3,5-Trimethylbenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,3-butadiene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,3-Dichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,4-Dichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
1,4-Dioxane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
2,2,4-trimethylpentane	< 0.30	0.30		ppbV	1	12/8/2017 10:05:00 PM
4-ethyltoluene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Acetone	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Allyl chloride	3700	730		ppbV	2430	12/11/2017 5:47:00 PM
Benzene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Benzyl chloride	0.48	0.15		ppbV	1	12/8/2017 10:05:00 PM
Bromodichloromethane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Bromoform	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Bromomethane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Carbon disulfide	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Carbon tetrachloride	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Chlorobenzene	0.090	0.040		ppbV	1	12/8/2017 10:05:00 PM
Chloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Chloroform	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Chloromethane	0.46	0.15		ppbV	1	12/8/2017 10:05:00 PM
cis-1,2-Dichloroethene	0.97	0.15		ppbV	1	12/8/2017 10:05:00 PM
cis-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Cyclohexane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Dibromochloromethane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Ethyl acetate	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
	150	36		ppbV	243	12/11/2017 5:10:00 PM

Qualifiers:

- ****** Quantitation Limit
- **B** Analyte detected in the associated Method Blank
- **H** Holding times for preparation or analysis exceeded
- **JN** Non-routine analyte. Quantitation estimated.
- **S** Spike Recovery outside accepted recovery limits
- **.** Results reported are not blank corrected
- **E** Estimated Value above quantitation range
- **J** Analyte detected below quantitation limit
- **ND** Not Detected at the Limit of Detection

Centek Laboratories, LLC

CLIENT: Ravi Engineering & Land Surveying, P.C. **Date:** 03-Jan-18

Lab Order: C1712024 **Client Sample ID:** AS-2-20171205

Project: 3130 Monroe Ave **Tag Number:** 460.310

Lab ID: C1712024-002A **Collection Date:**

Matrix: AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC		**TO-15**				Analyst: RJP
Ethylbenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Freon 11	0.22	0.15		ppbV	1	12/8/2017 10:05:00 PM
Freon 113	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Freon 114	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Freon 12	0.50	0.15		ppbV	1	12/8/2017 10:05:00 PM
Heptane	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Hexachloro-1,3-butadiene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Hexane	0.10	0.15	J	ppbV	1	12/8/2017 10:05:00 PM
Isopropyl alcohol	580	360		ppbV	2430	12/11/2017 5:47:00 PM
m&p-Xylene	0.16	0.30	J	ppbV	1	12/8/2017 10:05:00 PM
Methyl Butyl Ketone	< 0.30	0.30		ppbV	1	12/8/2017 10:05:00 PM
Methyl Ethyl Ketone	0.89	0.30		ppbV	1	12/8/2017 10:05:00 PM
Methyl Isobutyl Ketone	< 0.30	0.30		ppbV	1	12/8/2017 10:05:00 PM
Methyl tert-butyl ether	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Methylene chloride	0.65	0.15		ppbV	1	12/8/2017 10:05:00 PM
o-Xylene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Propylene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Styrene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Tetrachloroethylene	8.1	1.5		ppbV	10	12/9/2017 12:35:00 AM
Tetrahydrofuran	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Toluene	7.0	1.5		ppbV	10	12/9/2017 12:35:00 AM
trans-1,2-Dichloroethene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
trans-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Trichloroethene	0.31	0.040		ppbV	1	12/8/2017 10:05:00 PM
Vinyl acetate	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Vinyl Bromide	< 0.15	0.15		ppbV	1	12/8/2017 10:05:00 PM
Vinyl chloride	< 0.040	0.040		ppbV	1	12/8/2017 10:05:00 PM
Surr: Bromofluorobenzene	83.0	70-130		%REC	1	12/8/2017 10:05:00 PM

Qualifiers:

**	Quantitation Limit
B	Analyte detected in the associated Method Blank
H	Holding times for preparation or analysis exceeded
JN	Non-routine analyte. Quantitation estimated.
S	Spike Recovery outside accepted recovery limits
-	Results reported are not blank corrected
E	Estimated Value above quantitation range
J	Analyte detected below quantitation limit
ND	Not Detected at the Limit of Detection

mwp 1/11/18

Centek Laboratories, LLC

Date: 03-Jan-18

CLIENT: Ravi Engineering & Land Surveying, P.C.
Client Sample ID: OS-1-20171205
Lab Order: C1712024
Tag Number: 95272
Project: 3130 Monroe Ave
Collection Date:
Lab ID: C1712024-003A
Matrix: AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
FIELD PARAMETERS		FLD				Analyst:
Lab Vacuum In	-3			"Hg		12/8/2017
Lab Vacuum Out	-30			"Hg		12/8/2017
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC		TO-15				Analyst: RJP
1,1,1-Trichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,1,2,2-Tetrachloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,1,2-Trichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,1-Dichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,1-Dichloroethene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,2,4-Trichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,2,4-Trimethylbenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,2-Dibromoethane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,2-Dichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,2-Dichloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,2-Dichloropropane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,3,5-Trimethylbenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,3-butadiene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,3-Dichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,4-Dichlorobenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
1,4-Dioxane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
2,2,4-trimethylpentane	< 0.30	0.30		ppbV	1	12/8/2017 10:45:00 PM
4-ethyltoluene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Acetone	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Allyl chloride	15	3.0		ppbV	10	12/9/2017 1:46:00 AM
Benzene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Benzyl chloride	0.19	0.15		ppbV	1	12/8/2017 10:45:00 PM
Bromodichloromethane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Bromoform	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Bromomethane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Carbon disulfide	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Carbon tetrachloride	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Chlorobenzene	0.10	0.040		ppbV	1	12/8/2017 10:45:00 PM
Chloroethane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Chloroform	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Chloromethane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
cis-1,2-Dichloroethene	0.46	0.15		ppbV	1	12/8/2017 10:45:00 PM
cis-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Cyclohexane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Dibromochloromethane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Ethyl acetate	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
	0.30	0.15		ppbV	1	12/8/2017 10:45:00 PM

Qualifiers:

- ** Quantitation Limit
- B Analyte detected in the associated Method Blank
- H Holding times for preparation or analysis exceeded
- JN Non-routine analyte. Quantitation estimated.
- S Spike Recovery outside accepted recovery limits
- Results reported are not blank corrected
- E Estimated Value above quantitation range
- J Analyte detected below quantitation limit
- ND Not Detected at the Limit of Detection

Centek Laboratories, LLC

Date: *03-Jan-18*

CLIENT: Ravi Engineering & Land Surveying, P.C.
Lab Order: C1712024
Project: 3130 Monroe Ave
Lab ID: C1712024-003A

Client Sample ID: OS-1-20171205
Tag Number: 95,272
Collection Date:
Matrix: AIR

Analyses	Result	**Limit	Qual	Units	DF	Date Analyzed
1UG/M3 W/ 0.2UG/M3 CT-TCE-VC		TO-15				Analyst: RJP
Ethylbenzene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Freon 11	0.27	0.15		ppbV	1	12/8/2017 10:45:00 PM
Freon 113	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Freon 114	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Freon 12	0.59	0.15		ppbV	1	12/8/2017 10:45:00 PM
Heptane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Hexachloro-1,3-butadiene	< 0.15 UJ	0.15		ppbV	1	12/8/2017 10:45:00 PM
Hexane	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Isopropyl alcohol	1.6	0.15		ppbV	1	12/8/2017 10:45:00 PM
m&p-Xylene	0.11	0.30	J	ppbV	1	12/8/2017 10:45:00 PM
Methyl Butyl Ketone	< 0.30	0.30		ppbV	1	12/8/2017 10:45:00 PM
Methyl Ethyl Ketone	< 0.30	0.30		ppbV	1	12/8/2017 10:45:00 PM
Methyl Isobutyl Ketone	< 0.30	0.30		ppbV	1	12/8/2017 10:45:00 PM
Methyl tert-butyl ether	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Methylene chloride	0.25	0.15		ppbV	1	12/8/2017 10:45:00 PM
o-Xylene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Propylene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Styrene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Tetrachloroethylene	0.11	0.15	J	ppbV	1	12/8/2017 10:45:00 PM
Tetrahydrofuran	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Toluene	0.23	0.15		ppbV	1	12/8/2017 10:45:00 PM
trans-1,2-Dichloroethene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
trans-1,3-Dichloropropene	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Trichloroethene	< 0.040	0.040		ppbV	1	12/8/2017 10:45:00 PM
Vinyl acetate	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Vinyl Bromide	< 0.15	0.15		ppbV	1	12/8/2017 10:45:00 PM
Vinyl chloride	< 0.040	0.040		ppbV	1	12/8/2017 10:45:00 PM
Surr: Bromofluorobenzene	88.0	70-130		%REC	1	12/8/2017 10:45:00 PM

MEP 1/11/18

Qualifiers:
- ** Quantitation Limit
- B Analyte detected in the associated Method Blank
- H Holding times for preparation or analysis exceeded
- JN Non-routine analyte. Quantitation estimated.
- S Spike Recovery outside accepted recovery limits
- . Results reported are not blank corrected
- E Estimated Value above quantitation range
- J Analyte detected below quantitation limit
- ND Not Detected at the Limit of Detection

Appendix B

Laboratory QC Documentation

CLIENT: Ravi Engineering & Land Surveying, P.C.
Work Order: C1712024
Project: 3130 Monroe Ave

TestCode: 0.25CT-TCE-VC

Sample ID: ALCS1UG-120817 SampType: LCS TestCode: 0.25CT-TCE- Units: ppbV Prep Date: RunNo: 13038
Client ID: ZZZZZ Batch ID: R13038 TestNo: TO-15 Analysis Date: 12/8/2017 SeqNo: 151430

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Acetone	0.8100	0.30	1	0	81.0	70	130				
Allyl chloride	0.8700	0.15	1	0	87.0	70	130				
Benzene	1.050	0.15	1	0	105	70	130				
Benzyl chloride	1.270	0.15	1	0	127	70	130				
Bromodichloromethane	1.210	0.15	1	0	121	70	130				
Bromoform	1.290	0.15	1	0	129	70	130				
Bromomethane	0.9500	0.15	1	0	95.0	70	130				
Carbon disulfide	0.9300	0.15	1	0	93.0	70	130				
Carbon tetrachloride	1.070	0.040	1	0	107	70	130				
Chlorobenzene	1.170	0.15	1	0	117	70	130				
Chloroethane	1.000	0.15	1	0	100	70	130				
Chloroform	1.030	0.15	1	0	103	70	130				
Chloromethane	1.020	0.15	1	0	102	70	130				
cis-1,2-Dichloroethene	0.9500	0.15	1	0	95.0	70	130				
cis-1,3-Dichloropropene	1.130	0.15	1	0	113	70	130				
Cyclohexane	1.040	0.15	1	0	104	70	130				
Dibromochloromethane	1.200	0.15	1	0	120	70	130				
Ethyl acetate	0.9800	0.15	1	0	98.0	70	130				
Ethylbenzene	1.030	0.15	1	0	103	70	130				
Freon 11	1.130	0.15	1	0	113	70	130				
Freon 113	0.9800	0.15	1	0	98.0	70	130				
Freon 114	1.140	0.15	1	0	114	70	130				
Freon 12	1.110	0.15	1	0	111	70	130				
Heptane	1.030	0.15	1	0	103	70	130				
Hexachloro-1,3-butadiene	1.420	0.15	1	0	142	70	130				S
Hexane	0.8900	0.15	1	0	89.0	70	130				
Isopropyl alcohol	0.9300	0.15	1	0	93.0	70	130				
m&p-Xylene	2.250	0.30	2	0	112	70	130				
Methyl Butyl Ketone	1.000	0.30	1	0	100	70	130				
Methyl Ethyl Ketone	0.9400	0.30	1	0	94.0	70	130				
Methyl Isobutyl Ketone	1.020	0.30	1	0	102	70	130				

Qualifiers:
- `*` Results reported are not blank corrected
- J Analyte detected below quantitation limit
- S Spike Recovery outside accepted recovery limits
- E Estimated Value above quantitation range
- ND Not Detected at the Limit of Detection
- H Holding times for preparation or analysis exceeded
- R RPD outside accepted recovery limits

CENTEK LABORATORIES, LLC

Date: 03-Jan-18

ANALYTICAL QC SUMMARY REPORT

CLIENT: Ravi Engineering & Land Surveying, P.C.
Work Order: C1712024
Project: 3130 Monroe Ave

TestCode: 0.25CT-TCE-VC

Sample ID: ALCS1UGD-121117 SampType: LCSD TestCode: 0.25CT-TCE- Units: ppbV Prep Date: RunNo: 13034
Client ID: ZZZZZ Batch ID: R13034 TestNo: TO-15 Analysis Date: 12/11/2017 SeqNo: 151463

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
1,1,1-Trichloroethane	1.190	0.15	1	0	119	70	130	1.17	1.69	30	
1,1,2,2-Tetrachloroethane	1.450	0.15	1	0	145	70	130	1.27	13.2	30	S
1,1,2-Trichloroethane	1.240	0.15	1	0	124	70	130	1.22	1.63	30	
1,1-Dichloroethane	1.070	0.15	1	0	107	70	130	1.01	5.77	30	
1,1-Dichloroethene	1.220	0.15	1	0	122	70	130	0.92	28.0	30	
1,2,4-Trichlorobenzene	1.280	0.15	1	0	128	70	130	1.15	10.7	30	
1,2,4-Trimethylbenzene	1.200	0.15	1	0	120	70	130	1.18	1.68	30	
1,2-Dibromoethane	1.250	0.15	1	0	125	70	130	1.2	4.08	30	
1,2-Dichlorobenzene	1.310	0.15	1	0	131	70	130	1.29	1.54	30	S
1,2-Dichloroethane	1.070	0.15	1	0	107	70	130	1.03	3.81	30	
1,2-Dichloropropane	1.170	0.15	1	0	117	70	130	1.17	0	30	
1,3,5-Trimethylbenzene	1.230	0.15	1	0	123	70	130	1.27	3.20	30	
1,3-butadiene	1.020	0.15	1	0	102	70	130	1	1.98	30	
1,3-Dichlorobenzene	1.290	0.15	1	0	129	70	130	1.26	2.35	30	
1,4-Dichlorobenzene	1.340	0.15	1	0	134	70	130	1.26	6.16	30	S
1,4-Dioxane	1.190	0.30	1	0	119	70	130	1.29	8.06	30	
2,2,4-trimethylpentane	1.110	0.15	1	0	111	70	130	1.09	1.82	30	
4-ethyltoluene	1.300	0.15	1	0	130	70	130	1.3	0	30	
Acetone	0.8700	0.30	1	0	87.0	70	130	0.86	1.16	30	
Allyl chloride	0.9600	0.15	1	0	96.0	70	130	0.89	7.57	30	
Benzene	1.110	0.15	1	0	111	70	130	1.08	2.74	30	
Benzyl chloride	1.220	0.15	1	0	122	70	130	1.27	4.02	30	
Bromodichloromethane	1.250	0.15	1	0	125	70	130	1.2	4.08	30	
Bromoform	1.260	0.15	1	0	126	70	130	1.23	3.96	30	
Bromomethane	1.110	0.15	1	0	111	70	130	1.06	4.61	30	

Qualifiers:

- Results reported are not blank corrected
- J Analyte detected below quantitation limit
- S Spike Recovery outside accepted recovery limits
- E Estimated Value above quantitation range
- ND Not Detected at the Limit of Detection
- H Holding times for preparation or analysis exceeded
- R RPD outside accepted recovery limits

CLIENT: Ravi Engineering & Land Surveying, P.C.
Work Order: CI712024
Project: 3130 Monroe Ave

Sample ID: ALCS1UG-121117 SampType: LCS TestCode: 0.25CT-TCE- Units: ppbV Prep Date: RunNo: 13034
Client ID: ZZZZZ Batch ID: R13034 TestNo: TO-15 Analysis Date: 12/11/2017 SeqNo: 151402

TestCode: 0.25CT-TCE-VC

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Carbon disulfide	0.9600	0.15	1	0	96.0	70	130				
Carbon tetrachloride	1.000	0.040	1	0	100	70	130				
Chlorobenzene	1.180	0.15	1	0	118	70	130				
Chloroethane	1.060	0.15	1	0	106	70	130				
Chloroform	1.040	0.15	1	0	104	70	130				
Chloromethane	1.040	0.15	1	0	104	70	130				
cis-1,2-Dichloroethene	0.9800	0.15	1	0	98.0	70	130				
cis-1,3-Dichloropropene	1.140	0.15	1	0	114	70	130				
Cyclohexane	1.060	0.15	1	0	106	70	130				
Dibromochloromethane	1.210	0.15	1	0	121	70	130				
Ethyl acetate	1.000	0.15	1	0	100	70	130				
Ethylbenzene	1.040	0.15	1	0	104	70	130				
Freon 11	1.110	0.15	1	0	111	70	130				
Freon 113	1.020	0.15	1	0	102	70	130				
Freon 114	1.120	0.15	1	0	112	70	130				
Freon 12	1.090	0.15	1	0	109	70	130				
Heptane	1.040	0.15	1	0	104	70	130				
Hexachloro-1,3-butadiene	1.480	0.15	1	0	148	70	130				
Hexane	0.9300	0.15	1	0	93.0	70	130				
Isopropyl alcohol	0.9500	0.15	1	0	95.0	70	130				S
m&p-Xylene	2.300	0.30	2	0	115	70	130				
Methyl Butyl Ketone	1.150	0.30	1	0	115	70	130				
Methyl Ethyl Ketone	1.080	0.30	1	0	108	70	130				
Methyl Isobutyl Ketone	1.170	0.30	1	0	117	70	130				
Methyl tert-butyl ether	0.9500	0.15	1	0	95.0	70	130				
Methylene chloride	0.9300	0.15	1	0	93.0	70	130				
o-Xylene	1.210	0.15	1	0	121	70	130				
Propylene	0.9700	0.15	1	0	97.0	70	130				
Styrene	1.260	0.15	1	0	126	70	130				
Tetrachloroethylene	1.210	0.15	1	0	121	70	130				
Tetrahydrofuran	0.9300	0.15	1	0	93.0	70	130				

Qualifiers:

- * Results reported are not blank corrected
- J Analyte detected below quantitation limit
- S Spike Recovery outside accepted recovery limits
- E Estimated Value above quantitation range
- ND Not Detected at the Limit of Detection
- H Holding times for preparation or analysis exceeded
- R RPD outside accepted recovery limits

CLIENT: Ravi Engineering & Land Surveying, P.C.
Work Order: C1712024
Project: 3130 Monroe Ave

Sample ID: ALCS1UGD-121117 SampType: LCSD TestCode: 0.25CT-TCE- Units: ppbV Prep Date: RunNo: 13034
Client ID: ZZZZZ Batch ID: R13034 TestNo: TO-15 Analysis Date: 12/11/2017 SeqNo: 1§1403

TestCode: 0.25CT-TCE-VC

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Carbon disulfide	1.000	0.15	1	0	100	70	130	0.98	2.02	30	
Carbon tetrachloride	1.130	0.040	1	0	113	70	130	1.09	3.60	30	
Chlorobenzene	1.200	0.15	1	0	120	70	130	1.18	1.68	30	
Chloroethane	1.060	0.15	1	0	106	70	130	1.06	0	30	
Chloroform	1.090	0.15	1	0	109	70	130	1.04	4.69	30	
Chloromethane	1.030	0.15	1	0	103	70	130	1.04	0.966	30	
cis-1,2-Dichloroethene	1.040	0.15	1	0	104	70	130	0.98	5.94	30	
cis-1,3-Dichloropropene	1.170	0.15	1	0	117	70	130	1.14	2.60	30	
Cyclohexane	1.110	0.15	1	0	111	70	130	1.06	4.61	30	
Dibromochloromethane	1.270	0.15	1	0	127	70	130	1.21	4.84	30	
Ethyl acetate	1.060	0.15	1	0	106	70	130	1	5.83	30	
Ethylbenzene	1.100	0.15	1	0	110	70	130	1.04	6.61	30	
Freon 11	1.140	0.15	1	0	114	70	130	1.11	2.67	30	
Freon 113	1.150	0.15	1	0	115	70	130	1.02	12.0	30	
Freon 114	1.140	0.15	1	0	114	70	130	1.12	1.77	30	
Freon 12	1.170	0.15	1	0	117	70	130	1.09	7.08	30	
Heptane	1.050	0.15	1	0	105	70	130	1.04	0.957	30	
Hexachloro-1,3-butadiene	1.600	0.15	1	0	160	70	130	1.48	7.79	30	S
Hexane	0.9700	0.15	1	0	97.0	70	130	0.93	4.21	30	
Isopropyl alcohol	1.000	0.15	1	0	100	70	130	0.95	5.13	30	
m&p-Xylene	2.370	0.30	2	0	118	70	130	2.3	3.00	30	
Methyl Butyl Ketone	0.9800	0.30	1	0	98.0	70	130	1.15	16.0	30	
Methyl Ethyl Ketone	1.070	0.30	1	0	107	70	130	1.08	0.930	30	
Methyl Isobutyl Ketone	1.130	0.30	1	0	113	70	130	1.17	3.48	30	
Methyl tert-butyl ether	0.9700	0.15	1	0	97.0	70	130	0.95	2.08	30	
Methylene chloride	1.000	0.15	1	0	100	70	130	0.93	7.25	30	
o-Xylene	1.280	0.15	1	0	128	70	130	1.21	5.62	30	
Propylene	0.9500	0.15	1	0	95.0	70	130	0.97	2.08	30	
Styrene	1.290	0.15	1	0	129	70	130	1.26	2.35	30	
Tetrachloroethylene	1.290	0.15	1	0	129	70	130	1.21	6.40	30	
Tetrahydrofuran	1.030	0.15	1	0	103	70	130	0.93	10.2	30	

Qualifiers:
- . Results reported are not blank corrected
- J Analyte detected below quantitation limit
- S Spike Recovery outside accepted recovery limits
- E Estimated Value above quantitation range
- ND Not Detected at the Limit of Detection
- H Holding times for preparation or analysis exceeded
- R RPD outside accepted recovery limits

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\AO120802.D
Acq On : 8 Dec 2017 12:29 pm
Sample : A1UG_1.0
Misc : AN27_1UG
MS Integration Params: RTEINT.P

Vial: 3
Operator: RJP
Inst : MSD #1
Multiplr: 1.00

Method : C:\HPCHEM\1\METHODS\AN27_1UG.M (RTE Integrator)
Title : TO-15 VOA Standards for 5 point calibration
Last Update : Wed Jan 03 09:59:47 2018
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
Max. RRF Dev : 30% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Bromochloromethane	1.000	1.000	0.0	143	0.00
2	T	Propylene	0.718	0.683	4.9	135	0.00
3	T	Freon 12	4.370	4.877	-11.6	165#	0.00
4	T	Chloromethane	1.267	1.394	-10.0	166#	0.00
5	T	Freon 114	3.899	4.456	-14.3	169#	0.00
6	T	Vinyl Chloride	1.190	1.290	-8.4	163#	0.00
7	T	Butane	1.475	1.534	-4.0	153#	0.00
8	T	1,3-butadiene	1.123	1.200	-6.9	156#	0.00
9	T	Bromomethane	1.406	1.313	6.6	137	0.00
10	T	Chloroethane	0.537	0.530	1.3	142	0.00
11	T	Ethanol	0.402	0.375	6.7	139	0.00
12	T	Acrolein	0.441	0.367	16.8	119	0.00
13	T	Vinyl Bromide	1.406	1.312	6.7	137	0.00
14	T	Freon 11	4.614	5.463	-18.4	175#	0.00
15	T	Acetone	0.549	0.447	18.6	123	0.00
16	T	Pentane	1.099	0.965	12.2	136	0.00
17	T	Isopropyl alcohol	1.582	1.464	7.5	135	0.00
18	T	1,1-dichloroethene	1.100	0.980	10.9	133	0.00
19	T	Freon 113	2.569	2.651	-3.2	149	0.00
20	t	t-Butyl alcohol	1.933	1.803	6.7	142	0.00
21	T	Methylene chloride	0.990	0.896	9.5	136	0.00
22	T	Allyl chloride	1.109	0.947	14.6	122	0.00
23	T	Carbon disulfide	2.981	2.956	0.8	148	0.00
24	T	trans-1,2-dichloroethene	1.482	1.465	1.1	143	0.00
25	T	methyl tert-butyl ether	2.755	2.631	4.5	136	0.00
26	T	1,1-dichloroethane	1.955	2.065	-5.6	151#	0.00
27	T	Vinyl acetate	2.012	1.739	13.6	126	0.00
28	T	Methyl Ethyl Ketone	0.400	0.413	-3.2	144	0.00
29	T	cis-1,2-dichloroethene	1.366	1.337	2.1	142	0.00
30	T	Hexane	1.325	1.289	2.7	137	0.00
31	T	Ethyl acetate	1.802	1.819	-0.9	139	0.00
32	T	Chloroform	2.860	3.119	-9.1	157#	0.00
33	T	Tetrahydrofuran	0.808	0.782	3.2	137	0.00
34	T	1,2-dichloroethane	1.938	2.112	-9.0	159#	0.00
35	I	1,4-difluorobenzene	1.000	1.000	0.0	133	0.00
36	T	1,1,1-trichloroethane	0.729	0.881	-20.9	162#	0.00
37	T	Cyclohexane	0.282	0.303	-7.4	138	0.00
38	T	Carbon tetrachloride	0.953	1.086	-14.0	169#	0.00
39	T	Benzene	0.701	0.756	-7.8	147	0.00
40	T	Methyl methacrylate	0.252	0.285	-13.1	145	0.00
41	T	1,4-dioxane	0.141	0.174	-23.4	169#	0.00
42	T	2,2,4-trimethylpentane	0.892	1.001	-12.2	146	0.00
43	T	Heptane	0.308	0.326	-5.8	136	0.00
44	T	Trichloroethene	0.386	0.431	-11.7	164#	0.00
45	T	1,2-dichloropropane	0.235	0.277	-17.9	154#	0.00
46	T	Bromodichloromethane	0.702	0.891	-26.9	170#	0.00
47	T	cis-1,3-dichloropropene	0.394	0.455	-15.5	150#	0.00
48	T	trans-1,3-dichloropropene	0.346	0.388	-12.1	147	0.00
49	T	1,1,2-trichloroethane	0.314	0.387	-23.2	161#	0.00

(#) = Out of Range

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\AO120802.D
Acq On : 8 Dec 2017 12:29 pm
Sample : A1UG_1.0
Misc : AN27_1UG
MS Integration Params: RTEINT.P

Vial: 3
Operator: RJP
Inst : MSD #1
Multiplr: 1.00

Method : C:\HPCHEM\1\METHODS\AN27_1UG.M (RTE Integrator)
Title : TO-15 VOA Standards for 5 point calibration
Last Update : Wed Jan 03 09:59:47 2018
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
Max. RRF Dev : 30% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
51	T	Toluene	0.573	0.595	-3.8	148	0.00
52	T	Methyl Isobutyl Ketone	0.455	0.506	-11.2	170#	0.00
53	T	Dibromochloromethane	0.889	1.089	-22.5	175#	0.00
54	T	Methyl Butyl Ketone	0.404	0.450	-11.4	174#	0.00
55	T	1,2-dibromoethane	0.587	0.699	-19.1	168#	0.00
56	T	Tetrachloroethylene	0.455	0.551	-21.1	174#	0.00
57	T	Chlorobenzene	0.803	0.927	-15.4	163#	0.00
58	T	Ethylbenzene	1.300	1.401	-7.8	151#	0.00
59	T	m&p-xylene	1.088	1.242	-14.2	160#	0.00
60	T	Nonane	0.495	0.580	-17.2	158#	0.00
61	T	Styrene	0.713	0.872	-22.3	168#	0.00
62	T	Bromoform	0.850	1.096	-28.9	187#	0.00
63	T	o-xylene	1.169	1.425	-21.9	173#	0.00
64	T	Cumene	1.373	1.603	-16.8	162#	0.00
65	S	Bromofluorobenzene	0.750	0.772	-2.9	140	0.00
66	T	1,1,2,2-tetrachloroethane	0.720	0.919	-27.6	178#	0.00
67	T	Propylbenzene	0.353	0.427	-21.0	168#	0.00
68	T	2-Chlorotoluene	0.359	0.472	-31.5#	184#	0.00 NT
69	T	4-ethyltoluene	1.307	1.653	-26.5	170#	0.00
70	T	1,3,5-trimethylbenzene	1.229	1.548	-26.0	171#	0.00
71	T	1,2,4-trimethylbenzene	1.054	1.235	-17.2	159#	0.00
72	T	1,3-dichlorobenzene	0.812	1.041	-28.2	180#	0.00
73	T	benzyl chloride	0.698	0.888	-27.2	176#	0.00
74	T	1,4-dichlorobenzene	0.789	1.017	-28.9	180#	0.00
75	T	1,2,3-trimethylbenzene	1.115	1.442	-29.3	175#	0.00
76	T	1,2-dichlorobenzene	0.776	0.995	-28.2	179#	0.00
77	T	1,2,4-trichlorobenzene	0.341	0.435	-27.6	179#	0.00
78	T	Naphthalene	0.573	0.768	-34.3	165#	0.00
79	T	Hexachloro-1,3-butadiene	0.610	0.924	-51.5#	212#	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\AO121102.D
Acq On : 11 Dec 2017 10:57 am
Sample : A1UG_1.0
Misc : AN27_1UG
MS Integration Params: RTEINT.P

Vial: 2
Operator: RJP
Inst : MSD #1
Multiplr: 1.00

Method : C:\HPCHEM\1\METHODS\AN27_1UG.M (RTE Integrator)
Title : TO-15 VOA Standards for 5 point calibration
Last Update : Wed Jan 03 09:59:47 2018
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.33min
Max. RRF Dev : 30% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)	
51	T	Toluene	0.573	0.593	-3.5	152#	-0.01	
52	T	Methyl Isobutyl Ketone	0.455	0.475	-4.4	165#	-0.01	
53	T	Dibromochloromethane	0.889	1.043	-17.3	173#	-0.01	
54	T	Methyl Butyl Ketone	0.404	0.417	-3.2	166#	-0.02	
55	T	1,2-dibromoethane	0.587	0.692	-17.9	171#	-0.01	
56	T	Tetrachloroethylene	0.455	0.535	-17.6	175#	0.00	
57	T	Chlorobenzene	0.803	0.924	-15.1	168#	0.00	
58	T	Ethylbenzene	1.300	1.361	-4.7	152#	0.00	
59	T	m&p-xylene	1.088	1.211	-11.3	162#	0.00	
60	T	Nonane	0.495	0.552	-11.5	156#	0.00	
61	T	Styrene	0.713	0.889	-24.7	177#	0.00	
62	T	Bromoform	0.850	1.057	-24.4	187#	0.00	
63	T	o-xylene	1.169	1.382	-18.2	174#	0.00	
64	T	Cumene	1.373	1.530	-11.4	160#	0.00	
65	S	Bromofluorobenzene	0.750	0.768	-2.4	144	0.00	
66	T	1,1,2,2-tetrachloroethane	0.720	0.920	-27.8	184#	0.00	
67	T	Propylbenzene	0.353	0.444	-25.8	180#	-0.01	
68	T	2-Chlorotoluene	0.359	0.479	-33.4#	193#	0.00	RT
69	T	4-ethyltoluene	1.307	1.680	-28.5	179#	0.00	
70	T	1,3,5-trimethylbenzene	1.229	1.589	-29.3	182#	0.00	
71	T	1,2,4-trimethylbenzene	1.054	1.212	-15.0	161#	0.00	
72	T	1,3-dichlorobenzene	0.812	1.035	-27.5	184#	0.00	
73	T	benzyl chloride	0.698	0.895	-28.2	183#	0.00	
74	T	1,4-dichlorobenzene	0.789	0.988	-25.2	181#	0.00	
75	T	1,2,3-trimethylbenzene	1.115	1.410	-26.5	177#	0.00	
76	T	1,2-dichlorobenzene	0.776	0.983	-26.7	182#	0.00	
77	T	1,2,4-trichlorobenzene	0.341	0.410	-20.2	175#	0.00	
78	T	Naphthalene	0.673	0.697	-3.6	153#	0.00	
79	T	Hexachloro-1,3-butadiene	0.610	0.888	-45.6#	211#	0.00	

(#) = Out of Range SPCC's out = 0 CCC's out = 0

Appendix C

Validator Qualifications

KENNETH R. APPLIN
Geochemist/Data Validator

Ph.D., Geochemistry and Mineralogy, The Pennsylvania State University

M.S., Geochemistry and Mineralogy, The Pennsylvania State University

B.A., Geological Sciences, SUNY at Geneseo, NY

Dr. Applin has over 35 years of experience working with the geochemistry of natural waters. His prior experience includes working as an Assistant Professor of Geology at the University of Missouri-Columbia and as Chief Hydrogeologist and Geochemist with a leading engineering firm in Rochester, NY. In 1993, he established KR Applin and Associates, a small consulting business that focuses on the geochemistry of natural waters, especially as applied to problems involving the contamination of groundwater and surface water.

Dr. Applin is also an experienced analytical data validator and has provided data validation services since 1994 to a variety of clients performing brownfield cleanup projects, hazardous waste remediation, groundwater monitoring at solid waste facilities, and other projects requiring third-party data validation. Dr. Applin has several years of hands-on experience with the laboratory analysis of natural waters and has successfully completed the USEPA Region II certification courses for performing inorganic and organic analytical data validation.

MICHAEL K. PERRY
Chemist/Data Validator

B.S. Chemistry, Georgia State University, Atlanta, GA

A.A.S., Chemical Technology, Alfred State College, Alfred, NY

Mr. Perry has over 30 years of experience in the analytical laboratory business. During his early career, he spent several years as a laboratory analyst performing the analysis of soil, water, and air samples for inorganic and organic chemical parameters. During his last 20 years in the environmental laboratory business, he managed and directed two major analytical laboratories in Rochester, NY. His management responsibilities included oversight of the daily operations of the lab, staff training and supervision, the selection, purchase, and maintenance of analytical instruments, the introduction of new laboratory methods, analytical quality assurance and quality control, data acquisition and management, and other business-related activities.

Mr. Perry has an extensive working knowledge of the methods and procedures used for sampling and analyzing both inorganic and organic analytes in soil, water, and air. He is an accomplished laboratory chemist and is familiar with the analytical methods and procedures established under the USEPA Contract Laboratory Protocols (CLP), the NYSDEC Analytical Services Protocols (ASP), and the NYSDOH Environmental Laboratory Approval Program (ELAP).

DATA USABILITY SUMMARY REPORT (DUSR)

3130 Monroe Ave.
Rochester, NY
NYSDEC BCP # C 828109

SDG: 0791-01

4 Water Samples

Prepared for:

Ravi Engineering & Land Surveying, P.C.
2110 South Clinton Avenue, Suite 1
Rochester, NY 14618

May 2017

EDU Environmental Data Usability 10028 Deer Park Dr. Dansville, NY 14437 585.991.9156

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Tables

REVIEWER'S NARRATIVE
SDG 0791-01

The data associated with this Sample Delivery Group (SDG) 0791-01, analyzed by Paradigm Environmental Services, Inc. Rochester, NY have been reviewed in accordance with assessment criteria provided by the New York State Department of Environmental Conservation following the review procedures provided in the USEPA Functional Guidelines for evaluating organic and inorganic data.

All analytical results reported by the laboratory are considered valid and acceptable except results that have been qualified as rejected, "R". Results qualified as estimated "J", or as non-detects, "U", are considered usable for the purpose of evaluating water and/or soil quality. However, these qualifiers indicate that the accuracy and/or precision of the analytical result is questionable. A summary of all data that have been qualified and the reasons for qualification are provided in the following data usability summary report (DUSR).

Two facts should be noted by all data users. First, the "R" qualifier means that the associated value is unusable. In other words, due to significant quality control (QC) problems, the analysis is invalid and provides no information as to whether the analyte is present or not. Values qualified with an "R" should not appear on the final data tables because they cannot be relied upon, even as the last resort. Second, no analyte concentration, even if it has passed all QC tests, is guaranteed to be accurate. Strict QC serves to increase confidence in data, but any value potentially contains error.

Reviewer's Signature: Michael K. Perry Date: 5/14/17

Michael K. Perry
Chemist

1.0 SUMMARY

SITE:	3130 Monroe Ave. Rochester, NY
SAMPLING DATE:	March 02, 2017
SAMPLE TYPE:	4 water samples and one trip blank
LABORATORY:	Paradigm Environmental Services, Inc. Rochester, NY
SDG No.:	0791-01

2.0 INTRODUCTION

This data usability summary report (DUSR) was prepared in accordance with guidance provided by the New York State Department of Environmental Conservation (NYSDEC). The DUSR is based on a review and evaluation of the laboratory analytical data package. Specifically, the NYSDEC guidance recommends review and evaluation of the following elements of the data package:

- Completeness of the data package as defined under the requirements of the NYSDEC Analytical Services Protocols (ASP) Category B or the United States Environmental Protection Agency (USEPA) Contract Laboratory Program (CLP) deliverables,
- Compliance with established analyte holding times,
- Adherence to quality control (QC) limits and specifications for blanks, instrument tuning and calibration, surrogate recoveries, spike recoveries, laboratory duplicate analyses, and other QC criteria,
- Adherence to established analytical protocols,
- Conformance of data summary sheets with raw analytical data, and
- Use of correct data qualifiers.

Data deficiencies, analytical protocol deviations, and quality control problems identified using the review criteria above and their effect on the analytical results are discussed in this report.

3.0 SAMPLE AND ANALYSIS SUMMARY

The data package consists of analytical results for, four water samples and a trip blank collected on March 02, 2017. These samples were analyzed for the volatile organic compounds.

All laboratory analyses were performed by Paradigm Environmental Services, Inc., Rochester, NY and analyzed as SDG 0791-01. The analytical results were provided in NYSDEC ASP Category B format, which includes all raw analytical data and laboratory QC data.

4.0 GUIDANCE DOCUMENTS AND DATA REVIEW CRITERIA

The guidance documents used for reviewing laboratory quality control (QC) data and assigning data qualifiers (flags) to analytical results are listed in Table 4-1. The QC limits established in the documents applicable to this data review were used to assess the quality of the analytical results. In some cases, however, QC limits established internally by the laboratory were taken into account to determine data quality.

The QC criteria considered for assessing the usability of the reported analytical results provided for each analyte type (i.e. VOCs, SVOCs, metals, etc.) are listed in Table 4-2. These criteria may vary with the analytical method utilized by the laboratory. These criteria comply with the guidance recommended in Section 2.0 above.

5.0 DATA VALIDATION QUALIFIERS

The letter qualifiers (flags) used to define data usability are described briefly below. These letters are assigned by the data validator to analytical results having questionable accuracy and/or precision as determined by reviewing the laboratory QC data associated with the analytical results.

TABLE 4-1

DATA VALIDATION GUIDANCE DOCUMENTS

Analyte Type	Validation Guidance
VOCs	USEPA, 2008, Validating Volatile Organic Compounds By Gas Chromatography/Mass Spectrometry; SW-846 Method 8260B; SOP # HW-24, Rev. 2. USEPA, 2008, Statement of Work for Organic Analysis of Low/Medium Concentration of Volatile Organic Compounds SOM01.2; SOP HW-33, Rev. 2.
SVOCs	USEPA, 2007, Statement of Work for Organic Analysis of Low/Medium Concentration of Semivolatile Organic Compounds SOM01.2; SOP HW-35, Rev. 1.
Pesticides/PCBs	USEPA, 2006, CLP Organics Data Review and Preliminary Review (CLP/SOW OLMO 4.3); SOP # HW-6, Rev. 14, Part C.
Metals	USEPA, 2006, Validation of Metals for the Contract Laboratory Program (CLP) based on SOW ILMO 5.3 (SOP Revision 13), SOP # HW-2, Rev. 13.
Gen Chemistry	NYSDEC, 2005, Analytical Services Protocols (ASP)
VOCs (Ambient air)	USEPA, 2006, Validating Air Samples, Volatile Organic Analysis of Ambient Air in Canister by Method TO-15; SOP # HW-31, Rev. 4.

TABLE 4-2

QUALITY CONTROL CRITERIA USED FOR VALIDATING LABORATORY ANALYTICAL DATA

VOCs	SVOCs	Pesticides/PCBs	Metals	Gen Chemistry	Method TO-15
Completeness of Pkg	Completeness of Pkg	Completeness of Pkg	Completeness of Pkg	Completeness of Pkg	Completeness of Pkg
Sample Condition	Sample Condition	Sample Condition	Sample Condition	Sample Condition	Sample Condition
Holding Time	Holding Time	Holding Time	Holding Time	Holding Times	Holding Time
System Monitoring Compounds	Surrogate Recoveries	Surrogate Recoveries	Initial/Continuing Calibration	Calibration	Canister Certification
Lab Control Sample	Lab Control Sample	Matrix Spikes	CRDL Standards	Lab Control Samples	Lab Control Sample
Matrix Spikes	Matrix Spikes	Blanks	Blanks	Blanks	Instrument Tuning
Blanks	Blanks	Instrument Calibration & Verification	Interference Check Sample	Spike Recoveries	Blanks
Instrument Tuning	Instrument Tuning	Analyte ID	Spike Recoveries	Lab Duplicates	Initial Calibration & System Performance
Internal Standards	Internal Standards	Lab Qualifiers	Lab Duplicate		Daily Calibration
Initial Calibration	Initial Calibration	Field Duplicate	Lab Control Sample		Field Duplicate
Continuing Calibration	Continuing Calibration		ICP Serial Dilutions		
Lab Qualifiers	Lab Qualifiers		Lab Qualifiers		
Field Duplicate	Field Duplicate		Field Duplicate		

The laboratory may also use various letters and symbols to flag analytical results generated when QC limits were exceeded. The meanings of these flags may differ from those used by the independent data validator. Those used by the laboratory are provided with the analytical results.

NOTE: The assignment of data qualifiers by the data reviewer (validator) to laboratory analytical results should not necessarily be interpreted by the data user as a measure of laboratory ability or proficiency. Rather, the qualifiers are intended to provide a measure of data accuracy and precision to the data user, which, for example, may provide a level of confidence in determining whether or not standards or cleanup objectives have been met.

U The analyte was analyzed for but was not detected at or above the sample quantitation limit.

J The analyte was positively identified; the associated numerical value is the *approximate* concentration of the analyte in the sample. (The magnitude of any ± value associated with the result is not determined by data validation).

UJ The analyte was not detected above the reported sample quantitation limit. However, the reported quantitation limit is *approximate* and may or may not represent the actual limit of quantitation necessary to accurately and precisely measure the analyte in the sample.

R The sample result is rejected (i.e., is unusable) due to serious deficiencies in the ability to analyze the sample and meet quality control criteria. The presence or absence of the analyte cannot be verified.

N The analysis indicates the presence of an analyte for which there is presumptive evidence to make a "tentative identification".

JN The analyte is considered to be "presumptively present." The associated numerical value represents its *approximate* concentration.

The validated analytical results are attached to this report. Validation qualifiers (flags) are indicated using red ink. Data sheets having qualified data are signed and dated by the data reviewer.

6.0 RESULTS OF THE DATA REVIEW

The results of the data review are summarized in Tables 6-1. The table list the samples where QC criteria were found to exceed acceptable limits and the actions taken to qualify the associated analytical results.

7.0 TOTAL USABLE DATA

For SDG 0791-01, five samples were analyzed and results were reported for 265 analytes. Five results were rejected. Even though some results were flagged with a "J" as estimated, all other results (98 %) are considered usable. See the summary table for the analyses that have been rejected and the associated QC reasons.

Table 6-1 VOCs

SAMPLES AFFECTED	ANALYTES	ACTION	QC VIOLATION	COMMENTS
All samples	1,4-Dioxane	R	Initial calibration RRF < 0.005 (0.004)	Based on the new low responders rule from SOM2.1, the RRF <0.005 is used
All samples	Bromomethane Dichlorodifluoromethane Acetone	J detects/UJ non-detects	CCV > 20 %	Results are estimated

ACRONYMS

BSP	Blank Spike
CCAL	Continuing Calibration
CCB	Continuing Calibration Blank
CCV	Continuing Calibration Verification
CRDL	Contract Required Detection Limit
CRQL	Contract Required Quantitation Limit
%D	Percent Difference
ICAL	Initial Calibration
ICB	Initial Calibration Blank
IS	Internal Standard
LCS	Laboratory Control Sample
MS/MSD	Matrix Spike/Matrix Spike Duplicate
QA	Quality Assurance
QC	Quality Control
%R	Percent recovery
RPD	Relative Percent Difference
RRF	Relative Response Factor
%RSD	Percent Relative Standard Deviation
TAL	Target Analyte List (metals)
TCL	Target Compound List (organics)

Appendix A

Validated Analytical Results

LAB PROJECT NARRATIVE: 170791
PROJECT NAME: 3130 Monroe Ave.
SDG: 0791-01
CLIENT: Ravi Engineering & Land Surveying, P.C.

Four Groundwater samples and one Trip Blank were collected by the client on 03/02/2017 and received at the Paradigm laboratory on the same day, late in the day. Container and holding times were acceptable at time of receipt; the samples were received at 13° Centigrade and were on ice. Sample were submitted for the TCL list for VOCs. All analyses were performed using EPA SW-846 Methods and the associated holding times.

The items noted in this case narrative address compliance with the referenced methods, NYSDOH ELAP rules, and any project specific data quality requirements. These may be different from the usability criteria referenced in any "Functional Guidelines" or other data review standards used by data validators.

GENERAL NOTES

The initial and continuing calibration reports are only evaluated for compounds that are on the sample summary report.

Regarding results on QC summary forms versus included raw data, due to calculations made at the instrument where many significant figures may be used, there may be slight discrepancies between the summary report result and that recorded on the raw data. This does not affect data usability.

Regarding initial calibrations, it should be noted that the Quantitation Report concentrations supplied for the initial calibration reflect the calibration prior to updating. The response factors and areas are correct.

Regarding Quantitation Reports, it should be noted that the "#" symbol that appears on some of the Quantitation Reports is a software artifact and should be disregarded.

VOLATILES

Holding times were met for all samples.

The surrogate recoveries for the samples and QC samples were within QC limits.

Site specific QC was not requested on this SDG. The Laboratory Control Sample recovered within acceptance limits.

The method blank was free from contamination within the reportable ranges.

The instrument tunes passed all criteria.

The internal standards areas and retention times were within acceptance limits for the samples and the associated QC.

All data for the initial calibration was within acceptance limits. Compounds flagged with an "*" on the summary table have been calibrated using a non-average Response Factor calibration curve. The supporting curves are located after the initial calibration table.

All continuing calibration data was within acceptance limits.

(signed) _____ (date) 4/18/2017

Bruce Hoogesteger- President

SDG# : 0791-01
LAB PROJECT #: 170791
CLIENT: RAVI
PROJECT NAME: 3130 Monroe Ave

BATCH COMPLETE: 3/3/17
DATE DUE: 4/3/17
PROTOCOL: SW846

LAB.SAMPLE#	FIELD ID	MATRIX	REQUESTED ANALYSIS	DATE SAMPLED	DATE REC'D
170791-01	MW-1	WG	TCL VOC	3/2/17	3/3/17
170791-02	MW-2	WG	TCL VOC	3/2/17	3/3/17
170791-03	MW-3	WG	TCL VOC	3/2/17	3/3/17
170791-04	MW-4	WG	TCL VOC	3/2/17	3/3/17
170791-05	T-736	WG	TCL VOC	3/2/17	3/3/17

5

PARADIGM

179 Lake Avenue, Rochester, NY 14608 Office (585) 647-2530 Fax (585) 647-3311

CHAIN OF CUSTODY

REPORT TO:	INVOICE TO:	
CLIENT: RAVI	CLIENT: SAME	LAB PROJECT ID: 170791
ADDRESS:	ADDRESS:	
CITY: STATE: ZIP	CITY: STATE: ZIP:	Quotation #:
PHONE: 585-697-2071	PHONE:	Email: lzicari@raviengr.com, dmorton@raviengr.com
ATTN: Lynn Zicari	ATTN:	

PROJECT REFERENCE: 3130 Monroe Ave

Matrix Codes:
AQ - Aqueous Liquid, NQ - Non-Aqueous Liquid, WA - Water, WG - Groundwater, DW - Drinking Water, WW - Wastewater, SO - Soil, SL - Sludge, SD - Solid, PT - Paint, WP - Wipe, CK - Caulk, OL - Oil, AR - Air

REQUESTED ANALYSIS

DATE COLLECTED	TIME COLLECTED	COMPOSITE	GRAB	SAMPLE IDENTIFIER	MATRIX CODES	NUMBER OF CONTAINERS	TCL VOC	REMARKS	PARADIGM LAB SAMPLE NUMBER
3/2/17	16:00		X	MW-1	WG	2	X		01
↓	11:30		↓	MW-2	↓	2	X		02
↓	13:30		↓	MW-3	↓	2	X		03
↓	14:45		↓	MW-4	↓	2	X		04
				T-736		1	X	Field Blank	05

13°C iced started in field

Turnaround Time	Report Supplements	
Availability contingent upon lab approval; additional fees may apply.		
Standard 5 day ☒	None Required ☐	None Required ☐
10 day ☐	Batch QC ☐	Basic EDD ☐
Rush 3 day ☐	Category A ☐	NYSDEC EDD ☒
Rush 2 day ☐	Category B ☒	
Rush 1 day ☐		
Other ☐ please indicate date needed:	Other ☐ please indicate package needed:	Other EDD ☐ please indicate EDD needed:

3/2/17 1801hrs No custody seals client dropped off. MolyNail

	Date/Time	
Sampled By: Lynn Zicari	3/2/17	Total Cost:
Relinquished By: [signature]	3/2/17 17:57	
Received By: Moly Nail	3/2/17 1757	P.I.F.
Received @ Lab By: [signature]	3/3/17 09:46	

By signing this form, client agrees to Paradigm Terms and Conditions (reverse).

See additional page for sample conditions.

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-1
Lab Sample ID: 170791-01
Matrix: Groundwater
Date Sampled: 3/2/2017
Date Received: 3/3/2017

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		3/8/2017 17:23
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		3/8/2017 17:23
1,1,2-Trichloroethane	< 2.00	ug/L		3/8/2017 17:23
1,1-Dichloroethane	< 2.00	ug/L		3/8/2017 17:23
1,1-Dichloroethene	< 2.00	ug/L		3/8/2017 17:23
1,2,3-Trichlorobenzene	< 5.00	ug/L		3/8/2017 17:23
1,2,4-Trichlorobenzene	< 5.00	ug/L		3/8/2017 17:23
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		3/8/2017 17:23
1,2-Dibromoethane	< 2.00	ug/L		3/8/2017 17:23
1,2-Dichlorobenzene	< 2.00	ug/L		3/8/2017 17:23
1,2-Dichloroethane	< 2.00	ug/L		3/8/2017 17:23
1,2-Dichloropropane	< 2.00	ug/L		3/8/2017 17:23
1,3-Dichlorobenzene	< 2.00	ug/L		3/8/2017 17:23
1,4-Dichlorobenzene	< 2.00	ug/L		3/8/2017 17:23
1,4-dioxane	~~< 20.0~~ R	ug/L		3/8/2017 17:23
2-Butanone	< 10.0	ug/L		3/8/2017 17:23
2-Hexanone	< 5.00	ug/L		3/8/2017 17:23
4-Methyl-2-pentanone	< 5.00	ug/L		3/8/2017 17:23
Acetone	< 10.0 UJ	ug/L		3/8/2017 17:23
Benzene	< 1.00	ug/L		3/8/2017 17:23
Bromochloromethane	< 5.00	ug/L		3/8/2017 17:23
Bromodichloromethane	< 2.00	ug/L		3/8/2017 17:23
Bromoform	< 5.00	ug/L		3/8/2017 17:23
Bromomethane	< 2.00 UJ	ug/L		3/8/2017 17:23
Carbon disulfide	< 2.00	ug/L		3/8/2017 17:23
Carbon Tetrachloride	< 2.00	ug/L		3/8/2017 17:23
Chlorobenzene	< 2.00	ug/L		3/8/2017 17:23

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Report Prepared Thursday, March 09, 2017

MFP 5/14/17

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-1
Lab Sample ID: 170791-01
Matrix: Groundwater
Date Sampled: 3/2/2017
Date Received: 3/3/2017

Chloroethane	< 2.00		ug/L	3/8/2017 17:23
Chloroform	< 2.00		ug/L	3/8/2017 17:23
Chloromethane	< 2.00		ug/L	3/8/2017 17:23
cis-1,2-Dichloroethene	< 2.00		ug/L	3/8/2017 17:23
cis-1,3-Dichloropropene	< 2.00		ug/L	3/8/2017 17:23
Cyclohexane	< 10.0		ug/L	3/8/2017 17:23
Dibromochloromethane	< 2.00		ug/L	3/8/2017 17:23
Dichlorodifluoromethane	< 2.00	VJ	ug/L	3/8/2017 17:23
Ethylbenzene	< 2.00		ug/L	3/8/2017 17:23
Freon 113	< 2.00		ug/L	3/8/2017 17:23
Isopropylbenzene	< 2.00		ug/L	3/8/2017 17:23
m,p-Xylene	< 2.00		ug/L	3/8/2017 17:23
Methyl acetate	< 2.00		ug/L	3/8/2017 17:23
Methyl tert-butyl Ether	< 2.00		ug/L	3/8/2017 17:23
Methylcyclohexane	< 2.00		ug/L	3/8/2017 17:23
Methylene chloride	< 5.00		ug/L	3/8/2017 17:23
o-Xylene	< 2.00		ug/L	3/8/2017 17:23
Styrene	< 5.00		ug/L	3/8/2017 17:23
Tetrachloroethene	< 2.00		ug/L	3/8/2017 17:23
Toluene	< 2.00		ug/L	3/8/2017 17:23
trans-1,2-Dichloroethene	< 2.00		ug/L	3/8/2017 17:23
trans-1,3-Dichloropropene	< 2.00		ug/L	3/8/2017 17:23
Trichloroethene	< 2.00		ug/L	3/8/2017 17:23
Trichlorofluoromethane	< 2.00		ug/L	3/8/2017 17:23
Vinyl chloride	< 2.00		ug/L	3/8/2017 17:23

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Report Prepared Thursday, March 09, 2017

MVP 5/14/17

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-1
Lab Sample ID: 170791-01 **Date Sampled:** 3/2/2017
Matrix: Groundwater **Date Received:** 3/3/2017

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed
1,2-Dichloroethane-d4	106	81.2 - 120		3/8/2017 17:23
4-Bromofluorobenzene	87.2	82.4 - 112		3/8/2017 17:23
Pentafluorobenzene	94.3	90.2 - 112		3/8/2017 17:23
Toluene-D8	96.4	89.9 - 109		3/8/2017 17:23

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x39899.D

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Report Prepared Thursday, March 09, 2017

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-2
Lab Sample ID: 170791-02
Matrix: Groundwater
Date Sampled: 3/2/2017
Date Received: 3/3/2017

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		3/8/2017 20:49
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		3/8/2017 20:49
1,1,2-Trichloroethane	< 2.00	ug/L		3/8/2017 20:49
1,1-Dichloroethane	< 2.00	ug/L		3/8/2017 20:49
1,1-Dichloroethene	< 2.00	ug/L		3/8/2017 20:49
1,2,3-Trichlorobenzene	< 5.00	ug/L		3/8/2017 20:49
1,2,4-Trichlorobenzene	< 5.00	ug/L		3/8/2017 20:49
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		3/8/2017 20:49
1,2-Dibromoethane	< 2.00	ug/L		3/8/2017 20:49
1,2-Dichlorobenzene	< 2.00	ug/L		3/8/2017 20:49
1,2-Dichloroethane	< 2.00	ug/L		3/8/2017 20:49
1,2-Dichloropropane	< 2.00	ug/L		3/8/2017 20:49
1,3-Dichlorobenzene	< 2.00	ug/L		3/8/2017 20:49
1,4-Dichlorobenzene	< 2.00	ug/L		3/8/2017 20:49
1,4-dioxane	~~< 20.0~~ R	ug/L		3/8/2017 20:49
2-Butanone	< 10.0	ug/L		3/8/2017 20:49
2-Hexanone	< 5.00	ug/L		3/8/2017 20:49
4-Methyl-2-pentanone	< 5.00	ug/L		3/8/2017 20:49
Acetone	6.60 ~~J~~	ug/L	J	3/8/2017 20:49
Benzene	< 1.00	ug/L		3/8/2017 20:49
Bromochloromethane	< 5.00	ug/L		3/8/2017 20:49
Bromodichloromethane	< 2.00	ug/L		3/8/2017 20:49
Bromoform	< 5.00	ug/L		3/8/2017 20:49
Bromomethane	< 2.00 UJ	ug/L		3/8/2017 20:49
Carbon disulfide	< 2.00	ug/L		3/8/2017 20:49
Carbon Tetrachloride	< 2.00	ug/L		3/8/2017 20:49
Chlorobenzene	< 2.00	ug/L		3/8/2017 20:49

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Report Prepared Thursday, March 09, 2017

MKP 5/14/17

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-2
Lab Sample ID: 170791-02 **Date Sampled:** 3/2/2017
Matrix: Groundwater **Date Received:** 3/3/2017

Chloroethane	< 2.00	ug/L		3/8/2017 20:49
Chloroform	< 2.00	ug/L		3/8/2017 20:49
Chloromethane	< 2.00	ug/L		3/8/2017 20:49
cis-1,2-Dichloroethene	< 2.00	ug/L		3/8/2017 20:49
cis-1,3-Dichloropropene	< 2.00	ug/L		3/8/2017 20:49
Cyclohexane	< 10.0	ug/L		3/8/2017 20:49
Dibromochloromethane	< 2.00	ug/L		3/8/2017 20:49
Dichlorodifluoromethane	< 2.00 UJ	ug/L		3/8/2017 20:49
Ethylbenzene	< 2.00	ug/L		3/8/2017 20:49
Freon 113	< 2.00	ug/L		3/8/2017 20:49
Isopropylbenzene	< 2.00	ug/L		3/8/2017 20:49
m,p-Xylene	1.94	ug/L	J	3/8/2017 20:49
Methyl acetate	< 2.00	ug/L		3/8/2017 20:49
Methyl tert-butyl Ether	< 2.00	ug/L		3/8/2017 20:49
Methylcyclohexane	< 2.00	ug/L		3/8/2017 20:49
Methylene chloride	< 5.00	ug/L		3/8/2017 20:49
o-Xylene	1.99	ug/L	J	3/8/2017 20:49
Styrene	< 5.00	ug/L		3/8/2017 20:49
Tetrachloroethene	< 2.00	ug/L		3/8/2017 20:49
Toluene	< 2.00	ug/L		3/8/2017 20:49
trans-1,2-Dichloroethene	< 2.00	ug/L		3/8/2017 20:49
trans-1,3-Dichloropropene	< 2.00	ug/L		3/8/2017 20:49
Trichloroethene	< 2.00	ug/L		3/8/2017 20:49
Trichlorofluoromethane	< 2.00	ug/L		3/8/2017 20:49
Vinyl chloride	< 2.00	ug/L		3/8/2017 20:49

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Report Prepared Thursday, March 09, 2017

MKP 5/11/17

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-2
Lab Sample ID: 170791-02 **Date Sampled:** 3/2/2017
Matrix: Groundwater **Date Received:** 3/3/2017

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	106	81.2 - 120		3/8/2017	20:49
4-Bromofluorobenzene	93.6	82.4 - 112		3/8/2017	20:49
Pentafluorobenzene	95.4	90.2 - 112		3/8/2017	20:49
Toluene-D8	95.0	89.9 - 109		3/8/2017	20:49

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x39908.D

This report is part of a multipage document and should only be evaluated in its entirety. The Chain of Custody provides additional sample information, including compliance with the sample condition requirements upon receipt.

Report Prepared Thursday, March 09, 2017

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-3
Lab Sample ID: 170791-03
Matrix: Groundwater
Date Sampled: 3/2/2017
Date Received: 3/3/2017

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		3/8/2017 18:09
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		3/8/2017 18:09
1,1,2-Trichloroethane	< 2.00	ug/L		3/8/2017 18:09
1,1-Dichloroethane	< 2.00	ug/L		3/8/2017 18:09
1,1-Dichloroethene	< 2.00	ug/L		3/8/2017 18:09
1,2,3-Trichlorobenzene	< 5.00	ug/L		3/8/2017 18:09
1,2,4-Trichlorobenzene	< 5.00	ug/L		3/8/2017 18:09
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		3/8/2017 18:09
1,2-Dibromoethane	< 2.00	ug/L		3/8/2017 18:09
1,2-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:09
1,2-Dichloroethane	< 2.00	ug/L		3/8/2017 18:09
1,2-Dichloropropane	< 2.00	ug/L		3/8/2017 18:09
1,3-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:09
1,4-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:09
1,4-dioxane	~~< 20.0~~ R	ug/L		3/8/2017 18:09
2-Butanone	< 10.0	ug/L		3/8/2017 18:09
2-Hexanone	< 5.00	ug/L		3/8/2017 18:09
4-Methyl-2-pentanone	< 5.00	ug/L		3/8/2017 18:09
Acetone	< 10.0 UJ	ug/L		3/8/2017 18:09
Benzene	< 1.00	ug/L		3/8/2017 18:09
Bromochloromethane	< 5.00	ug/L		3/8/2017 18:09
Bromodichloromethane	< 2.00	ug/L		3/8/2017 18:09
Bromoform	< 5.00	ug/L		3/8/2017 18:09
Bromomethane	< 2.00 UJ	ug/L		3/8/2017 18:09
Carbon disulfide	< 2.00	ug/L		3/8/2017 18:09
Carbon Tetrachloride	< 2.00	ug/L		3/8/2017 18:09
Chlorobenzene	< 2.00	ug/L		3/8/2017 18:09

This report is part of a multipage document and should only be evaluated in its entirety. The Chain of Custody provides additional sample information, including compliance with the sample condition requirements upon receipt.

Report Prepared Thursday, March 09, 2017

MKP 5/14/17

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-3
Lab Sample ID: 170791-03 **Date Sampled:** 3/2/2017
Matrix: Groundwater **Date Received:** 3/3/2017

Chloroethane	< 2.00	ug/L		3/8/2017	18:09
Chloroform	< 2.00	ug/L		3/8/2017	18:09
Chloromethane	< 2.00	ug/L		3/8/2017	18:09
cis-1,2-Dichloroethene	< 2.00	ug/L		3/8/2017	18:09
cis-1,3-Dichloropropene	< 2.00	ug/L		3/8/2017	18:09
Cyclohexane	< 10.0	ug/L		3/8/2017	18:09
Dibromochloromethane	< 2.00	ug/L		3/8/2017	18:09
Dichlorodifluoromethane	< 2.00 UJ	ug/L		3/8/2017	18:09
Ethylbenzene	< 2.00	ug/L		3/8/2017	18:09
Freon 113	< 2.00	ug/L		3/8/2017	18:09
Isopropylbenzene	< 2.00	ug/L		3/8/2017	18:09
m,p-Xylene	< 2.00	ug/L		3/8/2017	18:09
Methyl acetate	< 2.00	ug/L		3/8/2017	18:09
Methyl tert-butyl Ether	< 2.00	ug/L		3/8/2017	18:09
Methylcyclohexane	< 2.00	ug/L		3/8/2017	18:09
Methylene chloride	< 5.00	ug/L		3/8/2017	18:09
o-Xylene	< 2.00	ug/L		3/8/2017	18:09
Styrene	< 5.00	ug/L		3/8/2017	18:09
Tetrachloroethene	1.92	ug/L	J	3/8/2017	18:09
Toluene	< 2.00	ug/L		3/8/2017	18:09
trans-1,2-Dichloroethene	< 2.00	ug/L		3/8/2017	18:09
trans-1,3-Dichloropropene	< 2.00	ug/L		3/8/2017	18:09
Trichloroethene	< 2.00	ug/L		3/8/2017	18:09
Trichlorofluoromethane	< 2.00	ug/L		3/8/2017	18:09
Vinyl chloride	< 2.00	ug/L		3/8/2017	18:09

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Report Prepared Thursday, March 09, 2017

MFP 5/14/17

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-3
Lab Sample ID: 170791-03 **Date Sampled:** 3/2/2017
Matrix: Groundwater **Date Received:** 3/3/2017

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**107**	81.2 - 120		3/8/2017	18:09
4-Bromofluorobenzene	**88.1**	82.4 - 112		3/8/2017	18:09
Pentafluorobenzene	**96.2**	90.2 - 112		3/8/2017	18:09
Toluene-D8	**96.4**	89.9 - 109		3/8/2017	18:09

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x39901.D

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Report Prepared Thursday, March 09, 2017

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier:	MW-4		
Lab Sample ID:	170791-04	**Date Sampled:**	3/2/2017
Matrix:	Groundwater	**Date Received:**	3/3/2017

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		3/8/2017 18:32
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		3/8/2017 18:32
1,1,2-Trichloroethane	< 2.00	ug/L		3/8/2017 18:32
1,1-Dichloroethane	< 2.00	ug/L		3/8/2017 18:32
1,1-Dichloroethene	< 2.00	ug/L		3/8/2017 18:32
1,2,3-Trichlorobenzene	< 5.00	ug/L		3/8/2017 18:32
1,2,4-Trichlorobenzene	< 5.00	ug/L		3/8/2017 18:32
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		3/8/2017 18:32
1,2-Dibromoethane	< 2.00	ug/L		3/8/2017 18:32
1,2-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:32
1,2-Dichloroethane	< 2.00	ug/L		3/8/2017 18:32
1,2-Dichloropropane	< 2.00	ug/L		3/8/2017 18:32
1,3-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:32
1,4-Dichlorobenzene	< 2.00	ug/L		3/8/2017 18:32
1,4-dioxane	~~< 20.0~~	ug/L	R	3/8/2017 18:32
2-Butanone	< 10.0	ug/L		3/8/2017 18:32
2-Hexanone	< 5.00	ug/L		3/8/2017 18:32
4-Methyl-2-pentanone	< 5.00	ug/L		3/8/2017 18:32
Acetone	< 10.0	ug/L	UJ	3/8/2017 18:32
Benzene	< 1.00	ug/L		3/8/2017 18:32
Bromochloromethane	< 5.00	ug/L		3/8/2017 18:32
Bromodichloromethane	< 2.00	ug/L		3/8/2017 18:32
Bromoform	< 5.00	ug/L		3/8/2017 18:32
Bromomethane	< 2.00	ug/L	UJ	3/8/2017 18:32
Carbon disulfide	< 2.00	ug/L		3/8/2017 18:32
Carbon Tetrachloride	< 2.00	ug/L		3/8/2017 18:32
Chlorobenzene	< 2.00	ug/L		3/8/2017 18:32

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Report Prepared Thursday, March 09, 2017

MFP 5/14/17

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier:	MW-4		
Lab Sample ID:	170791-04	**Date Sampled:**	3/2/2017
Matrix:	Groundwater	**Date Received:**	3/3/2017

Chloroethane	< 2.00		ug/L	3/8/2017 18:32
Chloroform	< 2.00		ug/L	3/8/2017 18:32
Chloromethane	< 2.00		ug/L	3/8/2017 18:32
cis-1,2-Dichloroethene	< 2.00		ug/L	3/8/2017 18:32
cis-1,3-Dichloropropene	< 2.00		ug/L	3/8/2017 18:32
Cyclohexane	< 10.0		ug/L	3/8/2017 18:32
Dibromochloromethane	< 2.00		ug/L	3/8/2017 18:32
Dichlorodifluoromethane	< 2.00	UJ	ug/L	3/8/2017 18:32
Ethylbenzene	< 2.00		ug/L	3/8/2017 18:32
Freon 113	< 2.00		ug/L	3/8/2017 18:32
Isopropylbenzene	< 2.00		ug/L	3/8/2017 18:32
m,p-Xylene	< 2.00		ug/L	3/8/2017 18:32
Methyl acetate	< 2.00		ug/L	3/8/2017 18:32
Methyl tert-butyl Ether	< 2.00		ug/L	3/8/2017 18:32
Methylcyclohexane	< 2.00		ug/L	3/8/2017 18:32
Methylene chloride	< 5.00		ug/L	3/8/2017 18:32
o-Xylene	< 2.00		ug/L	3/8/2017 18:32
Styrene	< 5.00		ug/L	3/8/2017 18:32
Tetrachloroethene	< 2.00		ug/L	3/8/2017 18:32
Toluene	< 2.00		ug/L	3/8/2017 18:32
trans-1,2-Dichloroethene	< 2.00		ug/L	3/8/2017 18:32
trans-1,3-Dichloropropene	< 2.00		ug/L	3/8/2017 18:32
Trichloroethene	< 2.00		ug/L	3/8/2017 18:32
Trichlorofluoromethane	< 2.00		ug/L	3/8/2017 18:32
Vinyl chloride	< 2.00		ug/L	3/8/2017 18:32

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Report Prepared Thursday, March 09, 2017

MEP 5/14/17

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier: MW-4
Lab Sample ID: 170791-04 **Date Sampled:** 3/2/2017
Matrix: Groundwater **Date Received:** 3/3/2017

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**107**	81.2 - 120		3/8/2017	18:32
4-Bromofluorobenzene	**84.3**	82.4 - 112		3/8/2017	18:32
Pentafluorobenzene	**95.0**	90.2 - 112		3/8/2017	18:32
Toluene-D8	**99.6**	89.9 - 109		3/8/2017	18:32

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x39902.D

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Report Prepared Thursday, March 09, 2017

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier:	T-736 Trip Blank		
Lab Sample ID:	170791-05	**Date Sampled:**	3/2/2017
Matrix:	Water	**Date Received:**	3/3/2017

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		3/8/2017 16:59
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		3/8/2017 16:59
1,1,2-Trichloroethane	< 2.00	ug/L		3/8/2017 16:59
1,1-Dichloroethane	< 2.00	ug/L		3/8/2017 16:59
1,1-Dichloroethene	< 2.00	ug/L		3/8/2017 16:59
1,2,3-Trichlorobenzene	< 5.00	ug/L		3/8/2017 16:59
1,2,4-Trichlorobenzene	< 5.00	ug/L		3/8/2017 16:59
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		3/8/2017 16:59
1,2-Dibromoethane	< 2.00	ug/L		3/8/2017 16:59
1,2-Dichlorobenzene	< 2.00	ug/L		3/8/2017 16:59
1,2-Dichloroethane	< 2.00	ug/L		3/8/2017 16:59
1,2-Dichloropropane	< 2.00	ug/L		3/8/2017 16:59
1,3-Dichlorobenzene	< 2.00	ug/L		3/8/2017 16:59
1,4-Dichlorobenzene	< 2.00	ug/L		3/8/2017 16:59
1,4-dioxane	~~< 20.0~~	ug/L	R	3/8/2017 16:59
2-Butanone	< 10.0	ug/L		3/8/2017 16:59
2-Hexanone	< 5.00	ug/L		3/8/2017 16:59
4-Methyl-2-pentanone	< 5.00	ug/L		3/8/2017 16:59
Acetone	< 10.0	ug/L	UJ	3/8/2017 16:59
Benzene	< 1.00	ug/L		3/8/2017 16:59
Bromochloromethane	< 5.00	ug/L		3/8/2017 16:59
Bromodichloromethane	< 2.00	ug/L		3/8/2017 16:59
Bromoform	< 5.00	ug/L		3/8/2017 16:59
Bromomethane	< 2.00	ug/L	UJ	3/8/2017 16:59
Carbon disulfide	< 2.00	ug/L		3/8/2017 16:59
Carbon Tetrachloride	< 2.00	ug/L		3/8/2017 16:59
Chlorobenzene	< 2.00	ug/L		3/8/2017 16:59

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Report Prepared Thursday, March 09, 2017

MMP 5/14/17

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier:	T-736 Trip Blank		
Lab Sample ID:	170791-05	**Date Sampled:**	3/2/2017
Matrix:	Water	**Date Received:**	3/3/2017

Chloroethane	< 2.00	ug/L	3/8/2017 16:59
Chloroform	< 2.00	ug/L	3/8/2017 16:59
Chloromethane	< 2.00	ug/L	3/8/2017 16:59
cis-1,2-Dichloroethene	< 2.00	ug/L	3/8/2017 16:59
cis-1,3-Dichloropropene	< 2.00	ug/L	3/8/2017 16:59
Cyclohexane	< 10.0	ug/L	3/8/2017 16:59
Dibromochloromethane	< 2.00	ug/L	3/8/2017 16:59
Dichlorodifluoromethane	< 2.00 UJ	ug/L	3/8/2017 16:59
Ethylbenzene	< 2.00	ug/L	3/8/2017 16:59
Freon 113	< 2.00	ug/L	3/8/2017 16:59
Isopropylbenzene	< 2.00	ug/L	3/8/2017 16:59
m,p-Xylene	< 2.00	ug/L	3/8/2017 16:59
Methyl acetate	< 2.00	ug/L	3/8/2017 16:59
Methyl tert-butyl Ether	< 2.00	ug/L	3/8/2017 16:59
Methylcyclohexane	< 2.00	ug/L	3/8/2017 16:59
Methylene chloride	< 5.00	ug/L	3/8/2017 16:59
o-Xylene	< 2.00	ug/L	3/8/2017 16:59
Styrene	< 5.00	ug/L	3/8/2017 16:59
Tetrachloroethene	< 2.00	ug/L	3/8/2017 16:59
Toluene	< 2.00	ug/L	3/8/2017 16:59
trans-1,2-Dichloroethene	< 2.00	ug/L	3/8/2017 16:59
trans-1,3-Dichloropropene	< 2.00	ug/L	3/8/2017 16:59
Trichloroethene	< 2.00	ug/L	3/8/2017 16:59
Trichlorofluoromethane	< 2.00	ug/L	3/8/2017 16:59
Vinyl chloride	< 2.00	ug/L	3/8/2017 16:59

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Report Prepared Thursday, March 09, 2017

MKP 5/14/17

PARADIGM
ENVIRONMENTAL SERVICES, INC.

Lab Project ID: 170791

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave

Sample Identifier: T-736 Trip Blank
Lab Sample ID: 170791-05 **Date Sampled:** 3/2/2017
Matrix: Water **Date Received:** 3/3/2017

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**107**	81.2 - 120		3/8/2017	16:59
4-Bromofluorobenzene	**86.1**	82.4 - 112		3/8/2017	16:59
Pentafluorobenzene	**97.6**	90.2 - 112		3/8/2017	16:59
Toluene-D8	**94.2**	89.9 - 109		3/8/2017	16:59

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x39898.D

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Report Prepared Thursday, March 09, 2017

Appendix B

Laboratory QC Documentation

Response Factor Report Instrument #1

Method Path : C:\msdchem\1\METHODS\
Method File : 170301.M
Title : 8260/624 Analysis
Last Update : Wed Mar 01 15:09:13 2017
Response Via : Initial Calibration

3/1/17 BB

Calibration Files
1 =x39602.D 2 =x39603.D 3 =x39604.D 4 =x39605.D 5 =x39606.D 6 =x39607.D 7 =x39608.D

		Compound	1	2	3	4	5	6	7	Avg	%RSD	
1)	I	Fluorobenzene	----------	----------	ISTD	----------	----------	----------	----------			
2)	P	Dichlorodifluo...	0.179	0.241	0.246	0.260	0.239	0.218	0.219	0.229	11.60	
3)	P	Chloromethane	0.272	0.321	0.324	0.327	0.321	0.316	0.317	0.314	5.97	
4)	P	Vinyl chloride	0.211	0.269	0.273	0.291	0.269	0.264	0.265	0.263	9.45	
5)	P	Bromomethane	0.215	0.198	0.178	0.157	0.126	0.113		0.165	24.32	*
6)	P	Chloroethane	0.125	0.156	0.154	0.153	0.128	0.122	0.098	0.134	16.16	
7)	P	Trichlorofluor...	0.252	0.337	0.344	0.362	0.333	0.307	0.301	0.319	11.43	
8)		Ethyl ether	0.167	0.184	0.190	0.193	0.186	0.184	0.183	0.184	4.58	
9)	P	Freon 113	0.149	0.189	0.200	0.214	0.194	0.180	0.177	0.186	11.03	
10)	P	1,1-Dichloroet...	0.249	0.312	0.325	0.347	0.317	0.298	0.293	0.306	10.03	
11)	P	Acetone	0.262	0.113	0.093	0.089	0.079	0.074	0.080	0.113	59.41	*
12)		Isopropyl Alcohol	0.014	0.016	0.016	0.016	0.016	0.015	0.017	0.016	6.56	
13)	P	Carbon disulfide	0.421	0.529	0.600	0.666	0.630	0.608	0.599	0.579	13.99	
14)	P	Methyl acetate	0.155	0.175	0.181	0.173	0.168	0.159	0.166	0.168	5.29	
15)	P	Methylene chlo...	0.266	0.250	0.249	0.249	0.236	0.234	0.229	0.245	5.18	
16)		Acrylonitrile	0.064	0.088	0.091	0.091	0.088	0.083	0.087	0.084	11.21	
17)		tert-Butyl Alc...	0.020	0.027	0.029	0.029	0.030	0.028	0.032	0.028	14.28	
18)	P	Methyl tert-bu...	0.546	0.620	0.648	0.665	0.641	0.636	0.636	0.627	6.13	
19)	P	trans-1,2-Dich...	0.283	0.322	0.322	0.333	0.309	0.297	0.285	0.307	6.38	
20)	P	1,1-Dichloroet...	0.438	0.496	0.515	0.524	0.511	0.498	0.490	0.496	5.67	
21)		Vinyl acetate	0.357	0.445	0.506	0.544	0.550	0.540	0.550	0.499	14.61	
22)		2,2-Dichloropr...	0.245	0.318	0.363	0.397	0.383	0.370	0.367	0.349	14.86	
23)	P	2-Butanone		0.034	0.041	0.042	0.041	0.039	0.041	0.039#	7.83	
24)	P	cis-1,2-Dichlo...	0.275	0.311	0.324	0.335	0.322	0.315	0.307	0.313	6.12	
25)		Bromochloromet...	0.117	0.143	0.151	0.151	0.149	0.148	0.145	0.143	8.47	
26)	P	Chloroform	0.438	0.502	0.516	0.526	0.502	0.496	0.482	0.495	5.76	
27)	S	Pentafluoroben...	0.536	0.537	0.546	0.552	0.552	0.549	0.549	0.546	1.22	
28)		Tetrahydrofuran	0.058	0.074	0.089	0.088	0.089	0.084	0.091	0.082	14.44	
29)	P	1,1,1-Trichlor...	0.294	0.367	0.396	0.429	0.410	0.394	0.390	0.383	11.42	
30)	P	Cyclohexane	0.306	0.417	0.464	0.539	0.482	0.421	0.459	0.441	16.36	
31)	S	1,2-Dichloroet...	0.257	0.262	0.260	0.261	0.258	0.256	0.262	0.259	0.92	
32)	P	Carbon Tetrach...	0.211	0.294	0.335	0.378	0.360	0.336	0.338	0.322	17.22	
33)	P	Benzene	1.039	1.191	1.217	1.241	1.167	1.120	1.086	1.152	6.35	
34)	P	1,2-Dichloroet...	0.341	0.363	0.383	0.387	0.374	0.369	0.366	0.369	4.05	
35)	P	Trichloroethene	0.231	0.278	0.297	0.316	0.301	0.292	0.290	0.287	9.40	
36)		tert-Butyl Ace...		0.076	0.100	0.116	0.132	0.143	0.155	0.120	24.27	*
37)	P	Methylcyclohexane	0.268	0.447	0.514	0.561	0.517	0.489	0.477	~~0.468~~	20.33	
38)		1,4-Dioxane			0.003	0.004	0.005	0.004	0.005	0.004	14.33	

RF < 0.005

* curve is not avg. of response factors

Evaluate Continuing Calibration Report

96

Data File: C:\msdchem\1\DATA\170308\x39886.D
DataAcq Meth:8260RUN.M
Acq On : 8 Mar 2017 11:23 am Operator: Bill Brew
Sample : 50ppb mega CC Inst : Instrument #1
Misc :
ALS Vial : 4 Sample Multiplier: 1

Quant Time: Mar 08 11:38:31 2017
Quant Method : C:\msdchem\1\METHODS\170301.M
Quant Title : 8260/624 Analysis
QLast Update : Wed Mar 01 15:09:13 2017
Response via : Initial Calibration
Integrator: RTE

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

3/8/17 BB

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.000	1.000	0.0	91	0.00
2	P	Dichlorodifluoromethane	0.229	0.183	20.1#	64	0.00
3	P	Chloromethane	0.314	0.266	15.3	74	0.00
4	P	Vinyl chloride	0.263	0.227	13.7	71	0.00
5	P	Bromomethane	0.165	0.128	22.4#	74	0.00
6	P	Chloroethane	0.134	0.125	6.7	74	0.00
7	P	Trichlorofluoromethane	0.319	0.321	-0.6	80	0.00
8		Ethyl ether	0.184	0.157	14.7	74	0.00
9	P	Freon 113	0.186	0.185	0.5	79	0.00
10	P	1,1-Dichloroethene	0.306	0.287	6.2	75	0.00
11	P	Acetone	0.113	0.087#	23.0#	89	0.00
12		Isopropyl Alcohol	0.016	0.015	6.3	85	0.00
13	P	Carbon disulfide	0.579	0.538	7.1	73	0.00
14	P	Methyl acetate	0.168	0.154	8.3	80	0.00
15	P	Methylene chloride	0.245	0.215	12.2	78	0.00
16		Acrylonitrile	0.084	0.080	4.8	80	0.00
17		tert-Butyl Alcohol	0.028	0.031	-10.7	95	0.00
18	P	Methyl tert-butyl Ether	0.627	0.609	2.9	83	0.00
19	P	trans-1,2-Dichloroethene	0.307	0.281	8.5	77	0.00
20	P	1,1-Dichloroethane	0.496	0.479	3.4	83	0.00
21		Vinyl acetate	0.499	0.490	1.8	82	0.00
22		2,2-Dichloropropane	0.349	0.382	-9.5	87	0.00
23	P	2-Butanone	0.039	0.045#	-15.4	97	0.00
24	P	cis-1,2-Dichloroethene	0.313	0.307	1.9	83	0.00
25		Bromochloromethane	0.143	0.144	-0.7	87	0.00
26	P	Chloroform	0.495	0.495	0.0	85	0.00
27	S	Pentafluorobenzene	0.546	0.551	-0.9	90	0.00
28		Tetrahydrofuran	0.082	0.086	-4.9	88	0.00
29	P	1,1,1-Trichloroethane	0.383	0.403	-5.2	85	0.00
30	P	Cyclohexane	0.441	0.439	0.5	74	0.00
31	S	1,2-Dichloroethane-d4	0.259	0.269	-3.9	94	0.00
32	P	Carbon Tetrachloride	0.322	0.352	-9.3	84	0.00
33	P	Benzene	1.152	1.142	0.9	83	0.00
34	P	1,2-Dichloroethane	0.369	0.361	2.2	85	0.00
35	P	Trichloroethene	0.287	0.292	-1.7	84	0.00
36		tert-Butyl Acetate	0.120	0.134	-11.7	104	0.00
37	P	Methylcyclohexane	0.468	0.501	-7.1	81	0.00
38		1,4-Dioxane	0.004	0.005	-25.0#	96	0.00
39	UN	Ethyl acetate	0.000	0.000	0.0	0#	0.00
40	P	1,2-Dichloropropane	0.294	0.288	2.0	83	0.00
41	UN	Isobutyl alcohol	0.000	0.000	0.0	0#	0.00
42		Dibromomethane	0.179	0.179	0.0	85	0.00
43	P	Bromodichloromethane	0.353	0.356	-0.8	84	0.00
44		2-Chloroethyl vinyl Ether	0.168	0.146	13.1	73	0.00
45	UN	Isopropyl acetate	0.000	0.000	0.0	0#	0.00
46		1,1-Dichloropropene	0.372	0.377	-1.3	82	0.00
47	P	cis-1,3-Dichloropropene	0.440	0.466	-5.9	85	0.00

%D > 20 %

Appendix C

Validator Qualifications

KENNETH R. APPLIN
Geochemist/Data Validator

Ph.D., Geochemistry and Mineralogy, The Pennsylvania State University

M.S., Geochemistry and Mineralogy, The Pennsylvania State University

B.A., Geological Sciences, SUNY at Geneseo, NY

Dr. Applin has over 35 years of experience working with the geochemistry of natural waters. His prior experience includes working as an Assistant Professor of Geology at the University of Missouri-Columbia and as Chief Hydrogeologist and Geochemist with a leading engineering firm in Rochester, NY. In 1993, he established KR Applin and Associates, a small consulting business that focuses on the geochemistry of natural waters, especially as applied to problems involving the contamination of groundwater and surface water.

Dr. Applin is also an experienced analytical data validator and has provided data validation services since 1994 to a variety of clients performing brownfield cleanup projects, hazardous waste remediation, groundwater monitoring at solid waste facilities, and other projects requiring third-party data validation. Dr. Applin has several years of hands-on experience with the laboratory analysis of natural waters and has successfully completed the USEPA Region II certification courses for performing inorganic and organic analytical data validation.

MICHAEL K. PERRY
Chemist/Data Validator

B.S. Chemistry, Georgia State University, Atlanta, GA

A.A.S., Chemical Technology, Alfred State College, Alfred, NY

Mr. Perry has over 30 years of experience in the analytical laboratory business. During his early career, he spent several years as a laboratory analyst performing the analysis of soil, water, and air samples for inorganic and organic chemical parameters. During his last 20 years in the environmental laboratory business, he managed and directed two major analytical laboratories in Rochester, NY. His management responsibilities included oversight of the daily operations of the lab, staff training and supervision, the selection, purchase, and maintenance of analytical instruments, the introduction of new laboratory methods, analytical quality assurance and quality control, data acquisition and management, and other business-related activities.

Mr. Perry has an extensive working knowledge of the methods and procedures used for sampling and analyzing both inorganic and organic analytes in soil, water, and air. He is an accomplished laboratory chemist and is familiar with the analytical methods and procedures established under the USEPA Contract Laboratory Protocols (CLP), the NYSDEC Analytical Services Protocols (ASP), and the NYSDOH Environmental Laboratory Approval Program (ELAP).

DATA USABILITY SUMMARY REPORT (DUSR)

3130 Monroe Ave.
Rochester, NY
NYSDEC BCP # C 828109

SDG: 184515

4 Water Samples

Prepared for:

Ravi Engineering & Land Surveying, P.C.
2110 South Clinton Avenue, Suite 1
Rochester, NY 14618

January 2019

EDU Environmental Data Usability 10028 Deer Park Dr. Dansville, NY 14437 585.991.9156

REVIEWER'S NARRATIVE
SDG 184515

The data associated with this Sample Delivery Group (SDG) 184515, analyzed by Paradigm Environmental Services, Inc. Rochester, NY have been reviewed in accordance with assessment criteria provided by the New York State Department of Environmental Conservation following the review procedures provided in the USEPA Functional Guidelines for evaluating organic and inorganic data.

All analytical results reported by the laboratory are considered valid and acceptable except results that have been qualified as rejected, "R". Results qualified as estimated "J", or as non-detects, "U", are considered usable for the purpose of evaluating water and/or soil quality. However, these qualifiers indicate that the accuracy and/or precision of the analytical result is questionable. A summary of all data that have been qualified and the reasons for qualification are provided in the following data usability summary report (DUSR).

Two facts should be noted by all data users. First, the "R" qualifier means that the associated value is unusable. In other words, due to significant quality control (QC) problems, the analysis is invalid and provides no information as to whether the analyte is present or not. Values qualified with an "R" should not appear on the final data tables because they cannot be relied upon, even as the last resort. Second, no analyte concentration, even if it has passed all QC tests, is guaranteed to be accurate. Strict QC serves to increase confidence in data, but any value potentially contains error.

Reviewer's Signature: Michael K. Perry Date: 1/17/19

Michael K. Perry
Chemist

Table of Contents

1.0 SUMMARY

SITE:	3130 Monroe Ave. Rochester, NY
SAMPLING DATE:	October 01, 2018
SAMPLE TYPE:	4 water samples
LABORATORY:	Paradigm Environmental Services, Inc. Rochester, NY
SDG No.:	184515

2.0 INTRODUCTION

This data usability summary report (DUSR) was prepared in accordance with guidance provided by the New York State Department of Environmental Conservation (NYSDEC). The DUSR is based on a review and evaluation of the laboratory analytical data package. Specifically, the NYSDEC guidance recommends review and evaluation of the following elements of the data package:

- Completeness of the data package as defined under the requirements of the NYSDEC Analytical Services Protocols (ASP) Category B or the United States Environmental Protection Agency (USEPA) Contract Laboratory Program (CLP) deliverables,
- Compliance with established analyte holding times,
- Adherence to quality control (QC) limits and specifications for blanks, instrument tuning and calibration, surrogate recoveries, spike recoveries, laboratory duplicate analyses, and other QC criteria,
- Adherence to established analytical protocols,
- Conformance of data summary sheets with raw analytical data, and
- Use of correct data qualifiers.

Data deficiencies, analytical protocol deviations, and quality control problems identified using the review criteria above and their effect on the analytical results are discussed in this report.

3.0 SAMPLE AND ANALYSIS SUMMARY

The data package consists of analytical results for, four water samples collected on October 01, 2018. These samples were analyzed for TCL volatile organic compounds.

All laboratory analyses were performed by Paradigm Environmental Services, Inc., Rochester, NY and analyzed as SDG 184515. The analytical results were provided in NYSDEC ASP Category B format, which includes all raw analytical data and laboratory QC data.

4.0 GUIDANCE DOCUMENTS AND DATA REVIEW CRITERIA

The guidance documents used for reviewing laboratory quality control (QC) data and assigning data qualifiers (flags) to analytical results are listed in Table 4-1. The QC limits established in the documents applicable to this data review were used to assess the quality of the analytical results. In some cases, however, QC limits established internally by the laboratory were taken into account to determine data quality.

The QC criteria considered for assessing the usability of the reported analytical results provided for each analyte type (i.e. VOCs, SVOCs, metals, etc.) are listed in Table 4-2. These criteria may vary with the analytical method utilized by the laboratory. These criteria comply with the guidance recommended in Section 2.0 above.

5.0 DATA VALIDATION QUALIFIERS

The letter qualifiers (flags) used to define data usability are described briefly below. These letters are assigned by the data validator to analytical results having questionable accuracy and/or precision as determined by reviewing the laboratory QC data associated with the analytical results.

TABLE 4-1

DATA VALIDATION GUIDANCE DOCUMENTS

Analyte Type	Validation Guidance
VOCs	USEPA, 2008, Validating Volatile Organic Compounds By Gas Chromatography/Mass Spectrometry; SW-846 Method 8260B; SOP # HW-24, Rev. 2. USEPA, 2008, Statement of Work for Organic Analysis of Low/Medium Concentration of Volatile Organic Compounds SOM01.2; SOP HW-33, Rev. 2.
SVOCs	USEPA, 2007, Statement of Work for Organic Analysis of Low/Medium Concentration of Semivolatile Organic Compounds SOM01.2; SOP HW-35, Rev. 1.
Pesticides/PCBs	USEPA, 2006, CLP Organics Data Review and Preliminary Review (CLP/SOW OLMO 4.3); SOP # HW-6, Rev. 14, Part C.
Metals	USEPA, 2006, Validation of Metals for the Contract Laboratory Program (CLP) based on SOW ILMO 5.3 (SOP Revision 13), SOP # HW-2, Rev. 13.
Gen Chemistry	NYSDEC, 2005, Analytical Services Protocols (ASP)
VOCs (Ambient air)	USEPA, 2006, Validating Air Samples, Volatile Organic Analysis of Ambient Air in Canister by Method TO-15; SOP # HW-31, Rev. 4.

TABLE 4-2

QUALITY CONTROL CRITERIA USED FOR VALIDATING
LABORATORY ANALYTICAL DATA

VOCs	SVOCs	Pesticides/PCBs	Metals	Gen Chemistry	Method TO-15
Completeness of Pkg	Completeness of Pkg	Completeness of Pkg	Completeness of Pkg	Completeness of Pkg	Completeness of Pkg
Sample Condition	Sample Condition	Sample Condition	Sample Condition	Sample Condition	Sample Condition
Holding Time	Holding Time	Holding Time	Holding Time	Holding Times	Holding Time
System Monitoring Compounds	Surrogate Recoveries	Surrogate Recoveries	Initial/Continuing Calibration	Calibration	Canister Certification
Lab Control Sample	Lab Control Sample	Matrix Spikes	CRDL Standards	Lab Control Samples	Lab Control Sample
Matrix Spikes	Matrix Spikes	Blanks	Blanks	Blanks	Instrument Tuning
Blanks	Blanks	Instrument Calibration & Verification	Interference Check Sample	Spike Recoveries	Blanks
Instrument Tuning	Instrument Tuning	Analyte ID	Spike Recoveries	Lab Duplicates	Initial Calibration & System Performance
Internal Standards	Internal Standards	Lab Qualifiers	Lab Duplicate		Daily Calibration
Initial Calibration	Initial Calibration	Field Duplicate	Lab Control Sample		Field Duplicate
Continuing Calibration	Continuing Calibration		ICP Serial Dilutions		
Lab Qualifiers	Lab Qualifiers		Lab Qualifiers		
Field Duplicate	Field Duplicate		Field Duplicate		

The laboratory may also use various letters and symbols to flag analytical results generated when QC limits were exceeded. The meanings of these flags may differ from those used by the independent data validator. Those used by the laboratory are provided with the analytical results.

NOTE: The assignment of data qualifiers by the data reviewer (validator) to laboratory analytical results should not necessarily be interpreted by the data user as a measure of laboratory ability or proficiency. Rather, the qualifiers are intended to provide a measure of data accuracy and precision to the data user, which, for example, may provide a level of confidence in determining whether or not standards or cleanup objectives have been met.

U The analyte was analyzed for but was not detected at or above the sample quantitation limit.

J The analyte was positively identified; the associated numerical value is the *approximate* concentration of the analyte in the sample. (The magnitude of any ± value associated with the result is not determined by data validation).

UJ The analyte was not detected above the reported sample quantitation limit. However, the reported quantitation limit is *approximate* and may or may not represent the actual limit of quantitation necessary to accurately and precisely measure the analyte in the sample.

R The sample result is rejected (i.e., is unusable) due to serious deficiencies in the ability to analyze the sample and meet quality control criteria. The presence or absence of the analyte cannot be verified.

N The analysis indicates the presence of an analyte for which there is presumptive evidence to make a "tentative identification".

JN The analyte is considered to be "presumptively present." The associated numerical value represents its *approximate* concentration.

The validated analytical results are attached to this report. Validation qualifiers (flags) are indicated using red ink. Data sheets having qualified data are signed and dated by the data reviewer.

6.0 RESULTS OF THE DATA REVIEW

The results of the data review are summarized in Tables 6-1. The table list the samples where QC criteria were found to exceed acceptable limits and the actions taken to qualify the associated analytical results.

7.0 TOTAL USABLE DATA

For SDG 184515, four samples were analyzed and results were reported for 212 analytes. All results (100 %) are considered usable. See the summary table for the analyses that have been rejected or flagged and the associated QC reasons.

Table 6-1 VOCs

SAMPLES AFFECTED	ANALYTES	ACTION	QC VIOLATION	COMMENTS
none		none		

ACRONYMS

BSP	Blank Spike
CCAL	Continuing Calibration
CCB	Continuing Calibration Blank
CCV	Continuing Calibration Verification
CRDL	Contract Required Detection Limit
CRQL	Contract Required Quantitation Limit
%D	Percent Difference
ICAL	Initial Calibration
ICB	Initial Calibration Blank
IS	Internal Standard
LCS	Laboratory Control Sample
MS/MSD	Matrix Spike/Matrix Spike Duplicate
QA	Quality Assurance
QC	Quality Control
%R	Percent recovery
RPD	Relative Percent Difference
RRF	Relative Response Factor
%RSD	Percent Relative Standard Deviation
TAL	Target Analyte List (metals)
TCL	Target Compound List (organics)

Appendix A

Validated Analytical Results

LAB PROJECT NARRATIVE: 184515
PROJECT NAME: 3130 Monroe Ave 45-17-008
SDG: 4515-01
CLIENT: Ravi Engineering & Land Surveying, P.C.

Four Groundwater samples were collected by the client on October 1, 2018 and received at the Paradigm laboratory on October 2, 2018. Container and holding times were acceptable at time of receipt; the samples were received at 13° Centigrade and were on ice. The samples were submitted with the Chain-of-Custody requesting the TCL list for VOCs. All analyses were performed using EPA SW-846 methods and associated holding times.

The items noted in this case narrative address compliance with the referenced methods, NYSDOH ELAP rules, and any project specific data quality requirements. These may be different from the usability criteria referenced in any "Functional Guidelines" or other data review standards used by data validators.

GENERAL NOTES

ALL ANALYSES

The initial and continuing calibration reports are only evaluated for compounds that are on the sample summary report.

Regarding results on QC summary forms versus included raw data, due to calculations made at the instrument where many significant figures may be used, there may be slight discrepancies between the summary report result and that recorded on the raw data. This does not affect data usability.

VOLATILES and SEMIVOLATILES

Regarding initial calibrations, it should be noted that the Quantitation Report concentrations supplied for the initial calibration reflect the calibration prior to updating. The response factors and areas are correct.

Regarding Quantitation Reports, it should be noted that the "#" symbol that appears on some of the Quantitation Reports is a software artifact and should be disregarded.

VOLATILES

Holding times were met for all samples

The surrogate recoveries for the samples and the associated QC were within acceptance limits.

Site specific QC was not requested on this SDG. The Laboratory Control Sample recovered within acceptance limits.

The Method Blank was free from contamination within the reportable ranges.

The instrument tune passed all criteria and samples were within a 12-hour window.

The internal standards areas and retention times were within acceptance limits for the samples and the associated QC.

All data for the initial calibration was within acceptance limits. Compounds flagged with an "*" on the summary table have been calibrated using a non-average Response Factor calibration curve. The supporting curves are located after the initial calibration table.

All continuing calibration data was within acceptance limits.

(signed) _____ (date) 10/18/2018

Bruce Hoogesteger - President

BATCH LOG

Lab Name: Paradigm Environmental Services
Lab Project #: 184515
Client Name: Ravi Engineering & Land Surveying, P.C.
Client Project Name: 3130 Monroe Ave 45-17-008
Client Project #: N/A
SDG No.: 4515-01

Protocol: SW846 Report Due Date: 10/9/2018 Batch Due Date: 11/1/2018

LAB SAMPLE NO.	MATRIX	CLIENT SAMPLE ID	REQUESTED ANALYSIS	DATE SAMPLED	DATE REC'D
184515-01	Groundwater	HLA-MW-2-2018	TCL VOCs	10/1/2018	10/2/2018
184515-02	Groundwater	MW-2-2018	TCL VOCs	10/1/2018	10/2/2018
184515-03	Groundwater	MW-3-2018	TCL VOCs	10/1/2018	10/2/2018
184515-04	Groundwater	MW-4-2018	TCL VOCs	10/1/2018	10/2/2018

179 Lake Avenue, Rochester, NY 14608 Office (585) 647-2530 Fax (585) 647-3311

CHAIN OF CUSTODY

REPORT TO:	INVOICE TO:	
CLIENT: RAVI	CLIENT: Stone	LAB PROJECT ID: 184515
ADDRESS:	ADDRESS:	
CITY: STATE: ZIP	CITY: STATE: ZIP:	Quotation #:
PHONE: 585-645-5295	PHONE:	Email: wmcAlpin@rawieng.com pmorton@rawieng.com
ATTN: Pat Morton	ATTN:	

PROJECT REFERENCE
3180 Monroe Ave
45-17-008

Matrix Codes:
AQ - Aqueous Liquid; NQ - Non-Aqueous Liquid; WA - Water; WG - Groundwater; DW - Drinking Water; WW - Wastewater; SO - Soil; SL - Sludge; SD - Solid; PT - Paint; WP - Wipe; CK - Caulk; OL - Oil; AR - Air

REQUESTED ANALYSIS

DATE COLLECTED	TIME COLLECTED	COMPOSITE	GRAB	SAMPLE IDENTIFIER	MATRIX CODES	NUMBER OF CONTAINERS	7xL MDA	REMARKS	PARADIGM LAB SAMPLE NUMBER
10/1/18	1245		X	HA-MW-2-2018	WG	2			01
"	1340			MW-2-2018	"	"			02
"	1505			MW-3-2018	"	"			03
"	1610			MW-4-2018	"	"			04

13°C iced started in field
10/1/18 1725 Molly Vail
custody seals NA client delivered

Turnaround Time		Report Supplements			
Availability contingent upon lab approval; additional fees may apply.					
Standard 5 day	X	None Required		None Required	
10 day		Batch QC		Basic EDD	
Rush 3 day		Category A		NYSDEC EDD	X
Rush 2 day		Category B	X		
Rush 1 day					
Other please indicate date needed:		Other please indicate package needed:		Other EDD please indicate EDD needed:	

Sampled By: Liam McAlpin	Date/Time: 10/1/18	Total Cost:	
Relinquished By: Lynn Jensen	Date/Time: 10/1/18 @ 17:23		
Received By: Molly Vail	Date/Time: 10/1/18 1723	P.I.F.	
Received @ Lab By: [signature]	Date/Time: 10/2/18 10:01		

By signing this form, client agrees to Paradigm Terms and Conditions (reverse).

See additional page for sample conditions.

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-4-2018
Lab Sample ID: 184515-04 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		10/4/2018 16:55
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		10/4/2018 16:55
1,1,2-Trichloroethane	< 2.00	ug/L		10/4/2018 16:55
1,1-Dichloroethane	< 2.00	ug/L		10/4/2018 16:55
1,1-Dichloroethene	< 2.00	ug/L		10/4/2018 16:55
1,2,3-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:55
1,2,4-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:55
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		10/4/2018 16:55
1,2-Dibromoethane	< 2.00	ug/L		10/4/2018 16:55
1,2-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:55
1,2-Dichloroethane	< 2.00	ug/L		10/4/2018 16:55
1,2-Dichloropropane	< 2.00	ug/L		10/4/2018 16:55
1,3-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:55
1,4-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:55
1,4-Dioxane	< 20.0	ug/L		10/4/2018 16:55
2-Butanone	< 10.0	ug/L		10/4/2018 16:55
2-Hexanone	< 5.00	ug/L		10/4/2018 16:55
4-Methyl-2-pentanone	< 5.00	ug/L		10/4/2018 16:55
Acetone	< 10.0	ug/L		10/4/2018 16:55
Benzene	< 1.00	ug/L		10/4/2018 16:55
Bromochloromethane	< 5.00	ug/L		10/4/2018 16:55
Bromodichloromethane	< 2.00	ug/L		10/4/2018 16:55
Bromoform	< 5.00	ug/L		10/4/2018 16:55
Bromomethane	< 2.00	ug/L		10/4/2018 16:55
Carbon disulfide	< 2.00	ug/L		10/4/2018 16:55
Carbon Tetrachloride	< 2.00	ug/L		10/4/2018 16:55
Chlorobenzene	< 2.00	ug/L		10/4/2018 16:55

This report is part of a multipage document and should only be evaluated in its entirety. The Chain of Custody provides additional sample information, including compliance with the sample condition requirements upon receipt.

Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier:	MW-4-2018		
Lab Sample ID:	184515-04	**Date Sampled:**	10/1/2018
Matrix:	Groundwater	**Date Received:**	10/2/2018

Chloroethane	< 2.00	ug/L	10/4/2018	16:55
Chloroform	< 2.00	ug/L	10/4/2018	16:55
Chloromethane	< 2.00	ug/L	10/4/2018	16:55
cis-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	16:55
cis-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	16:55
Cyclohexane	< 10.0	ug/L	10/4/2018	16:55
Dibromochloromethane	< 2.00	ug/L	10/4/2018	16:55
Dichlorodifluoromethane	< 2.00	ug/L	10/4/2018	16:55
Ethylbenzene	< 2.00	ug/L	10/4/2018	16:55
Freon 113	< 2.00	ug/L	10/4/2018	16:55
Isopropylbenzene	< 2.00	ug/L	10/4/2018	16:55
m,p-Xylene	< 2.00	ug/L	10/4/2018	16:55
Methyl acetate	< 2.00	ug/L	10/4/2018	16:55
Methyl tert-butyl Ether	< 2.00	ug/L	10/4/2018	16:55
Methylcyclohexane	< 2.00	ug/L	10/4/2018	16:55
Methylene chloride	< 5.00	ug/L	10/4/2018	16:55
o-Xylene	< 2.00	ug/L	10/4/2018	16:55
Styrene	< 5.00	ug/L	10/4/2018	16:55
Tetrachloroethene	< 2.00	ug/L	10/4/2018	16:55
Toluene	< 2.00	ug/L	10/4/2018	16:55
trans-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	16:55
trans-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	16:55
Trichloroethene	< 2.00	ug/L	10/4/2018	16:55
Trichlorofluoromethane	< 2.00	ug/L	10/4/2018	16:55
Vinyl chloride	< 2.00	ug/L	10/4/2018	16:55

This report is part of a multipage document and should only be evaluated in its entirety. The Chain of Custody provides additional sample information, including compliance with the sample condition requirements upon receipt.

Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-4-2018
Lab Sample ID: 184515-04
Matrix: Groundwater

Date Sampled: 10/1/2018
Date Received: 10/2/2018

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**102**	80.7 - 121		10/4/2018	16:55
4-Bromofluorobenzene	**92.0**	74.3 - 121		10/4/2018	16:55
Pentafluorobenzene	**93.6**	86.2 - 111		10/4/2018	16:55
Toluene-D8	**94.5**	86.2 - 112		10/4/2018	16:55

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x54776.D

This report is part of a multipage document and should only be evaluated in its entirety. The Chain of Custody provides additional sample information, including compliance with the sample condition requirements upon receipt.

Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-3-2018
Lab Sample ID: 184515-03
Matrix: Groundwater
Date Sampled: 10/1/2018
Date Received: 10/2/2018

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		10/4/2018 16:32
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		10/4/2018 16:32
1,1,2-Trichloroethane	< 2.00	ug/L		10/4/2018 16:32
1,1-Dichloroethane	< 2.00	ug/L		10/4/2018 16:32
1,1-Dichloroethene	< 2.00	ug/L		10/4/2018 16:32
1,2,3-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:32
1,2,4-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:32
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		10/4/2018 16:32
1,2-Dibromoethane	< 2.00	ug/L		10/4/2018 16:32
1,2-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:32
1,2-Dichloroethane	< 2.00	ug/L		10/4/2018 16:32
1,2-Dichloropropane	< 2.00	ug/L		10/4/2018 16:32
1,3-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:32
1,4-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:32
1,4-Dioxane	< 20.0	ug/L		10/4/2018 16:32
2-Butanone	< 10.0	ug/L		10/4/2018 16:32
2-Hexanone	< 5.00	ug/L		10/4/2018 16:32
4-Methyl-2-pentanone	< 5.00	ug/L		10/4/2018 16:32
Acetone	< 10.0	ug/L		10/4/2018 16:32
Benzene	< 1.00	ug/L		10/4/2018 16:32
Bromochloromethane	< 5.00	ug/L		10/4/2018 16:32
Bromodichloromethane	< 2.00	ug/L		10/4/2018 16:32
Bromoform	< 5.00	ug/L		10/4/2018 16:32
Bromomethane	< 2.00	ug/L		10/4/2018 16:32
Carbon disulfide	< 2.00	ug/L		10/4/2018 16:32
Carbon Tetrachloride	< 2.00	ug/L		10/4/2018 16:32
Chlorobenzene	< 2.00	ug/L		10/4/2018 16:32

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Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-3-2018
Lab Sample ID: 184515-03
Matrix: Groundwater
Date Sampled: 10/1/2018
Date Received: 10/2/2018

Chloroethane	< 2.00	ug/L		10/4/2018	16:32
Chloroform	< 2.00	ug/L		10/4/2018	16:32
Chloromethane	< 2.00	ug/L		10/4/2018	16:32
cis-1,2-Dichloroethene	**1.19**	ug/L	J	10/4/2018	16:32
cis-1,3-Dichloropropene	< 2.00	ug/L		10/4/2018	16:32
Cyclohexane	< 10.0	ug/L		10/4/2018	16:32
Dibromochloromethane	< 2.00	ug/L		10/4/2018	16:32
Dichlorodifluoromethane	< 2.00	ug/L		10/4/2018	16:32
Ethylbenzene	< 2.00	ug/L		10/4/2018	16:32
Freon 113	< 2.00	ug/L		10/4/2018	16:32
Isopropylbenzene	< 2.00	ug/L		10/4/2018	16:32
m,p-Xylene	< 2.00	ug/L		10/4/2018	16:32
Methyl acetate	< 2.00	ug/L		10/4/2018	16:32
Methyl tert-butyl Ether	< 2.00	ug/L		10/4/2018	16:32
Methylcyclohexane	< 2.00	ug/L		10/4/2018	16:32
Methylene chloride	< 5.00	ug/L		10/4/2018	16:32
o-Xylene	< 2.00	ug/L		10/4/2018	16:32
Styrene	< 5.00	ug/L		10/4/2018	16:32
Tetrachloroethene	< 2.00	ug/L		10/4/2018	16:32
Toluene	< 2.00	ug/L		10/4/2018	16:32
trans-1,2-Dichloroethene	< 2.00	ug/L		10/4/2018	16:32
trans-1,3-Dichloropropene	< 2.00	ug/L		10/4/2018	16:32
Trichloroethene	< 2.00	ug/L		10/4/2018	16:32
Trichlorofluoromethane	< 2.00	ug/L		10/4/2018	16:32
Vinyl chloride	< 2.00	ug/L		10/4/2018	16:32

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PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-3-2018
Lab Sample ID: 184515-03 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	102	80.7 - 121		10/4/2018	16:32
4-Bromofluorobenzene	98.2	74.3 - 121		10/4/2018	16:32
Pentafluorobenzene	94.6	86.2 - 111		10/4/2018	16:32
Toluene-D8	95.3	86.2 - 112		10/4/2018	16:32

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x54775.D

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Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-2-2018
Lab Sample ID: 184515-02
Matrix: Groundwater

Date Sampled: 10/1/2018
Date Received: 10/2/2018

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		10/4/2018 16:08
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		10/4/2018 16:08
1,1,2-Trichloroethane	< 2.00	ug/L		10/4/2018 16:08
1,1-Dichloroethane	< 2.00	ug/L		10/4/2018 16:08
1,1-Dichloroethene	< 2.00	ug/L		10/4/2018 16:08
1,2,3-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:08
1,2,4-Trichlorobenzene	< 5.00	ug/L		10/4/2018 16:08
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		10/4/2018 16:08
1,2-Dibromoethane	< 2.00	ug/L		10/4/2018 16:08
1,2-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:08
1,2-Dichloroethane	< 2.00	ug/L		10/4/2018 16:08
1,2-Dichloropropane	< 2.00	ug/L		10/4/2018 16:08
1,3-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:08
1,4-Dichlorobenzene	< 2.00	ug/L		10/4/2018 16:08
1,4-Dioxane	< 20.0	ug/L		10/4/2018 16:08
2-Butanone	< 10.0	ug/L		10/4/2018 16:08
2-Hexanone	< 5.00	ug/L		10/4/2018 16:08
4-Methyl-2-pentanone	< 5.00	ug/L		10/4/2018 16:08
Acetone	7.98	ug/L	J	10/4/2018 16:08
Benzene	< 1.00	ug/L		10/4/2018 16:08
Bromochloromethane	< 5.00	ug/L		10/4/2018 16:08
Bromodichloromethane	< 2.00	ug/L		10/4/2018 16:08
Bromoform	< 5.00	ug/L		10/4/2018 16:08
Bromomethane	< 2.00	ug/L		10/4/2018 16:08
Carbon disulfide	< 2.00	ug/L		10/4/2018 16:08
Carbon Tetrachloride	< 2.00	ug/L		10/4/2018 16:08
Chlorobenzene	< 2.00	ug/L		10/4/2018 16:08

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Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-2-2018
Lab Sample ID: 184515-02 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Chloroethane	< 2.00	ug/L	10/4/2018	16:08
Chloroform	< 2.00	ug/L	10/4/2018	16:08
Chloromethane	< 2.00	ug/L	10/4/2018	16:08
cis-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	16:08
cis-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	16:08
Cyclohexane	< 10.0	ug/L	10/4/2018	16:08
Dibromochloromethane	< 2.00	ug/L	10/4/2018	16:08
Dichlorodifluoromethane	< 2.00	ug/L	10/4/2018	16:08
Ethylbenzene	< 2.00	ug/L	10/4/2018	16:08
Freon 113	< 2.00	ug/L	10/4/2018	16:08
Isopropylbenzene	< 2.00	ug/L	10/4/2018	16:08
m,p-Xylene	< 2.00	ug/L	10/4/2018	16:08
Methyl acetate	< 2.00	ug/L	10/4/2018	16:08
Methyl tert-butyl Ether	< 2.00	ug/L	10/4/2018	16:08
Methylcyclohexane	< 2.00	ug/L	10/4/2018	16:08
Methylene chloride	< 5.00	ug/L	10/4/2018	16:08
o-Xylene	< 2.00	ug/L	10/4/2018	16:08
Styrene	< 5.00	ug/L	10/4/2018	16:08
Tetrachloroethene	< 2.00	ug/L	10/4/2018	16:08
Toluene	< 2.00	ug/L	10/4/2018	16:08
trans-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	16:08
trans-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	16:08
Trichloroethene	< 2.00	ug/L	10/4/2018	16:08
Trichlorofluoromethane	< 2.00	ug/L	10/4/2018	16:08
Vinyl chloride	< 2.00	ug/L	10/4/2018	16:08

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Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: MW-2-2018
Lab Sample ID: 184515-02 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**101**	80.7 - 121		10/4/2018	16:08
4-Bromofluorobenzene	**99.4**	74.3 - 121		10/4/2018	16:08
Pentafluorobenzene	**95.6**	86.2 - 111		10/4/2018	16:08
Toluene-D8	**96.5**	86.2 - 112		10/4/2018	16:08

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x54774.D

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Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: HLA-MW-2-2018
Lab Sample ID: 184515-01 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Volatile Organics

Analyte	Result	Units	Qualifier	Date Analyzed
1,1,1-Trichloroethane	< 2.00	ug/L		10/4/2018 15:45
1,1,2,2-Tetrachloroethane	< 2.00	ug/L		10/4/2018 15:45
1,1,2-Trichloroethane	< 2.00	ug/L		10/4/2018 15:45
1,1-Dichloroethane	< 2.00	ug/L		10/4/2018 15:45
1,1-Dichloroethene	< 2.00	ug/L		10/4/2018 15:45
1,2,3-Trichlorobenzene	< 5.00	ug/L		10/4/2018 15:45
1,2,4-Trichlorobenzene	< 5.00	ug/L		10/4/2018 15:45
1,2-Dibromo-3-Chloropropane	< 10.0	ug/L		10/4/2018 15:45
1,2-Dibromoethane	< 2.00	ug/L		10/4/2018 15:45
1,2-Dichlorobenzene	< 2.00	ug/L		10/4/2018 15:45
1,2-Dichloroethane	< 2.00	ug/L		10/4/2018 15:45
1,2-Dichloropropane	< 2.00	ug/L		10/4/2018 15:45
1,3-Dichlorobenzene	< 2.00	ug/L		10/4/2018 15:45
1,4-Dichlorobenzene	< 2.00	ug/L		10/4/2018 15:45
1,4-Dioxane	< 20.0	ug/L		10/4/2018 15:45
2-Butanone	< 10.0	ug/L		10/4/2018 15:45
2-Hexanone	< 5.00	ug/L		10/4/2018 15:45
4-Methyl-2-pentanone	< 5.00	ug/L		10/4/2018 15:45
Acetone	< 10.0	ug/L		10/4/2018 15:45
Benzene	< 1.00	ug/L		10/4/2018 15:45
Bromochloromethane	< 5.00	ug/L		10/4/2018 15:45
Bromodichloromethane	< 2.00	ug/L		10/4/2018 15:45
Bromoform	< 5.00	ug/L		10/4/2018 15:45
Bromomethane	< 2.00	ug/L		10/4/2018 15:45
Carbon disulfide	< 2.00	ug/L		10/4/2018 15:45
Carbon Tetrachloride	< 2.00	ug/L		10/4/2018 15:45
Chlorobenzene	< 2.00	ug/L		10/4/2018 15:45

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Report Prepared Monday, October 8, 2018

PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: HLA-MW-2-2018
Lab Sample ID: 184515-01 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Chloroethane	< 2.00	ug/L	10/4/2018	15:45
Chloroform	< 2.00	ug/L	10/4/2018	15:45
Chloromethane	< 2.00	ug/L	10/4/2018	15:45
cis-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	15:45
cis-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	15:45
Cyclohexane	< 10.0	ug/L	10/4/2018	15:45
Dibromochloromethane	< 2.00	ug/L	10/4/2018	15:45
Dichlorodifluoromethane	< 2.00	ug/L	10/4/2018	15:45
Ethylbenzene	< 2.00	ug/L	10/4/2018	15:45
Freon 113	< 2.00	ug/L	10/4/2018	15:45
Isopropylbenzene	< 2.00	ug/L	10/4/2018	15:45
m,p-Xylene	< 2.00	ug/L	10/4/2018	15:45
Methyl acetate	< 2.00	ug/L	10/4/2018	15:45
Methyl tert-butyl Ether	< 2.00	ug/L	10/4/2018	15:45
Methylcyclohexane	< 2.00	ug/L	10/4/2018	15:45
Methylene chloride	< 5.00	ug/L	10/4/2018	15:45
o-Xylene	< 2.00	ug/L	10/4/2018	15:45
Styrene	< 5.00	ug/L	10/4/2018	15:45
Tetrachloroethene	< 2.00	ug/L	10/4/2018	15:45
Toluene	< 2.00	ug/L	10/4/2018	15:45
trans-1,2-Dichloroethene	< 2.00	ug/L	10/4/2018	15:45
trans-1,3-Dichloropropene	< 2.00	ug/L	10/4/2018	15:45
Trichloroethene	< 2.00	ug/L	10/4/2018	15:45
Trichlorofluoromethane	< 2.00	ug/L	10/4/2018	15:45
Vinyl chloride	< 2.00	ug/L	10/4/2018	15:45

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PARADIGM
ENVIRONMENTAL SERVICES, INC

Lab Project ID: 184515

Client: Ravi Engineering & Land Surveying, P.C.

Project Reference: 3130 Monroe Ave 45-17-008

Sample Identifier: HLA-MW-2-2018
Lab Sample ID: 184515-01 **Date Sampled:** 10/1/2018
Matrix: Groundwater **Date Received:** 10/2/2018

Surrogate	Percent Recovery	Limits	Outliers	Date Analyzed	
1,2-Dichloroethane-d4	**104**	80.7 - 121		10/4/2018	15:45
4-Bromofluorobenzene	**101**	74.3 - 121		10/4/2018	15:45
Pentafluorobenzene	**95.3**	86.2 - 111		10/4/2018	15:45
Toluene-D8	**97.8**	86.2 - 112		10/4/2018	15:45

Method Reference(s): EPA 8260C
EPA 5030C
Data File: x54773.D

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Report Prepared Monday, October 8, 2018

Appendix B

Laboratory QC Documentation

All laboratory quality control data were within the established control limits. No analytical results were qualified.

Appendix C

Validator Qualifications

KENNETH R. APPLIN
Geochemist/Data Validator

Ph.D., Geochemistry and Mineralogy, The Pennsylvania State University

M.S., Geochemistry and Mineralogy, The Pennsylvania State University

B.A., Geological Sciences, SUNY at Geneseo, NY

Dr. Applin has over 35 years of experience working with the geochemistry of natural waters. His prior experience includes working as an Assistant Professor of Geology at the University of Missouri-Columbia and as Chief Hydrogeologist and Geochemist with a leading engineering firm in Rochester, NY. In 1993, he established KR Applin and Associates, a small consulting business that focuses on the geochemistry of natural waters, especially as applied to problems involving the contamination of groundwater and surface water.

Dr. Applin is also an experienced analytical data validator and has provided data validation services since 1994 to a variety of clients performing brownfield cleanup projects, hazardous waste remediation, groundwater monitoring at solid waste facilities, and other projects requiring third-party data validation. Dr. Applin has several years of hands-on experience with the laboratory analysis of natural waters and has successfully completed the USEPA Region II certification courses for performing inorganic and organic analytical data validation.

MICHAEL K. PERRY
Chemist/Data Validator

B.S. Chemistry, Georgia State University, Atlanta, GA

A.A.S., Chemical Technology, Alfred State College, Alfred, NY

Mr. Perry has over 30 years of experience in the analytical laboratory business. During his early career, he spent several years as a laboratory analyst performing the analysis of soil, water, and air samples for inorganic and organic chemical parameters. During his last 20 years in the environmental laboratory business, he managed and directed two major analytical laboratories in Rochester, NY. His management responsibilities included oversight of the daily operations of the lab, staff training and supervision, the selection, purchase, and maintenance of analytical instruments, the introduction of new laboratory methods, analytical quality assurance and quality control, data acquisition and management, and other business-related activities.

Mr. Perry has an extensive working knowledge of the methods and procedures used for sampling and analyzing both inorganic and organic analytes in soil, water, and air. He is an accomplished laboratory chemist and is familiar with the analytical methods and procedures established under the USEPA Contract Laboratory Protocols (CLP), the NYSDEC Analytical Services Protocols (ASP), and the NYSDOH Environmental Laboratory Approval Program (ELAP).

APPENDIX F
Waste Disposal Documentation

STRAIGHT BILL OF LADING – SHORT FORM

NOTICE: Shippers of hazardous materials must enter 24-hour emergency response telephone number under "Emergency Response Phone Number."

Date 06 15 17

Bill of Lading No. 300

Shipper No. 31A846

Carrier No.

Shipping Order

Piedmont Eq Inc,
(Name of Carrier)

TO: Consignee Canandaigua WWTF	FROM: Shipper
Street 185 Saltonstall St	Street 5430 Monroe Ave
Destination	Origin
Route: 31-490-96-332	Zip Code
Vehicle No. 1 Ton	SCAC
	Emergency Response Phone Number

No. Shipping Units	+HM	Kind of Packaging, Description of Articles, Special Marks and Exceptions	Commodities requiring special or additional care or attention in handling or stowing must be so marked and packaged as to ensure safe transportation with ordinary care. See Section 2(e) of National Motor Freight Classification, Item 360.	Weight (Subject to Correction)*	Rate or Class	CHARGES
		Non Hazardous Well Water		200 #		

*If the shipment moves between two ports by a carrier by water, the law requires that the bill of lading state whether weight is "carrier's or shipper's weight."

REMIT C.O.D. TO: ADDRESS

C.O.D. Amt. $

C.O.D. FEE: PREPAID ☐ COLLECT ☐ $

TOTAL CHARGES: $

Note-Where the rate is dependent on value, shippers are required to state specifically in writing the agreed or declared value of the property.

The agreed or declared value of the property is hereby specifically stated by the shipper to be not exceeding

$ _____ per _____

Subject to Section 7 of the conditions, if this shipment is to be delivered to the consignee without recourse on the consignor, the consignor shall sign the following statement.

The carrier shall not make delivery of this shipment without payment of freight and all other charges.

_____
(Signature of Consignor)

FREIGHT CHARGES
Check Appropriate Box:
☐ Freight prepaid
☐ Collect

RECEIVED, subject to the classifications and lawfully filed tariffs in effect on the date of the issue of this Bill of Lading, the property described above in apparent good order, except as noted (contents and condition of contents of packages unknown), marked, consigned, and destined as indicated above which said carrier (the word carrier being understood throughout this contract as meaning any person or corporation in possession of the property under the contract) agrees to carry to its usual place of delivery at said destination, if on its route, otherwise to deliver to another carrier on the route to said destination. It is mutually agreed as to each carrier of all or any of, said property over all or any portion of said route to destination and as to each party at any time interested in all or any of said property, that every service to be performed hereunder shall be subject to all the terms and conditions of the Uniform Domestic Straight Bill of Lading set forth (1) in Uniform Freight Classifications in effect on the date hereof, if this is a rail or a rail-water shipment or (2) in the applicable motor carrier classification or tariff, if this is a motor carrier shipment. Shipper hereby certifies that he is familiar with all the terms and conditions of the said bill of lading, set forth in the classification or tariff which governs the transportation of this shipment, and the said terms and conditions are hereby agreed to by the shipper and accepted for himself and his assigns.

Mark with "X" if appropriate to designate Hazardous Materials as defined in the U.S. Department of Transportation Regulations governing the transportation of hazardous materials. The use of this column is an optional method for identifying hazardous materials on Bills of Lading per 172.201(b)(1) (ii) of Title 49 Code of Federal Regulations. Also when shipping hazardous materials, the shipper's certification statement prescribed in section 172.204(a) of the Federal Regulations, as indicated on the Bill of Lading does apply unless a specific exception from the requirement is provided in the Regulations for a particular material.

The format and content of hazardous item list is the responsibility of individual company interpretation of requirements as described in 49 Code of Federal Regulations 172, Subpart C-Shipping Papers. Such description consists of the following per Sections 172.201 (Hazardous Material Table) and Sections 172.202 and 172.203: Proper shipping name, hazardous class, UN identification number, packing group, and subsidiary class(es).

Note: Liability limitation for loss or damage in this shipment may be applicable. See 49 United States Code, Sections 14706(c)(1)(A) and (B).

SHIPPER

PER

CARRIER

PER

This is to certify that the above named materials are properly classified, packaged, marked, and labeled, and are in proper condition for transportation according to the applicable regulations of the U.S. Department of Transportation.

Carrier acknowledges receipt of packages and any required placards. Carrier certifies emergency response information was made available and/or carrier has the U.S. Department of Transportation emergency response guidebook or equivalent documentation in the vehicle. Property described above is received in good order, except as noted.

V WD

NON-HAZARDOUS WASTE MANIFEST

1. Generator ID Number	2. Page 1 of	3. Emergency Response Phone	4. Waste Tracking Number
	1	800-535-5053	001

GENERATOR

5. Generator's Name and Mailing Address
3130 Monroe Avenue Associates LLC
PO Box 499
Pittsford, NY 14534
Generator's Phone:

Generator's Site Address (if different than mailing address)
Former Speedy's Cleaners
3130 Monroe Avenue
Rochester, NY 14618

6. Transporter 1 Company Name: Nature's Way Environmental Consultants & Contractors, Inc. — U.S. EPA ID Number: 9A-516

7. Transporter 2 Company Name — U.S. EPA ID Number:

8. Designated Facility Name and Site Address
American Recyclers, Inc.
177 Wales Ave
Tonawanda, NY 14150
Facility's Phone: 1-716-695-6720
U.S. EPA ID Number: NYR000030809

	9. Waste Shipping Name and Description	10. Containers No.	10. Containers Type	11. Total Quantity	12. Unit Wt./Vol.	
1.	Non RCRA Non DOT Regulated, (IDW Soil from Auger Cuttings)	1	DM	EST 000	P	
2.	~~Non RCRA Non DOT Regulated, (IDW Groundwater from Well Development)~~	1	DM	EST 400	P	
3.						
4.						

13. Special Handling Instructions and Additional Information

ERG Approval #

		Handling Codes:	
1 -	1 - L-14554L	1 - None	24 Hour Emergecy Contact:
2 -	2 - H-14553IN	2 -	INFOTRAC (Caller Must ID
3 -	3 -	3 -	ESG)
4 -	4 -	4 -	

14. **GENERATOR'S/OFFEROR'S CERTIFICATION:** I hereby declare that the contents of this consignment are fully and accurately described above by the proper shipping name, and are classified, packaged, marked and labeled/placarded, and are in all respects in proper condition for transport according to applicable international and national governmental regulations.

Generator's/Offeror's Printed/Typed Name: As Agent Bryan Wawrzyniec — Signature — Month: 1 — Day: 11 — Year: 19

INT'L

15. International Shipments ☐ Import to U.S. ☐ Export from U.S. Port of entry/exit:
Transporter Signature (for exports only): Date leaving U.S.:

TRANSPORTER

16. Transporter Acknowledgment of Receipt of Materials

Transporter 1 Printed/Typed Name — Signature — Month — Day — Year

Transporter 2 Printed/Typed Name: Bryan Wawrzyniec — Signature — Month: 1 — Day: 12 — Year: 19

DESIGNATED FACILITY

17. Discrepancy

17a. Discrepancy Indication Space ☐ Quantity ☐ Type ☐ Residue ☐ Partial Rejection ☐ Full Rejection

Manifest Reference Number:

17b. Alternate Facility (or Generator) — U.S. EPA ID Number
Facility's Phone:

17c. Signature of Alternate Facility (or Generator) — Month — Day — Year

18. Designated Facility Owner or Operator: Certification of receipt of materials covered by the manifest except as noted in Item 17a

Printed/Typed Name: Peter Maman — Signature — Month: 1 — Day: 11 — Year: 19

169-BLS-C 5 11979 (Rev. 9/09)

DESIGNATED FACILITY TO GENERATOR

Appendix G

IC/EC Certification

Enclosure 2

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
Site Management Periodic Review Report Notice
Institutional and Engineering Controls Certification Form

Site No. C828109 **Site Details** **Box 1**

Site Name Speedy's Cleaners

Site Address: 3130 Monroe Avenue
City/Town: Pittsford Zip Code: 14618
County: Monroe
Site Acreage: 0.293

Reporting Period: A corrective measures work plan has been implemented at the before mentioned site. As of October 22, 2019, the site is in compliance.

	YES	NO
1. Is the information above correct?	X	
If NO, include handwritten above or on a separate sheet.		
2. Has some or all of the site property been sold, subdivided, merged, or undergone a tax map amendment during this Reporting Period?		X
3. Has there been any change of use at the site during this Reporting Period (see 6NYCRR 375-1.11(d))?		X
4. Have any federal, state, and/or local permits (e.g., building, discharge) been issued for or at the property during this Reporting Period?		X
If you answered YES to questions 2 thru 4, include documentation or evidence that documentation has been previously submitted with this certification form.		
5. Is the site currently undergoing development?		X

Box 2

	YES	NO
6. Is the current site use consistent with the use(s) listed below? Commercial and Industrial	X	
7. Are all ICs/ECs in place and functioning as designed?	X	

IF THE ANSWER TO EITHER QUESTION 6 OR 7 IS NO, sign and date below and DO NOT COMPLETE THE REST OF THIS FORM. Otherwise continue.

A Corrective Measures Work Plan must be submitted along with this form to address these issues.

Signature of Owner, Remedial Party or Designated Representative Date

SITE NO. C828109 Box 3

Description of Institutional Controls

Parcel	Owner	Institutional Control
150.120-1-6	3130 Monroe Avenue Associates LLC	Ground Water Use Restriction Soil Management Plan Building Use Restriction Monitoring Plan Site Management Plan O&M Plan IC/EC Plan

The elements of the institutional and engineering controls are listed below:

1) A site cover (consisting of the building and paved parking lot) currently exists and will be maintained to allow for commercial use of the site.

2) Imposition of an institutional control in the form of an environmental easement for the controlled property that:

a) requires the remedial party or site owner to complete and submit to the Department a periodic certification of institutional and engineering controls in accordance with Part 375-1.8 (h)(3);
b) allows the use and development of the controlled property for commercial and industrial uses as defined by Part 375-1.8(g), although land use is subject to local zoning laws;
c) restricts the use of groundwater as a source of potable or process water, without necessary water quality treatment as determined by the NYSDOH or County DOH; and
d) requires compliance with the Department approved Site Management Plan.

3) A Site Management Plan is required, which includes the following:

A) An Institutional and Engineering Control Plan that identifies all use restrictions and engineering controls for the site and details the steps and media-specific requirements necessary to ensure the following institutional and/or engineering controls remain in place and effective:

Institutional Controls: The environmental easement discussed above.

Engineering Controls: The sub-slab depressurization system, and the site cover system discussed above.

This plan includes, but may not be limited to:
a) an Excavation Plan which details the provisions for management of future excavations in areas of remaining contamination;
b) descriptions of the provisions of the environmental easement including any land use and groundwater use restrictions;
c) a provision for evaluation of the potential for soil vapor intrusion for any new buildings developed on the site, including provision for implementing actions recommended to address exposures related to soil vapor intrusion;
d) a provision for the continued operation, maintenance, and monitoring of the existing sub-slab depressurization system at the on-site building;
e) provisions for the management and inspection of the identified engineering controls;
f) maintaining site access controls and Department notification; and
g) the steps necessary for the periodic reviews and certification of the institutional and/or engineering controls.

B) A Monitoring Plan to assess the performance and effectiveness of the remedy. The plan includes, but may not be limited to:
a) monitoring of groundwater and indoor air to assess the performance and effectiveness of the remedy;
b) a schedule of monitoring and frequency of submittals to the Department; and
c) monitoring for soil vapor intrusion for any buildings occupied or developed on the site, as may be

required by the Institutional and Engineering Control Plan discussed above.

Box 4

Description of Engineering Controls

Parcel	Engineering Control
150.120-1-6	Vapor Mitigation Cover System

Box 5

Periodic Review Report (PRR) Certification Statements

1. I certify by checking "YES" below that:

   a) the Periodic Review report and all attachments were prepared under the direction of, and reviewed by, the party making the certification;

   b) to the best of my knowledge and belief, the work and conclusions described in this certification are in accordance with the requirements of the site remedial program, and generally accepted engineering practices; and the information presented is accurate and compete.

YES	NO
X	

2. If this site has an IC/EC Plan (or equivalent as required in the Decision Document), for each Institutional or Engineering control listed in Boxes 3 and/or 4, I certify by checking "YES" below that all of the following statements are true:

   (a) the Institutional Control and/or Engineering Control(s) employed at this site is unchanged since the date that the Control was put in-place, or was last approved by the Department;

   (b) nothing has occurred that would impair the ability of such Control, to protect public health and the environment;

   (c) access to the site will continue to be provided to the Department, to evaluate the remedy, including access to evaluate the continued maintenance of this Control;

   (d) nothing has occurred that would constitute a violation or failure to comply with the Site Management Plan for this Control; and

   (e) if a financial assurance mechanism is required by the oversight document for the site, the mechanism remains valid and sufficient for its intended purpose established in the document.

YES	NO
X	

IF THE ANSWER TO QUESTION 2 IS NO, sign and date below and DO NOT COMPLETE THE REST OF THIS FORM. Otherwise continue.

A Corrective Measures Work Plan must be submitted along with this form to address these issues.

Signature of Owner, Remedial Party or Designated Representative — Date

IC CERTIFICATIONS
SITE NO. C828109

Box 6

SITE OWNER OR DESIGNATED REPRESENTATIVE SIGNATURE

I certify that all information and statements in Boxes 1,2, and 3 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 William F. Willard (print name) at c/o 3130 Monroe Avenue Associates, LLC PO Box 499 Pittsford, NY 14534 (print business address).

am certifying as Owner (Owner or Remedial Party)

for the Site named in the Site Details Section of this form.

Member
Signature of Owner, Remedial Party, or Designated Representative Rendering Certification

10/22/19
Date

IC/EC CERTIFICATIONS

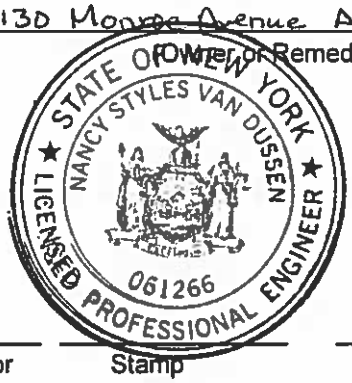
Box 7

Professional Engineer Signature

I certify that all information in Boxes 4 and 5 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 Nancy Styles VanDussen at 2110 S. Clinton Ave, Roch. NY 14618,
print name print business address

am certifying as a Professional Engineer for the 3130 Monroe Avenue Assoc, LLC
(Owner or Remedial Party)



Nancy Styles VanDussen — Signature of Professional Engineer, for the Owner or Remedial Party, Rendering Certification

Stamp (Required for PE)

10-23-19 — Date