GROUNDWATER MONITORING REPORT JULY THROUGH DECEMBER 2021

National Grid Former Albion MGP Site
Albion, New York

Prepared for:

National Grid
300 Erie Blvd West
Syracuse, New York 13202

Prepared by:

Wood Environment & Infrastructure Solutions, Inc.
180 Grand Avenue, Suite 1100
Oakland, California 94612

November 2021

Project No. 0078000050.04.****

Wood Environment & Infrastructure Solutions, Inc.
180 Grand Avenue, Suite 1100
Oakland, California 94612-3066
USA

T: (510) 663-4100
F: (510) 663-4141

www.woodplc.com

November 23, 2021

Project 0078000050.04.****

Mr. Michael Squire
Assistant Engineer
New York State Department of Environmental Conservation
625 Broadway
Albany, NY 12233

Subject: **Groundwater Monitoring Report—July Through December 2021**
National Grid Former Albion MGP Site
Albion, New York
Case #837012

Dear Mr. Squire:

Wood Environment & Infrastructure Solutions, Inc. is submitting the subject report on behalf of our client, National Grid. This report presents the results of monitoring activities conducted during the period from July through December 2021.

Please contact either of the undersigned if you have any questions or require additional information.

Sincerely,
Wood Environment & Infrastructure Solutions, Inc.

Alex Rosenthal
Qualified Environmental
Professional/Senior Hydrogeologist
Direct Tel.: (510) 663-4152
E-mail: alex.rosenthal@woodplc.com

Douglas Bablitch
Qualified Environmental
Professional/Principal Engineer
Direct Tel.: (510) 663-4159
E-mail: douglas.bablitch@woodplc.com

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https://woodplc.sharepoint.com/teams/bayareadocusafe/national grid company plc/20211123_2sa21_gwmr/01_text/2sa2021 gwmr_cvrltr.docx

Enclosure

cc: Brian Stearns - National Grid
Steve Stucker - National Grid
Devin Shay - Groundwater & Environmental Services, Inc.

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1.0 INTRODUCTION

This report summarizes groundwater monitoring and sampling activities performed by Wood Environment & Infrastructure Solutions, Inc. ("Wood"), on behalf of National Grid Corporation ("National Grid"), during the period from July through December 2021 ("reporting period") at the Former Albion Manufactured Gas Plant (MGP), Site Identification Number 837012, in Albion, New York (the site; Figure 1). Groundwater monitoring and sampling activities were performed in accordance with the *Monitoring and Sampling Plan* (Wood, 2018), as summarized in Table 1.

Activities performed at the site during the reporting period include the following:

- Collection of depth to groundwater measurements and groundwater samples at site monitoring wells; and
- Inspection of the site Engineering Control (i.e., soil cap) and Institutional Controls (i.e., land use).

Groundwater elevation and analytical results for the reporting period are generally consistent with historical data. No damages or changes to land use were observed during the site inspection. Depth to groundwater measurement and sampling procedures are described in Section 2, and groundwater monitoring results are provided in Section 3. A quality assurance/quality control (QA/QC) assessment of the groundwater data is provided in Section 4. Results of the inspection of the site Engineering Control and Institutional Controls are described in Section 5. Project activities planned for the next monitoring period are outlined in Section 6.

1.1 BACKGROUND

The site consists of two adjoining parcels totaling approximately 0.5 acres formerly occupied by a single MGP that is bounded by the New York State Erie Barge Canal to the north, East Bank Street and a commercial property to the south, Ingersoll Street to the east, and a park

and commercial property to the west (Figure 2). The western parcel (0.3 acres) is currently owned by National Grid, which maintains an active electrical substation on the property; previous environmental investigations did not identify environmental conditions requiring remediation. The eastern parcel (0.2 acres), which is currently owned by New York State Electric and Gas Corporation (NYSEG), has been remediated to commercial use and is currently vacant and undeveloped.

Niagara Mohawk Power Corporation (doing business as National Grid) entered an Order of Consent in November 2003 with the NYSDEC to remediate soil and groundwater at the site, which have been impacted by historical MGP operations. The contaminants of concern (COCs) identified at the site, as listed in the Record of Decision (NYSDEC, 2010a) are: benzene, toluene, ethylbenzene, and xylene (collectively referred to as BTEX); polycyclic aromatic hydrocarbons (PAHs) acenaphthene, benzo(a)pyrene, benzo(b)fluoranthene, benzo[k]fluoranthene, chrysene, fluorene, and indeno(1,2,3-cd)pyrene; and cyanide. In 2012, Engineering Controls were constructed at the eastern parcel including remedial excavation of the upper two feet of impacted surficial soil and construction of a soil cap system consisting of 18 inches of clean soil underlain by a demarcation layer to delineate clean soil from historical fill.

In addition to Engineering Controls, Institutional Controls including a site-wide Site Management Plan (SMP) and Environmental Easement are part of the site remedy to control exposure to remaining contamination and to maintain protection of public health and the environment. The *Monitoring and Sampling Plan* will ultimately be incorporated with the site wide SMP, which is currently under development, to conduct post-remediation monitoring to assess the performance and effectiveness of the remedy.

2.0 GROUNDWATER MONITORING

This section describes groundwater monitoring activities performed by Wood during the reporting period. The groundwater monitoring program including wells and their monitoring and sampling frequencies is summarized in Table 1. Figure 2 shows the locations of groundwater monitoring wells at the site. Appendix A includes the logs on which field data were recorded.

2.1 WATER LEVEL MEASUREMENTS

Depth to water measurements at site monitoring wells were measured on August 18, 2021, prior to sampling of the wells (Table 2). Depth to groundwater was measured with an electronic water level sounder from a surveyed reference point marked on the top of each well casing and measurements were recorded to the nearest 0.01 foot. The depth to water of the Erie Canal, which borders the Site to the north, was also measured from a dedicated, non-surveyed point selected and recorded by field personnel during the August 2021 sampling event. The sounder was decontaminated between measurement locations by rinsing with an anionic detergent/distilled water mixture, followed by a distilled water rinse.

2.2 GROUNDWATER SAMPLING AND ANALYSIS

Groundwater samples were collected on August 18, 2021 in accordance with *Monitoring and Sampling Plan*. Monitoring wells were purged using low-flow sampling techniques prior to sampling using a peristaltic pump. Water quality parameters, including temperature, pH, specific conductance, oxidation-reduction potential, and dissolved oxygen were measured periodically during purging and were recorded on the sampling records. Samples were collected when parameter measurements changed less than 10 percent between three sequential measurements. Sampling records are provided in Appendix A.

Groundwater samples were collected into laboratory-provided sample containers immediately following purging. The sample containers were immediately labeled with the project number, well number, date, time, and analyses requested, stored in an ice cooled chest, and shipped to the analytical laboratory under Wood chain-of-custody procedures.

One blind field duplicate, one trip blank, and one equipment blank were collected for quality control purposes. These quality control samples were stored and delivered to the lab with the primary samples and were analyzed for the same parameters.

Eurofins TestAmerica Laboratories, Inc., of Amherst, New York, analyzed the samples for BTEX using United States Environmental Protection Agency (U.S. EPA) Method 8260C and the U.S. EPA 16-PAH list of polycyclic aromatic hydrocarbons (PAHs) using U.S. EPA Method 8270D. The samples were analyzed for total cyanide by Eurofins TestAmerica of North Canton, Ohio, using Standard Method SM4500-CN-C/E. Both laboratories are accredited under the National Environmental Laboratory Accreditation Program.

2.3 INVESTIGATION DERIVED WASTE

Groundwater purged from the monitoring wells was stored in a Department of Transportation-approved 55-gallon steel drum pending waste profiling. Following laboratory analysis and profiling, the investigation derived waste was disposed of at an off-site, permitted facility in accordance with state and federal regulations.

3.0 RESULTS

This section presents the results from the groundwater monitoring activities, including groundwater elevation measurement and analytical testing.

3.1 OCCURRENCE AND MOVEMENT OF GROUNDWATER

Measurements from the monitoring wells were used to evaluate the occurrence and movement of groundwater at the site.

On August 18, 2021, measured groundwater elevations in monitoring wells ranged from 501.14 (MW-9R) to 508.32 feet (MW-1). Depth to water measurements and water level elevations are summarized in Table 2. All elevations referenced are relative to the North American Vertical Datum 1988.

Figure 3 presents the potentiometric surface map for the water levels measured in the monitoring wells in August 2021. The potentiometric surface map indicates that groundwater flow is generally toward the southeast across the site. The horizontal gradient was approximately 0.042 foot per foot (ft/ft) in August 2021.

The Erie Canal was gauged beneath the measuring point on April 12, 2021 at a depth of 3.18 feet. The depth to water in the canal will be measured during future events at the same location.

3.2 GROUNDWATER ANALYTICAL RESULTS

Groundwater samples were collected from six monitoring wells for BTEX, PAH, and total cyanide analysis on August 18, 2021. Groundwater evaluation criteria are the Ambient Water Quality Standards and Guidance Values (Technical & Operational Guidance Series 1.1.1, Division of Water 1998). Groundwater results are compared to the Standard Values (or Guidance Values, where Standard Values are not available) for groundwater as a drinking water source. Copies of laboratory reports are included in Appendix B. Analytical results and

evaluation criteria for BTEX, PAHs, and total cyanide are presented in Table 3, Table 4, and Table 5, respectively, and on Figure 4. Compounds that were detected at concentrations exceeding their respective evaluation criteria are summarized below:

- Benzene (MW-5, MW-8R, MW-10R)
- Ethylbenzene (MW-5 and MW-8R)
- Xylenes (MW-5 and MW-8R)
- Acenaphthene (MW-8R)
- Naphthalene (MW-8R)
- Toluene (MW-8R)
- Cyanide (MW-5)

Groundwater results from August 2021 are generally consistent with those from the recent sampling events. BTEX compounds in well MW-8R were observed at concentrations similar to those observed during the September 2020 sampling event after having been detected at lower concentrations during the most recent event in April 2021. The BTEX concentrations observed in the MW-8R were several orders of magnitude lower in November 2019 relative to other recent events. While the concentrations of BTEX compounds in MW-8R have shown significant variability during recent monitoring events, they are within the range of historical concentrations at this well (AMEC Geomatrix, Inc., 2010).

4.0 DATA QUALITY REVIEW

Analytical data (Appendix B) were reviewed by the laboratory and by Wood. Consistent with the DER-10 Section 2.2 (NYSDEC, 2010b), this report meets the submittal requirements for a Category A data deliverable. The data quality review included accuracy and precision assessments for the samples collected in August 2021. Consistent with the Quality Assurance Project Plan included in the Monitoring and Sampling Plan, the data quality review was performed in accordance with the procedures specified in the U.S. EPA National Functional Guidelines for Inorganic Superfund Methods Data Review (U.S. EPA, 2020a) and the U.S. EPA National Functional Guidelines for Organic Superfund Methods Data Review (U.S. EPA, 2020b). Results of the data validation and precision assessment indicate the following:

- Analytical accuracy was evaluated by reviewing laboratory control sample/laboratory control sample duplicate (LCS/LCSD) recoveries and matrix

spike/matrix spike duplicate (MS/MSD) recoveries (recoveries of spiked compounds expressed as a percentage of the true concentrations). Surrogate recoveries, holding times, and field and laboratory blank results for samples collected in August 2021 were also used to assess accuracy. No QC issues requiring data qualifiers were identified for the laboratory and field QC samples. Results for several analytes in multiple samples were qualified "J," indicating that the analyte was positively detected in the sample, but that the reported result is approximate because it was detected at a concentration below the reporting limit but above the method detection limit.

- Data precision was evaluated by comparing analytical results from duplicate pairs and evaluating the calculated RPDs between primary and blind field duplicate samples. The calculated RPD for the blind field duplicate sample collected from MW-5 were within the project acceptance criterion of 30% for organics and 20% for inorganics. A summary of the data precision evaluation is included on Table 6.

Based upon the data quality review, the August 2021 results are considered valid and usable. The data are acceptable and can be used for decision-making purposes. Data completeness (the number of successful analyses relative to the number of requested analyses) was 100 percent for samples collected in August 2021.

5.0 SITE INSPECTION

During the semiannual groundwater sampling event, Wood field personnel performed a visual assessment of the soil cap in order to evaluate changes due to erosion, land use, construction, or other factors that may indicate a physical change in the soil cap. Observations were recorded on a "Soil Cap Inspection Form" (Appendix C).

The visual inspections did not indicate any damage to the physical integrity of the soil cap, the need for any repairs or maintenance, or changes to the land use.

6.0 PLANNED ACTIVITIES

The following activities are planned for the monitoring period of January to June 2022:

- The first 2022 semiannual groundwater monitoring event, which will include collection of depth to groundwater measurements and groundwater samples in accordance with the NYSDEC-approved groundwater monitoring program, will be performed.
- The first 2022 semiannual groundwater monitoring report will be submitted to the NYSDEC following the completion of groundwater monitoring and evaluation activities.

7.0 REFERENCES

AMEC Geomatrix, Inc., 2010. Feasibility Study Report, Albion Former Manufactured Gas Plant Site, Site No: 8-37-012, Orleans County, Albion, New York. February.

Division of Water, 1998. Technical and Operational Guidance Series (TOGS) 1.1.1. June. Available at https://www.dec.ny.gov/docs/water_pdf/togs111.pdf

New York State Department of Environmental Conservation (NYSDEC), 2010a. Record of Decision. NM-Albion MGP State Superfund Project, Albion, Orleans County Site No.:837013. March.

NYSDEC, 2010b. DER-10: Technical Guidance for Site Investigation and Remediation. May 3. Available at https://www.dec.ny.gov/docs/remediation_hudson_pdf/der10.pdf

United States Environmental Protection Agency (U.S. EPA), 2020a. National Functional Guidelines for Inorganic Superfund Methods Data Review: OLEM 9240.1-66, EPA 540-R-20-006, November.

U.S. Environmental Protection Agency, 2020b. National Functional Guidelines for Organic Superfund Methods Data Review: OLEM 9240.0-51, EPA 540-R-20-005, November.

Wood Environment & Infrastructure Solutions, Inc., 2018. Monitoring and Sampling Plan, National Grid Former Albion MGP Site, Albion, New York, December 21.

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TABLES

TABLE 1

GROUNDWATER MONITORING PROGRAM

Former Albion MGP Site

Albion, New York

Well ID	Water Level Monitoring Schedule	Water Quality Monitoring Schedule	Laboratory Analysis
MW-1	Semiannual	Semiannual	BTEX by U.S. EPA 8260C, PAHs by U.S. EPA 8270D, Total Cyanide by SM4500-CN-C/E
MW-5			
MW-6			
MW-8R			
MW-9R			
MW-10R			

Abbreviations

BTEX = benzene, toluene, ethylbenzene, xylenes

PAHs = polycyclic aromatic hydrocarbons

U.S. EPA = United States Environmental Protection Agency

TABLE 2

GROUNDWATER ELEVATIONS
AUGUST 2021
Former Albion MGP Site
Albion, New York

Well ID	Well Location	Date Measured	Measuring Point Elevation (NAVD 88)	Depth Below Measuring Point (feet)	Groundwater Elevation (NAVD 88)
MW-1	Up-gradient	8/18/2021	515.04	6.72	508.32
MW-5	On-site	8/18/2021	513.14	7.31	505.83
MW-6	On-site	8/18/2021	510.74	5.86	504.88
MW-8R	On-site	8/18/2021	515.53	11.50	504.03
MW-9R	Down-gradient	8/18/2021	514.70	13.56	501.14
MW-10R	Down-gradient	8/18/2021	515.81	12.77	503.04

Note

1. Wells were surveyed by Costich Engineering, Land Surveying & Landscape Architecture D.P.C. (Costich Engineering), a New York-licensed land surveyor in June 2018. Monitoring well MW-9R was surveyed on November 11, 2019 by Costich Engineering. Water elevations are relative to the North American Vertical Datum 1988 (NAVD 88).

Abbreviation

NAVD 88 = North American Vertical Datum of 1988

TABLE 3

GROUNDWATER ANALYTICAL RESULTS - VOLATILE ORGANIC COMPOUNDS [1,2]
AUGUST 2021
Former Albion MGP Site
Albion, New York

Results in micrograms per liter (µg/L)

Well ID	Sample ID	Sample Date	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene	Xylenes, Total	Total BTEX
MW-1	MW-1-111919	11/19/2019	<1.0 [3]	<1.0	<1.0	<2.0	<1.0	<2.0	<2.0
	MW-1-20200922	9/22/2020	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	<2.0
	MW-1-041221	4/12/2021	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	<2.0
	MW-1-081821	8/18/2021	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	<2.0
MW-5	MW-5-111919/DUP	11/19/2019	**23 / 23**	**4.0 / 4.1**	**13 / 12**	**9.1 / 8.6**	**12 /11**	**21 / 20**	**61 / 59**
	MW-5-20200922/DUP	9/22/2020	**42 / 42**	**4.2 / 4.5**	**8.7 / 9.4**	**3.4 / 3.4**	**5.3 / 5.7**	**8.7 / 9.1**	**64 / 65**
	MW-5-041221/DUP	4/12/2021	**28 / 28**	**3.2 / 2.8**	**11 / 10**	**6.4 / 5.6**	**8.4 / 8.1**	**15 / 14**	**57 / 55**
	MW-5-081821/DUP	8/18/2021	**50 / 52**	**4.1 / 4.0**	**10 / 10**	**2.6 J / 2.4**	**3.3 / 3.2**	**5.9 / 5.6**	**70 / 72**
MW-6	MW-6-112019	11/20/2019	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	<2.0
	MW-6-20200923	9/23/2020	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	<2.0
	MW-6-041221	4/12/2021	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	<2.0
	MW-6-081821	8/18/2021	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	<2.0
MW-8R	MW-8R-112019	11/20/2019	**49**	**2.6**	**3.7**	**12**	**5.7**	**18**	**73**
	MW-8R-20200923	9/23/2020	**4,900**	**160**	**380**	**1,600**	**520**	**2,100**	**7,600**
	MW-8R-041321	4/13/2021	**2,000**	**45 J**	**130**	**470**	**180**	**650**	**2,800**
	MW-8R-081821	8/18/2021	**4,700**	**210**	**380**	**1,300**	**510**	**1,800**	**7,100**
MW-9R	MW-9R-112019	11/20/2019	<1.0	**0.57 J**	<1.0	<2.0	<1.0	<2.0	<2.0
	MW-9R-20200923	9/23/2020	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	<2.0
	MW-9R-041321	4/13/2021	<1.0	<1.0	<1.0	<2.0	<1.0	<2.0	<2.0
	MW-9R-081821	8/18/2021	<4.0	<4.0	<4.0	<8.0	<4.0	<8.0	<8.0

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TABLE 3

GROUNDWATER ANALYTICAL RESULTS - VOLATILE ORGANIC COMPOUNDS [1,2]
AUGUST 2021
Former Albion MGP Site
Albion, New York

Results in micrograms per liter (µg/L)

Well ID	Sample ID	Sample Date	Benzene	Toluene	Ethylbenzene	m,p-Xylenes	o-Xylene	Xylenes, Total	Total BTEX
MW-10R	MW-10-111919	11/19/2019	**14**	<1.0	<1.0	<2.0	<1.0	<2.0	**14**
	MW-10R-20200922	9/22/2020	**24**	<1.0	<1.0	**0.95 J**	<1.0	**0.95 J**	**25**
	MW-10R-041221	4/12/2021	**23**	<1.0	<1.0	<2.0	<1.0	<2.0	**23**
	MW-10R-081821	8/18/2021	**20**	<2.0	<2.0	<4.0	<2.0	<4.0	**20**
Ambient Water Quality Standards and Guidance Values [4]			1	5	5	5	5	5	--

Notes

1. Only detected compounds are presented. Detections are shown in **bold.** Highlighted cells indicate the concentration exceeds the respective screening criteria.
2. Samples analyzed for VOCs in accordance with U.S. EPA Methods 8260B or 8260C by Eurofins TestAmerica of Buffalo, New York.
3. "<" indicates constituent was not detected at a concentration equal to or greater than the laboratory reporting limit shown.
4. Division of Water 1998. Technical and Operational Guidance Series 1.1.1. June. Groundwater Standard Values for groundwater as a drinking source are shown where available; Guidance Values are shown where no Standard Value is available. Available at: https://www.dec.ny.gov/docs/water_pdf/togs111.pdf

Abbreviations

-- = not applicable
BTEX = benzene, toluene, ethylbenzene, and xylenes
DUP = field duplicate sample
J = the analyte detected at a level less than the reporting limit and greater than or equal to the method detection limit.
µg/L = micrograms per liter
U.S. EPA = United States Environmental Protection Agency
VOCs = volatile organic compounds

TABLE 4

GROUNDWATER ANALYTICAL RESULTS - POLYCYCLIC AROMATIC HYDROCARBONS [1,2]
AUGUST 2021
Former Albion MGP Site
Albion, New York

Results in micrograms per liter (µg/L)

Well ID	Sample ID	Sample Date	Acenaphthene	Acenaphthylene	Anthracene	Benzo[a]anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(k)fluoranthene	Benzo[g,h,i]perylene	Chrysene	Dibenz[a,h]anthracene	Fluoranthene	Fluorene	Indeno(1,2,3-cd)pyrene	Phenanthrene	Pyrene	Naphthalene
MW-1	MW-1-111919	11/19/2019	<5.0 [3]	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
	MW-1-20200922	9/22/2020	**24 J**	**20 J**	**5.8 J**	<25	<25	<25	<25	<25	<25	<25	**6.4 J**	**26**	<25	**32**	**4.2 J**	**14 J**
	MW-1-041221	4/12/2021	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
	MW-1-081821	8/18/2021	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
MW-5	MW-5-111919/DUP	11/19/2019	**34 / 38**	**33 / 36**	**6.2 / 6.4 J**	<5.0 / <25	<5.0 / <25	<5.0 / <25	<5.0 / <25	<5.0 / <25	<5.0 / <25	<5.0 / <25	**5.6 / 5.4 J**	**45 / 46**	<5.0 / <25	**23 / 23 J**	**3.1 J / 3.5 J**	**24 / 25**
	MW-5-20200922/DUP	9/22/2020	**22 J / 22 J**	**19 J / 19 J**	**6.0 J / 6.0 J**	<25 /<25	<25 /<25	<25 /<25	<25 /<25	<25 /<25	<25 /<25	<25 /<25	**6.2 J / 6.2 J**	**24 J / 24 J**	<25 /<25	**29 J+ / 29 J+**	**4.0 J / 4.0 J**	**13 J / 13 J**
	MW-5-041221/DUP	4/12/2021	**16 J / 14 J**	**21 J / 17 J**	**3.7 J / 2.8 J**	<25 /<25	<25 /<25	<25 /<25	<25 /<25	<25 /<25	<25 /<25	<25 /<25	**3.9 J / 3.5 J**	**20 J / 17 J**	<25 / <25	**12 J / 6.7 J**	**2.2 J / 2.2 J**	**41 / 31**
	MW-5-081821/DUP	8/18/2021	**15 / 18**	**8.9 / 10**	**3.9 J / 3.9 J**	<5.0 / <5.0	<5.0 / <5.0	<5.0 / <5.0	<5.0 / <5.0	<5.0 / <5.0	<5.0 / <5.0	<5.0 / <5.0	**4.8 J / 5.3**	**15 / 17**	<5.0 / <5.0	**10 / 7.7**	**2.7 J / 3.0 J**	**5.6 / 5.3**
MW-6	MW-6-112019	11/20/2019	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
	MW-6-20200923	9/23/2020	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
	MW-6-041221	4/12/2021	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
	MW-6-081821	8/18/2021	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
MW-8R	MW-8R-112019	11/20/2019	**57**	**21 J**	<25	<25	<25	<25	<25	<25	<25	<25	**4.2 J**	**34**	<25	**33**	**2.1 J**	**900**
	MW-8R-20200923	9/23/2020	**95 J**	**8.1 J**	**7.6 J**	<100	<100	<100	<100	<100	<100	<100	<100	**41 J**	<100	<100 U	<100	**2,300**
	MW-8R-041321	4/13/2021	**65 J**	<500	<500	<500	<500	<500	<500	<500	<500	<500	<500	<500	<500	<500	<500	**860**
	MW-8R-081821	8/18/2021	**64 J**	**23 J**	<250	<250	<250	<250	<250	<250	<250	<250	<250	**42 J**	<250	**32 J**	<250	**1,900**
MW-9R	MW-9R-112019	11/20/2019	**6.1 J+**	**0.38 J+**	**0.65 J+**	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	**3.0 J+**	<5.0	**2.8 J+**	<5.0	**50**
	MW-9R-20200923	9/23/2020	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25
	MW-9R-041321	4/13/2021	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25	<25
	MW-9R-081821	8/18/2021	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
MW-10R	MW-10-111919	11/19/2019	**0.86 J**	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	**0.99 J**
	MW-10R-20200922	9/22/2020	**1.0 J+**	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0 U	<5.0	**3.5 J+**
	MW-10R-041221	4/12/2021	**0.73 J**	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	**3.4 J**
	MW-10R-081821	8/18/2021	**2.1 J**	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	**8.9**
Ambient Water Quality Standards and Guidance Values [4]			20	--	50	0.002	0.002	0.002	0.002	--	0.002	--	50	50	0.002	50	50	10

TABLE 4

GROUNDWATER ANALYTICAL RESULTS - POLYCYCLIC AROMATIC HYDROCARBONS [1,2]
AUGUST 2021
Former Albion MGP Site
Albion, New York

Notes
1. Only detected compounds are presented. Detections are shown in **bold**. Highlighted cells indicate the concentration exceeds the respective screening criteria.
2. Samples analyzed for PAHs in accordance with U.S. EPA Method 8270D by Eurofins TestAmerica of Buffalo, New York.
3. "<" indicates constituent was not detected at a concentration equal to or greater than the laboratory reporting limit shown.
4. Division of Water 1998. Technical and Operational Guidance Series 1.1.1. June. Groundwater Standard Values for groundwater as a drinking source are shown where available; Guidance Values are shown where no Standard Value is available. Available at https://www.dec.ny.gov/docs/water_pdf/togs111.pdf

Abbreviations
-- = not applicable
DUP = field duplicate sample
J = the analyte detected at a concentration less than the reporting limit and greater than or equal to the method detection limit
J+ = the reported concentration may be estimated high
µg/L = micrograms per liter
PAH = polycyclic aromatic hydrocarbons
U = The analyte was detected at a concentration below the reporting limit, but due to a detection of the compound in the associated laboratory method blank the detection is not considered valid
U.S. EPA = United States Environmental Protection Agency

TABLE 5

GROUNDWATER ANALYTICAL RESULTS - TOTAL CYANIDE [1,2]
AUGUST 2021
Former Albion MGP Site
Albion, New York

Results in milligrams per liter (mg/L)

Well ID	Sample ID	Sample Date	Cyanide, Total
MW-1	MW-1-111919	11/19/2019	**0.098**
	MW-1-20200922	9/22/2020	**0.11**
	MW-1-041221	4/12/2021	**0.10**
	MW-1-081821	8/18/2021	**0.10**
MW-5	MW-5-111919/DUP	11/19/2019	**0.16 / 0.16**
	MW-5-20200922/DUP	9/22/2020	**0.21 / 0.22**
	MW-5-041221/DUP	4/12/2021	**0.18 / 0.17**
	MW-5-081821	8/18/2021	**0.21 / 0.22**
MW-6	MW-6-112019	11/20/2019	**0.041**
	MW-6-20200923	9/23/2020	**0.068**
	MW-6-041221	4/12/2021	**0.013**
	MW-6-081821	8/18/2021	**0.051**
MW-8R	MW-8R-112019	11/20/2019	**0.21**
	MW-8R-20200923	9/23/2020	**0.15**
	MW-8R-041321	4/13/2021	**0.17**
	MW-8R-081821	8/18/2021	**0.19**
MW-9R	MW-9R-112019	11/20/2019	**0.054**
	MW-9R-20200923	9/23/2020	**0.080**
	MW-9R-041321	4/13/2021	**0.096**
	MW-9R-081821	8/18/2021	**0.070**
MW-10R	MW-10-111919	11/19/2019	**0.010**
	MW-10R-20200922	9/22/2020	**0.030**
	MW-10R-041221	4/12/2021	**0.024**
	MW-10R-081821	8/18/2021	**0.027**
Ambient Water Quality Standards and Guidance Values [3]			0.2

Notes

1. Only detected compounds are presented. Detections are shown in **bold**. Highlighted cells indicate the concentration exceeds the respective screening criteria.
2. Samples analyzed Total Cyanide in accordance with Standard Method 4500-CN-C/E by Eurofins TestAmerica of North Canton, Ohio.
3. Division of Water 1998. Technical and Operational Guidance Series 1.1.1. June. Groundwater Standard Value for groundwater as a drinking source is shown. Available at https://www.dec.ny.gov/docs/water_pdf/togs111.pdf

Abbreviations

DUP = field duplicate
mg/L = milligrams per liter

TABLE 6

PRECISION DATA SUMMARY
AUGUST 2021
Former Albion MGP Site
Albion, New York

Results reported in (ug/L)

Primary Sample ID	Duplicate Sample ID	Collection Date	Compound[1]	Primary Sample		Duplicate Sample		RPD[2]	Absolute Difference Between Sample
				Reporting Limit	Sample Result	Reporting Limit	Sample Result		
MW-5-081821	MW-50-081821	8/18/2021	Benzene	2.0	50	1.0	52	3.9	NA
		8/18/2021	Toluene	2.0	4.1	1.0	4.0	2.5	NA
		8/18/2021	Ethylbenzene	2.0	10	1.0	10	0.0	NA
		8/18/2021	m & p-Xylene	4.0	2.6 J	2.0	2.4	NA	0.20
		8/18/2021	o-Xylene	2.0	3.3	1.0	3.2	NA	0.10
		8/18/2021	Total Xylenes	4.0	5.9	2.0	5.6	NA	0.30
		8/18/2021	BTEX	4.0	70	2.0	72	2.8	NA
		8/18/2021	Acenaphthene	5.0	15	5.0	18	18.2	NA
		8/18/2021	Acenaphthylene	5.0	8.9	5.0	10	NA	1.1
		8/18/2021	Anthracene	5.0	3.9 J	5.0	3.9 J	NA	0.00
		8/18/2021	Fluoranthene	5.0	4.8 J	5.0	5.3	NA	0.50
		8/18/2021	Fluorene	5.0	15	5.0	17	12.5	NA
		8/18/2021	Naphthalene	5.0	5.6	5.0	5.3	NA	0
		8/18/2021	Phenanthrene	5.0	10	5.0	7.7	NA	2.3
		8/18/2021	Pyrene	5.0	2.7 J	5.0	3.0 J	NA	0.30
		8/18/2021	Total Cyanide	0.010	0.21	0.010	0.22	4.7	NA

Notes

1. Only compounds detected in at least one of the primary or duplicate samples are shown.

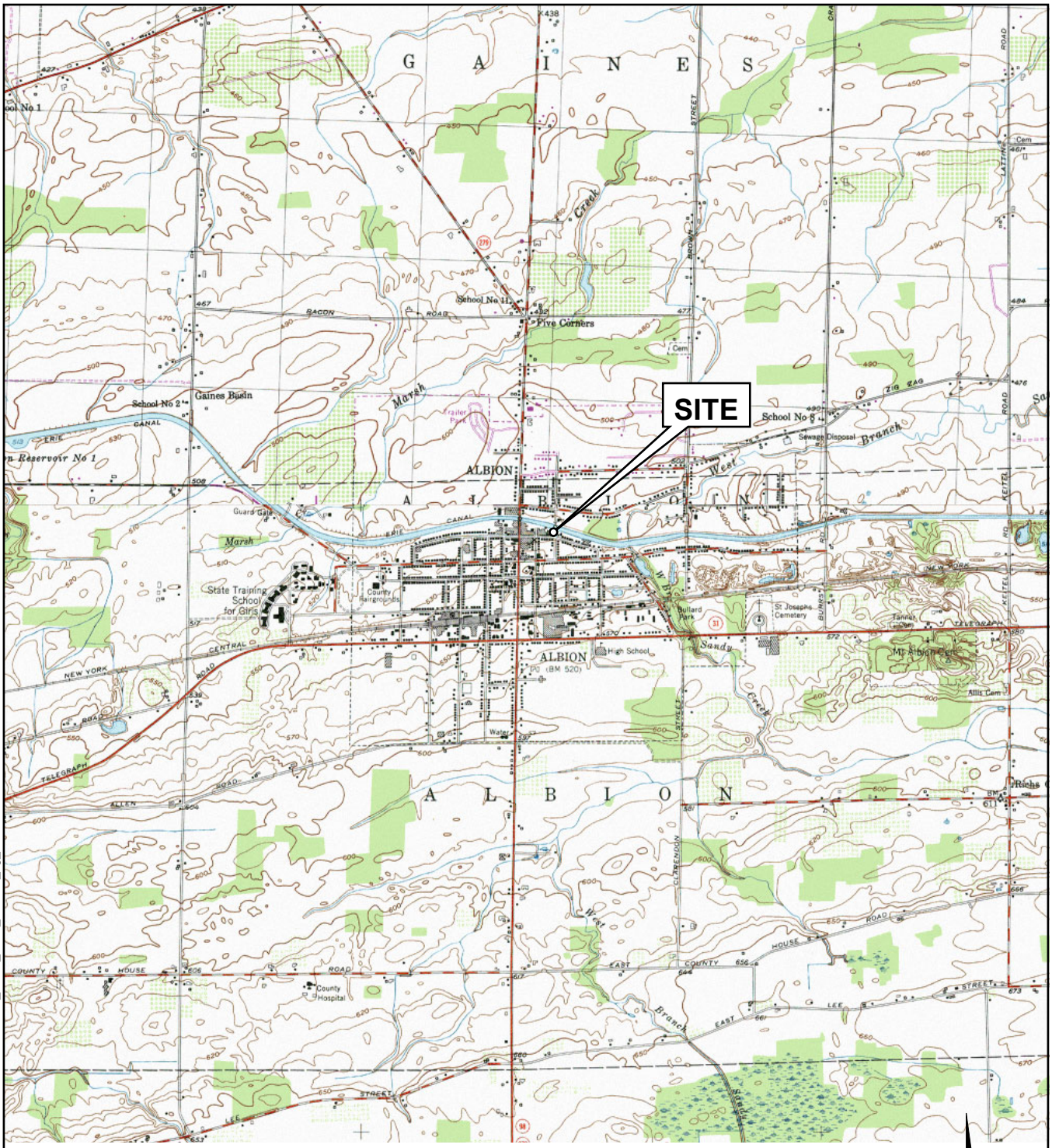
2. Relative Percent Difference (RPD) is calculated by: $$RPD\% = \left| \frac{2(S_1 - S_2)}{S_1 + S_2} \right| \times 100$$

   where S1 = primary sample concentration and S2 = duplicate sample concentration.
   Duplicate results are acceptable when the RPD between the results is less than 30% for **organics** or 20% for **inorganics.**

3. RPD is not applicable when one or both sample results are less than two times the reporting limit (RL) for **organics** or less than 5 times the RL for the **inorganics**. When the RPD is not applicable, duplicate results are acceptable when:
   - **both results are positive**: the absolute difference between the results is less than the RL.
   - **one non-detection (ND) and one positive result:** the absolute difference between the positive results and the reporting limit of the ND is less than the RL of the ND.

wood.

FIGURES



SITE VICINITY MAP
Albion Former MGP Site
Albion, New York

wood.

By: DMO

Date: 09/20/2021

Proj. No. 0078000050.04

Figure 1

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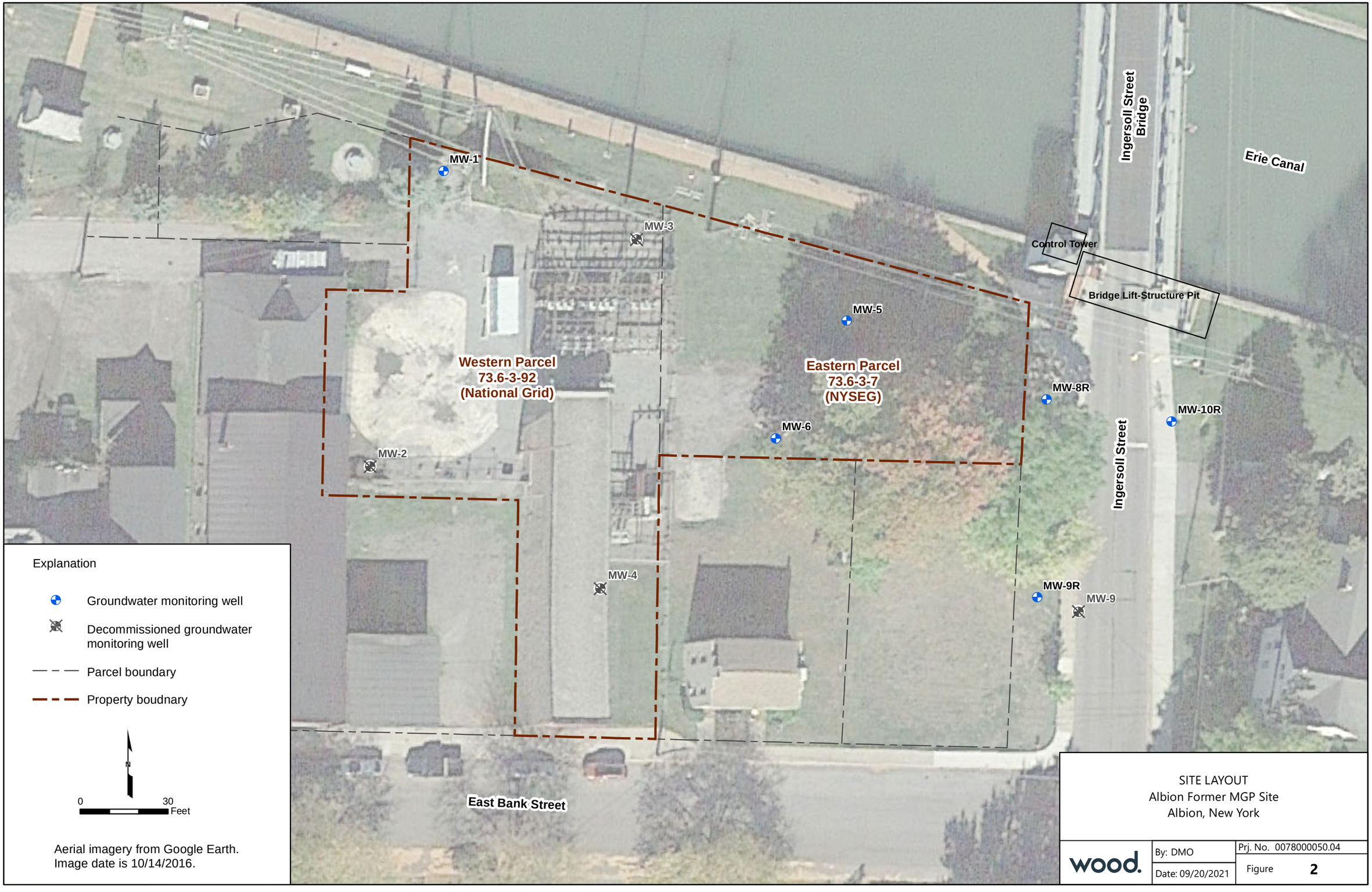

SITE LAYOUT
Albion Former MGP Site
Albion, New York

wood.	By: DMO	Prj. No. 0078000050.04
	Date: 09/20/2021	Figure 2

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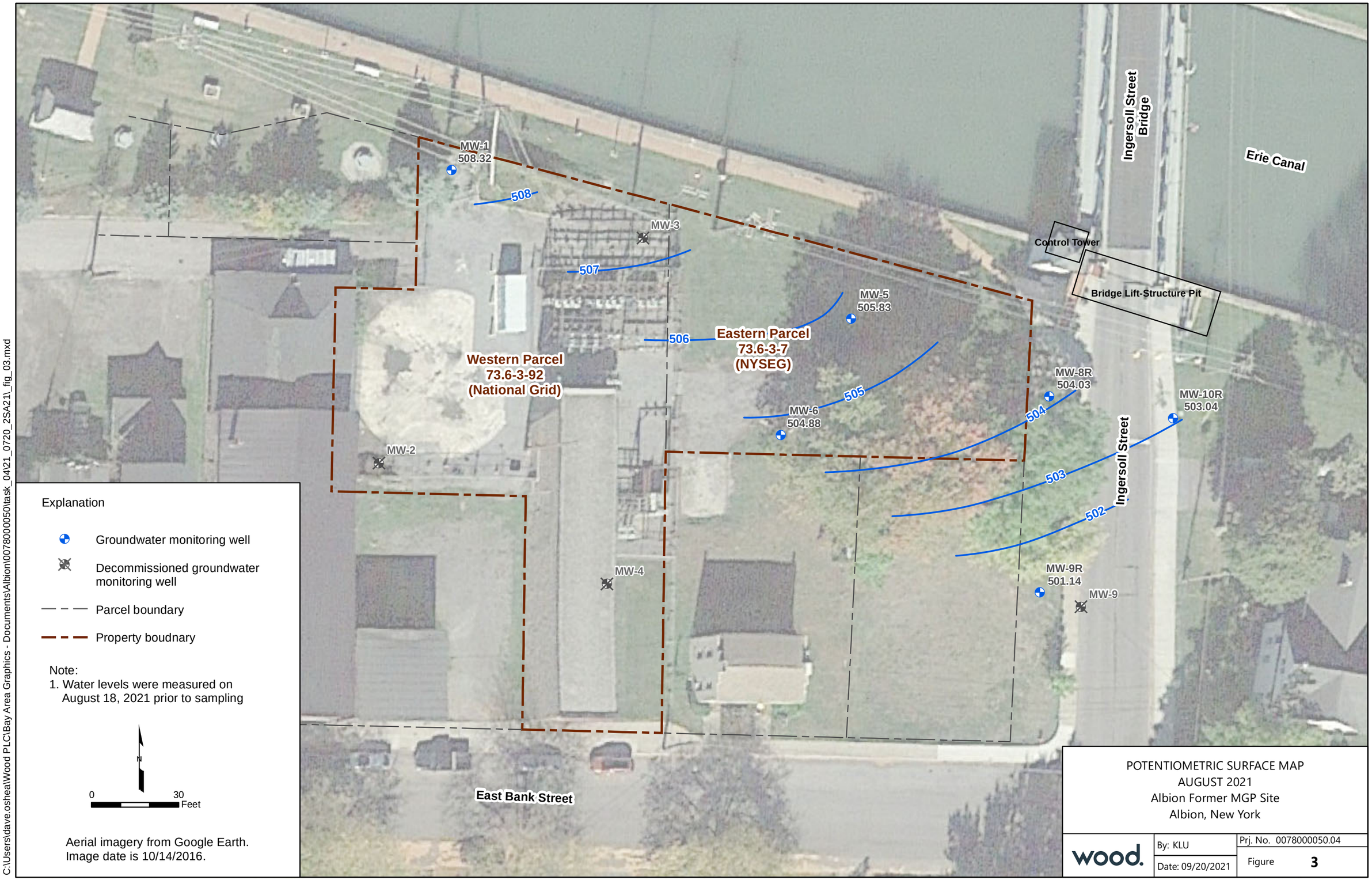

Explanation

- Groundwater monitoring well
- Decommissioned groundwater monitoring well
- Parcel boundary
- Property boudnary

Note:
1. Water levels were measured on August 18, 2021 prior to sampling

N

0 30 Feet

Aerial imagery from Google Earth.
Image date is 10/14/2016.

POTENTIOMETRIC SURFACE MAP
AUGUST 2021
Albion Former MGP Site
Albion, New York

wood.	By: KLU	Prj. No. 0078000050.04
	Date: 09/20/2021	Figure 3

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MW-1	
Date	8/18/2021
Total BTEX	<2.0
Acenaphthene	<5.0
Fluorene	<5.0
Acenaphthylene	<5.0
Anthracene	<5.0
Fluoranthene	<5.0
Naphthalene	<5.0
Phenanthrene	<5.0
Pyrene	<5.0
Cyanide, Total	0.1

MW-5	
Date	8/18/2021
Total BTEX	70/72
Acenaphthene	15/18
Fluorene	15/17
Acenaphthylene	8.9/10
Anthracene	3.9 J/3.9 J
Fluoranthene	4.8 J/5.3
Naphthalene	5.6/5.3
Phenanthrene	10/7.7
Pyrene	2.7 J/3.0 J
Cyanide, Total	0.21/0.22

MW-8R	
Date	8/18/2021
Total BTEX	7,100
Acenaphthene	64 J
Fluorene	42 J
Acenaphthylene	23 J
Anthracene	<250
Fluoranthene	<250
Naphthalene	1,900
Phenanthrene	32 J
Pyrene	<250
Cyanide, Total	0.19

MW-6	
Date	8/18/2021
Total BTEX	<2.0
Acenaphthene	<5.0
Fluorene	<5.0
Acenaphthylene	<5.0
Anthracene	<5.0
Fluoranthene	<5.0
Naphthalene	<5.0
Phenanthrene	<5.0
Pyrene	<5.0
Cyanide, Total	0.051

MW-9R	
Date	8/18/2021
Total BTEX	<8.0
Acenaphthene	<5.0
Fluorene	<5.0
Acenaphthylene	<5.0
Anthracene	<5.0
Fluoranthene	<5.0
Naphthalene	<5.0
Phenanthrene	<5.0
Pyrene	<5.0
Cyanide, Total	0.07

MW-10R	
Date	8/18/2021
Total BTEX	20
Acenaphthene	2.1 J
Fluorene	<5.0
Acenaphthylene	<5.0
Anthracene	<5.0
Fluoranthene	<5.0
Naphthalene	8.9
Phenanthrene	<5.0
Pyrene	<5.0
Cyanide, Total	0.027

MW-1
MW-2
MW-3
MW-4
MW-5
MW-6
MW-8R
MW-9R
MW-9
MW-10R

Western Parcel
73.6-3-92
(National Grid)

Eastern Parcel
73.6-3-7
(NYSEG)

Ingersoll Street Bridge
Erie Canal
Control Tower
Bridge Lift-Structure Pit
Ingersoll Street
East Bank Street

Explanation

- Groundwater monitoring well
- Decommissioned groundwater monitoring well
- Parcel boundary
- Property boudnary

MW-5 ← Well ID
Date 8/18/2021
Total BTEX 70/72
Acenaphthene 15/18
Fluorene 15/17
Acenaphthylene 8.9/10
Anthracene 3.9 J/3.9 J
Fluoranthene 4.8 J/5.3
Naphthalene 5.6/5.3
Phenanthrene 10/7.7
Pyrene 2.7 J/3.0 J — Concentration in micrograms per liter (µg/L)
Cyanide, Total 0.21/0.22 — Concentration in milligrams per liter (mg/L)
Duplicate data

Abbreviations:
EPA Environmental Protection Agency
VOCs volatile organic compounds
J the analyte was positively identified; however, the associated numerical value is the approximate concentration of the analyte in the sample
BTEX Benzene, Toluene, Ethylbenzene, Xylenes

N
0 30 Feet

Aerial imagery from Google Earth. Image date is 10/14/2016.

Notes:
1. Samples analyzed for VOCs, PAHs, and Total Cyanide in accordance with U.S. EPA Methods 8260B, 8270D, and SIM4500-CN-C/E, respectively, by Eurofins TestAmerica of Buffalo, New York.
2. "<" indicates constituent was not detected at a concentration equal to or greater than the laboratory reporting limit shown.

GROUNDWATER ANALYTICAL RESULTS
AUGUST 2021
Albion Former MGP Site
Albion, New York

wood.

By: DMO
Date: 09/20/2021
Prj. No. 0078000050.04
Figure 4

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APPENDIX A

Groundwater Sampling Records

wood.

MONITORING WELL
SAMPLE COLLECTION LOG

Project Name: National Grid – Former MGP Site No. 837012, Albion, New York

Project/Task #: 0078000050.03 | **Sampled By:** AL | **Date:** 8/18/21

Well Number/ID: MW-1 | **Sample ID:** MW-1-081821 | **Duplicate ID:** N/A

Method of Purging: Low-Flow | **Method of Sampling:** Low-Flow | **Intake Depth:** 13' bgs

Field Equipment

Equipment	Model	Serial #/Rental ID	Date Received/Serviced	Date Calibrated
Multi-Probe	Horiba U-52	TB9J7L8M	8/17/21	8/18/21
Turbidimeter				

Casing Purge Volume Calculations

A. Depth to Water = 6.72 ft.	D. Water Column (B-A) = 13.38 ft.	Depth to Water After Sampling = 7.73 ft.
B. Well Total Depth = 20.10 ft.	E. 1 Well Volume (C^2 x 0.0408 x D) = 2.18 gal.	Actual Volume Purged (from below) = 1.75 gal/ml.
C. Well Diameter = 2 in.	F. 3 Well Volumes (3 x E) = 6.55 gal.	(If applicable, see pumping system volume calculation below)

Pump and Flow Cell Volume	V_P = N/A	ml	**Pumping System Volume Calculation**
Tubing Inside Diameter	D = N/A	in.	Pumping System Volume (V_S)
Tubing Length	L = N/A	in.	$V_S = V_P + \pi * D^2 / 4 * L * 16.39$ ml/in³
Conversion from Inches³ to ml	1 in³ = 16.39	ml	_____V_S = (_____) + (3.1415 * _____ ² / 4) * (_____) * 16.39

Purging Data			Water Quality Parameters (within range for 3 consecutive readings if low-flow sampling)						
Time (24 hr)	Purge Volume ☐ gal ☑ ml	Flow Rate ☐ gpm ☑ ml/min	Temp (°C)	Specific Conductance (µS/cm)	Dissolved Oxygen (mg/L)	pH	Oxidation Reduction Potential (mV)	Turbidity (NTU)	Remarks
			Stabilization(1):	± 3%	± 0.2 mg/L	± 0.2	± 20 mV	<10 NTU	DTW
800	Initial	-							6.72
805	1000	200	21.68	0.712	3.85	6.49	265	0.4	7.65
810	1,625	125	21.31	0.726	3.48	6.63	262	0.2	7.70
815	2,250	125	21.24	0.763	3.06	6.69	258	1.0	7.62
820	2,875	125	20.84	0.765	2.77	6.78	257	4.9	7.69
825	3,500	125	20.46	0.803	3.39	6.82	255	0.3	7.67
830	4,125	125	20.51	0.789	3.22	6.85	254	2.2	7.74
835	4,750	125	20.42	0.805	3.11	6.89	253	1.1	7.75
840	5,375	125	19.94	0.803	3.05	6.93	253	0.8	7.84

Remarks: TOC PID = N/A

Purge pumping system volume before recording parameters on dedicated pumps only.

(1) Based on EPA low-flow sampling guidelines, ASTM D 6771-02, and research validated Best Practices (see SAP for details).

Signature: Carlos Lopez | **Checked By:**

Purging/Sampling Date: 8/18/21 **Well Number/ID:** MW-1

ADDITIONAL FIELD PARAMETER COLLECTION LOG for MICRO-PURGE SAMPLING
(continued from frontside)

Purging Data			Water Quality Parameters (within range for 3 consecutive readings)						
Time (24 hr)	Purge Volume ☐ gal ☑ ml	Flow Rate ☐ gpm ☑ ml/min	Temp (°C)	Specific Conductance (µS/cm)	Dissolved Oxygen (mg/L)	pH	Oxidation Reduction Potential (mV)	Turbidity (NTU)	Remarks
			Stabilization(1):	± 3%	± 0.2 mg/L	± 0.2	± 20 mV	<10 NTU	DTW
845	6,000	125	20.03	0.820	2.92	6.95	252	0.0	7.85
850	6,625	125	20.10	0.820	2.87	6.97	251	0.0	7.87
855		Sampled MW-1-081821							

Remarks: ▷ Sample clear, odorless

(1) Based on EPA low-flow sampling guidelines, ASTM D 6771-02, and research validated Best Practices (see SAP for details).

wood.

MONITORING WELL SAMPLE COLLECTION LOG

Project Name: National Grid – Former MGP Site No. 837012, Albion, New York

Project/Task #: 0078000050.03 | **Sampled By:** A. Lyons | **Date:** 8/18/21

Well Number/ID:	**Sample ID:**	**Duplicate ID:**
MW-5	MW-5-081821	MW-50-081821
Method of Purging:	**Method of Sampling:**	**Intake Depth:**
Low-Flow	Low-Flow	14.5' bgs

Field Equipment

Equipment	Model	Serial #/Rental ID	Date Received/Serviced	Date Calibrated
Multi-Probe	Horiba U52	TB9J7L8M	8/17/21	8/18/21
Turbidimeter				

Casing Purge Volume Calculations

A. Depth to Water = 7.31 ft.	D. Water Column (B-A) = 9.25 ft.	Depth to Water After Sampling = 8.13 ft.
B. Well Total Depth = 16.56 ft.	E. 1 Well Volume (C^2 x 0.0408 x D) = 1.51 gal.	Actual Volume Purged (from below) = 0.99 gal/ml.
C. Well Diameter = 2 in.	F. 3 Well Volumes (3 x E) = 4.52 gal.	(If applicable, see pumping system volume calculation below)

Pump and Flow Cell Volume	V_p = **N/A**	ml	**Pumping System Volume Calculation**
Tubing Inside Diameter	D = **N/A**	in.	Pumping System Volume (V_S)
Tubing Length	L = **N/A**	in.	$V_S = V_P + \pi * D^2 / 4 * L * 16.39$ ml/in³
Conversion from Inches³ to ml	1 in³ = 16.39	ml	_____ V_S = (_____) + (3.1415 * _____ ² / 4) * (_____) * 16.39

Purging Data			Water Quality Parameters (within range for 3 consecutive readings if low-flow sampling)						
Time (24 hr)	**Purge Volume** ☐ gal ☑ ml	**Flow Rate** ☐ gpm ☑ ml/min	**Temp** (°C)	**Specific Conductance** (~~µS/cm~~ mS/)	**Dissolved Oxygen** (mg/L)	**pH**	**Oxidation Reduction Potential** (mV)	**Turbidity** (NTU)	**Remarks** DTW
			Stabilization[1]:	**± 3%**	**± 0.2 mg/L**	**± 0.2**	**± 20 mV**	**<10 NTU**	
1220	Initial		Begin purge						7.31
1225	750	150	21.72	1.25	3.82	8.19	75	1.0	7.3375
1230	1,250	100	19.23	1.15	0.99	7.73	-101	0.6	7.85
1235	1,750	100	18.71	1.10	0.60	7.67	-122	1.1	8.03
1240	2,250	100	18.23	1.05	0.41	7.66	-134	0.7	8.13
1245	2,750	100	18.26	1.04	0.30	7.65	-139	0.0	8.13
1250	3,250	100	18.27	1.05	0.28	7.65	-145	0.0	8.13
1255	3,750	100	18.20	1.05	0.24	7.65	-146	0.0	8.13
1300		Sampled MW-5-081821 and MW-50-081821 (@ 1200)							

Remarks: TOC PID = N/A Sample clear, has odor

Purge pumping system volume before recording parameters on dedicated pumps only.

(1) Based on EPA low-flow sampling guidelines, ASTM D 6771-02, and research validated Best Practices (see SAP for details).

Signature: _____ **Checked By:** _____

wood.

MONITORING WELL
SAMPLE COLLECTION LOG

Project Name: National Grid – Former MGP Site No. 837012, Albion, New York

Project/Task #: 0078000050.03 | **Sampled By:** A. Lyons | **Date:** 8/18/21

Well Number/ID: MW-6 | **Sample ID:** MW-6-081821 | **Duplicate ID:** N/A

Method of Purging: Low-Flow | **Method of Sampling:** Low-Flow | **Intake Depth:** 13.5' bgs

Field Equipment

Equipment	Model	Serial #/Rental ID	Date Received/Serviced	Date Calibrated
Multi-Probe	Horiba U-52	TB9J7L8M	8/17/21	8/18/21
Turbidimeter				

Casing Purge Volume Calculations

A. Depth to Water = 5.86 ft.	D. Water Column (B-A) = 9.51 ft.	Depth to Water After Sampling = 6.18 ft.
B. Well Total Depth = 15.37 ft.	E. 1 Well Volume (C^2 x 0.0408 x D) = 1.55 gal.	Actual Volume Purged (from below) = 1.62 gal/ml.
C. Well Diameter = 2 in.	F. 3 Well Volumes (3 x E) = 4.66 gal.	(If applicable, see pumping system volume calculation below)

Pump and Flow Cell Volume	V_P =	N/A	ml
Tubing Inside Diameter	D =	N/A	in.
Tubing Length	L =	N/A	in.
Conversion from Inches³ to ml	1 in³ =	16.39	ml

Pumping System Volume Calculation

Pumping System Volume (V_S)

$V_S = V_P + \pi * D^2 / 4 * L * 16.39$ ml/in³

_____ V_S = (_____) + (3.1415 * _____ ² / 4) * (_____) * 16.39

Purging Data			Water Quality Parameters (within range for 3 consecutive readings if low-flow sampling)						
Time (24 hr)	Purge Volume ☐ gal ☒ ml	Flow Rate ☐ gpm ☒ ml/min	Temp (°C)	Specific Conductance (mS/cm)	Dissolved Oxygen (mg/L)	pH	Oxidation Reduction Potential (mV)	Turbidity (NTU)	Remarks
			Stabilization(1):	± 3%	± 0.2 mg/L	± 0.2	± 20 mV	<10 NTU	
									5.86
1110	Initial		Begin purge						
1115	875	175	17.89	2.78	1.06	7.49	156	7.6	6.10
1120	1625	150	17.27	1.16	0.49	7.54	151	2.0	6.19
1125	2375	150	17.71	0.912	0.42	7.54	147	0.0	6.18
1130	3125	150	17.66	0.855	0.37	7.48	150	0.0	6.18
1135	3875	150	17.60	0.834	0.34	7.47	150	0.0	6.18
1140	4625	150	17.33	0.832	0.32	7.47	150	0.0	6.18
1145	5375	150	17.25	0.826	0.37	7.48	150	0.0	6.18
1150	6125	150	17.51	0.824	0.27	7.48	148	0.0	

Remarks: TOC PID = N/A Sampled MW-6-081821 @ 1155

Purge pumping system volume before recording parameters on dedicated pumps only.

(1) Based on EPA low-flow sampling guidelines, ASTM D 6771-02, and research validated Best Practices (see SAP for details).

Signature: _____ **Checked By:** _____

wood.

MONITORING WELL
SAMPLE COLLECTION LOG

Project Name: National Grid – Former MGP Site No. 837012, Albion, New York

Project/Task #: 0078000050.03

Sampled By: AL

Date: 8/18/21

Well Number/ID: MW-8R

Sample ID: MW-8R-081821

Duplicate ID: N/A

Method of Purging: Low-Flow

Method of Sampling: Low-Flow

Intake Depth: 16' bgs

Field Equipment

Equipment	Model	Serial #/Rental ID	Date Received/Serviced	Date Calibrated
Multi-Probe	Horiba U-52	TB9J7L8m	8/17/21	8/18/21
Turbidimeter				

Casing Purge Volume Calculations

A. Depth to Water = 11.50 ft.

B. Well Total Depth = 20.72 ft.

C. Well Diameter = 2 in.

D. Water Column (B-A) = 9.22 ft.

E. 1 Well Volume (C^2 x 0.0408 x D) = 1.5 gal.

F. 3 Well Volumes (3 x E) = 4.5 gal.

Depth to Water After Sampling = 12.25 ft.

Actual Volume Purged (from below) = 2.03 gal/mL

(If applicable, see pumping system volume calculation below)

Pump and Flow Cell Volume	V_p =	N/A	ml
Tubing Inside Diameter	D =	N/A	in.
Tubing Length	L =	N/A	in.
Conversion from Inches³ to ml	1 in³ =	16.39	ml

Pumping System Volume Calculation

Pumping System Volume (V_S)

$V_S = V_P + \pi * D^2 / 4 * L * 16.39$ ml/in³

_____ V_S = (_____) + (3.1415 * _____ ² / 4) * (_____) * 16.39

Purging Data			Water Quality Parameters (within range for 3 consecutive readings if low-flow sampling)						
Time (24 hr)	Purge Volume ☐ gal ☐ ml	Flow Rate ☐ gpm ☐ ml/min	Temp (°C)	Specific Conductance (µS/cm)	Dissolved Oxygen (mg/L)	pH	Oxidation Reduction Potential (mV)	Turbidity (NTU)	Remarks
			Stabilization(1):	± 3%	± 0.2 mg/L	± 0.2	± 20 mV	<10 NTU	DTW
1325	Initial	—	Begin purge						11.50
1330	1000	200	19.97	2.49	0.39	7.46	-151	0.0	11.81
1335	1620	150	19.47	2.53	0.27	7.45	-159	1.0	12.01
1340	2250	150	19.38	2.56	0.25	7.43	-163	0.0	12.13
1345	2875	150	19.32	2.54	0.22	7.44	-167	0.0	12.20
1350	3500	120	19.33	2.53	0.21	7.45	-173	0.0	12.22
1355	4,100	120	19.41	2.46	0.20	7.46	-182	0.0	12.24
1400	4,700	120	19.20	2.37	0.24	7.41	-183	0.0	12.25
1405	5,300	120	19.34	2.34	0.19	7.47	-183	0.0	12.25

Remarks: TOC PID = N/A

Purge pumping system volume before recording parameters on dedicated pumps only.

(1) Based on EPA low-flow sampling guidelines, ASTM D 6771-02, and research validated Best Practices (see SAP for details).

Signature:

Checked By:

Purging/Sampling Date: 8/18/21 **Well Number/ID:** MW-8R

ADDITIONAL FIELD PARAMETER COLLECTION LOG for MICRO-PURGE SAMPLING (continued from frontside)

Purging Data			Water Quality Parameters (within range for 3 consecutive readings)							
Time (24 hr)	Purge Volume ☐ gal ☑ ml	Flow Rate ☐ gpm ☑ ml/min	Temp (°C)	Specific Conductance (µS/cm)	Dissolved Oxygen (mg/L)	pH	Oxidation Reduction Potential (mV)	Turbidity (NTU)	Remarks
			Stabilization(1):	± 3%	± 0.2 mg/L	± 0.2	± 20 mV	<10 NTU	DTW
1410	5,900	120	19.43	2.30	0.18	7.41	-180	0.0	12.25
1415	6,500	120	19.48	2.22	0.16	7.36	-180	0.0	12.25
1420	7,100	120	19.46	2.19	0.15	7.34	-179	0.0	12.25
1425	7,700	120	19.47	2.16	0.14	7.33	-180	0.0	12.25
1430		Sampled MW-8R-081821							
1435									

Remarks: Sample has odor, slight yellow discoloring

(1) Based on EPA low-flow sampling guidelines, ASTM D 6771-02, and research validated Best Practices (see SAP for details).

wood.

MONITORING WELL
SAMPLE COLLECTION LOG

Project Name: National Grid – Former MGP Site No. 837012, Albion, New York		
Project/Task #: 0078000050.03	**Sampled By:** AL	**Date:** 8/18/21

Well Number/ID: MW-9R	**Sample ID:** MW-9R-081821	**Duplicate ID:** N/A
Method of Purging: Low-Flow	**Method of Sampling:** Low-Flow	**Intake Depth:** 17.1 ~~17.1~~ bgs Intake moved lower due to low WL

Field Equipment

Equipment	Model	Serial #/Rental ID	Date Received/Serviced	Date Calibrated
Multi-Probe	Horiba U52	TB9J7L8M	8/17/21	8/18/21
Turbidimeter				

Casing Purge Volume Calculations

A. Depth to Water = 13.56 ft.	D. Water Column (B-A) = 3.55 ft.	Depth to Water After Sampling = 16.60 ft.
B. Well Total Depth = 17.11 ft.	E. 1 Well Volume (C^2 x 0.0408 x D) = 0.579 gal.	Actual Volume Purged (from below) = 2.85 gal/ml.
C. Well Diameter = 2 in.	F. 3 Well Volumes (3 x E) = 1.74 gal.	(If applicable, see pumping system volume calculation below)

Pump and Flow Cell Volume	V_P = **N/A**	ml	**Pumping System Volume Calculation**
Tubing Inside Diameter	D = **N/A**	in.	Pumping System Volume (Vs)
Tubing Length	L = **N/A**	in.	$V_S = V_P + \pi * D^2 / 4 * L * 16.39$ ml/in³
Conversion from Inches³ to ml	1 in³ = 16.39	ml	_____ Vs = (_____) + (3.1415 * _____ ² / 4) * (_____) * 16.39

Purging Data			Water Quality Parameters (within range for 3 consecutive readings if low-flow sampling)						
Time (24 hr)	**Purge Volume** ☐ gal ☒ ml	**Flow Rate** ☐ gpm ☒ ml/min	**Temp** (°C)	**Specific Conductance** (µS/cm)	**Dissolved Oxygen** (mg/L)	**pH**	**Oxidation Reduction Potential** (mV)	**Turbidity** (NTU)	**Remarks**
			Stabilization(1):	**± 3%**	**± 0.2 mg/L**	**± 0.2**	**± 20 mV**	**<10 NTU**	DTW
910	Initial	~~100~~						Begin pump	13.56
915	600	120	17.82	8.13	1.48	6.71	232	0.0	13.83
920	1200	120	16.95	7.82	0.84	6.80	221	0.0	14.03
925	1800	120	17.15	8.69	0.96	6.82	215	0.0	14.17
930	2300	100	16.93	9.87	0.90	6.82	212	0.0	14.32
935	2800	100	16.90	11.1	0.71	6.90	204	0.0	14.47
940	3300	100	17.78	@ 11.7	0.73	7.06	196	0.0	14.56
945	3800	100	16.43	13.0	0.87	7.03	192	0.0	14.68
950	4300	100	17.08	14.0	1.67	7.10	185	0.0	14.75

Remarks: TOC PID = N/A

Purge pumping system volume before recording parameters on dedicated pumps only.

(1) Based on EPA low-flow sampling guidelines, ASTM D 6771-02, and research validated Best Practices (see SAP for details).

Signature: _____ **Checked By:** _____

Purging/Sampling Date: 8/18/21 **Well Number/ID:** MW-9R

ADDITIONAL FIELD PARAMETER COLLECTION LOG for MICRO-PURGE SAMPLING
(continued from frontside)

Purging Data			Water Quality Parameters (within range for 3 consecutive readings)						
Time (24 hr)	Purge Volume ☐ gal ☑ ml	Flow Rate ☐ gpm ☑ ml/min	Temp (°C)	Specific Conductance (µS/cm) mS/cm	Dissolved Oxygen (mg/L)	pH	Oxidation Reduction Potential (mV)	Turbidity (NTU)	Remarks
			Stabilization(1):	± 3%	± 0.2 mg/L	± 0.2	± 20 mV	<10 NTU	DTW
955	4800	100	17.31	18.2	1.25	7.04	186	0.0	14.84
1000	5300	100	16.80	18.3	1.23	7.07	184	0.0	14.94
1005	5800	100	17.10	17.1	1.06	7.13	180	0.0	15.12
1010	6300	100	17.17	15.9	0.89	7.17	177	0.0	15.27
1015	6800	100	17.31	14.8	0.89	7.20	174	0.0	15.40
1020	7300	100	17.40	14.9	0.71	7.21	173	0.0	15.55
1025	7800	100	17.45	14.9	0.57	7.19	172	0.0	15.74
1030	8300	100	17.52	15.6	0.46	7.16	171	0.0	15.87
1035	8800	100	17.31	16.1	0.39	7.16	170	0.0	1600
1040	9300	100	17.52	16.4	0.36	7.15	168	0.0	16.08
1045	9800	100	17.66	16.7	0.36	7.15	165	0.0	16.18
1050	10300	100	17.69	16.9	0.36	7.16	163	0.0	16.28
1055	10800	100	17.61	17.0	0.39	7.17	160	0.0	16.39
1100	Sampled		MW-9R-081821		✓				
1105									
1110									

Remarks: ★ Sample clear and odorless

(1) Based on EPA low-flow sampling guidelines, ASTM D 6771-02, and research validated Best Practices (see SAP for details).

wood.

MONITORING WELL SAMPLE COLLECTION LOG

Project Name: National Grid – Former MGP Site No. 837012, Albion, New York

Project/Task #: 0078000050.03

Sampled By: AL

Date: 8/18/21

Well Number/ID: MW-10R

Sample ID: MW-10R-081821

Duplicate ID: N/A

Method of Purging: Low-Flow

Method of Sampling: Low-Flow

Intake Depth: 16' bgs

Field Equipment

Equipment	Model	Serial #/Rental ID	Date Received/Serviced	Date Calibrated
Multi-Probe	Horiba U-52	TB9J7L8M	8/17/21	8/18/21
Turbidimeter				

Casing Purge Volume Calculations

A. Depth to Water = 12.77 ft.
B. Well Total Depth = 18.97 ft.
C. Well Diameter = 2 in.
D. Water Column (B-A) = 6.2 ft.
E. 1 Well Volume (C^2 x 0.0408 x D) = 1.02 gal.
F. 3 Well Volumes (3 x E) = 3.06 gal.

Depth to Water After Sampling = 13.80 ft.
Actual Volume Purged (from below) = 3.88 gal/ml.
(If applicable, see pumping system volume calculation below)

Pump and Flow Cell Volume	V_p = N/A	ml	
Tubing Inside Diameter	D = N/A	in.	
Tubing Length	L = N/A	in.	
Conversion from Inches³ to ml	1 in³ = 16.39	ml	

Pumping System Volume Calculation

Pumping System Volume (V_S)

$V_S = V_P + \pi * D^2 / 4 * L * 16.39$ ml/in³

_____ V_S = (_____) + (3.1415 * _____ ² / 4) * (_____) * 16.39

Purging Data			Water Quality Parameters (within range for 3 consecutive readings if low-flow sampling)						
Time (24 hr)	Purge Volume ☐ gal ☑ ml	Flow Rate ☐ gpm ☑ ml/min	Temp (°C)	Specific Conductance (µS/cm)	Dissolved Oxygen (mg/L)	pH	Oxidation Reduction Potential (mV)	Turbidity (NTU)	Remarks
			Stabilization(1):	± 3%	± 0.2 mg/L	± 0.2	± 20 mV	<10 NTU	
1450	Initial			Begin	purge				12.77
1455	875	175	18.32	2.90	7.16	7.22	-96	23.2	13.14
1500	1475	120	18.75	3.73	6.23	7.22	-65	12.1	13.20
1505	2075	120	16.59	4.05	5.81	7.18	-48	5.3	13.27
1510	2675	120	19.57	4.38	5.31	7.19	-44	1.4	13.25
1515	3275	120	19.58	5.06	4.99	7.13	-31	0.0	13.30
1520	3875	120	18.16	4.99	4.68	7.18	-27	0.0	13.37
1525	4475	120	18.23	5.48	4.36	7.17	-22	0.0	13.42
1530	5075	120	17.88	5.63	3.91	7.21	-19	0.0	13.45

Remarks: TOC PID = N/A

Purge pumping system volume before recording parameters on dedicated pumps only.

(1) Based on EPA low-flow sampling guidelines, ASTM D 6771-02, and research validated Best Practices (see SAP for details).

Signature: [signature]

Checked By:

Purging/Sampling Date: 8/18/21 **Well Number/ID:** MW-10R

ADDITIONAL FIELD PARAMETER COLLECTION LOG for MICRO-PURGE SAMPLING (continued from frontside)

Purging Data			Water Quality Parameters (within range for 3 consecutive readings)						
Time (24 hr)	Purge Volume ☐ gal ☑ ml	Flow Rate ☐ gpm ☑ ml/min	Temp (°C)	Specific Conductance (µS/cm)	Dissolved Oxygen (mg/L)	pH	Oxidation Reduction Potential (mV)	Turbidity (NTU)	Remarks
			Stabilization(1):	± 3%	± 0.2 mg/L	± 0.2	± 20 mV	<10 NTU	DTW
1535	5675	120	17.83	5.53	3.76	7.21	-19	0.0	13.49
1540	6275		17.36	5.61	3.50	7.21	-16	0.0	13.56
1545	6875		17.50	5.80	3.20	7.20	-12	0.0	13.60
1550	7475		17.47	6.03	2.90	7.20	-9	0.0	13.65
1555	8075		17.53	6.13	2.66	7.21	-8	0.0	13.70
1600	8675		17.58	6.11	2.41	7.22	-7	0.0	13.74
1605	9275		18.44	6.44	2.05	7.28	-9	0.0	13.81
1610	9875		18.58	6.25	1.87	7.29	-10	0.0	13.80
1615	10,475		18.78	6.33	1.68	7.30	-10	0.0	13.80
1620	11,075		18.20	6.35	1.59	7.31	-11	0.0	13.80
1625	11,675		17.94	6.29	1.48	7.31	-10	0.0	13.80
1630	12,275		17.91	6.25	1.37	7.31	-8	0.0	13.80
1635	12,875		18.68	6.23	1.18	7.31	-6	0.0	13.80
1640	13,475		18.82	6.19	1.07	7.30	-4	0.0	13.80
1645	14,075		18.80	5.88	1.02	7.30	-4	0.0	13.80
1650	14,675		16.64	5.95	0.94	7.30	-1	0.0	13.80
1655			Sampled MW-10R-081821						

Remarks:
- Sample has slight odor, clear
- Sampled at a max purge time of 2 hours.

(1) Based on EPA low-flow sampling guidelines, ASTM D 6771-02, and research validated Best Practices (see SAP for details).

APPENDIX B

Analytical Laboratory Report

eurofins | Environment Testing America

ANALYTICAL REPORT

Eurofins TestAmerica, Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Tel: (716)691-2600

Laboratory Job ID: 480-188550-1
Client Project/Site: Albion, NY Groundwater Project

For:
Wood E&I Solutions Inc
180 Grand Avenue
Suite 1100
Oakland, California 94612

Attn: Mr. Alex Rosenthal

Authorized for release by:
9/3/2021 12:04:54 PM
Rebecca Jones, Project Management Assistant I
Rebecca.Jones@Eurofinset.com

Designee for

Brian Fischer, Manager of Project Management
(716)504-9835
Brian.Fischer@Eurofinset.com

Table of Contents

Definitions/Glossary

Client: Wood E&I Solutions Inc
Project/Site: Albion, NY Groundwater Project

Job ID: 480-188550-1

Qualifiers

GC/MS VOA

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

GC/MS Semi VOA

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

General Chemistry

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CFU	Colony Forming Unit
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MCL	EPA recommended "Maximum Contaminant Level"
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
NEG	Negative / Absent
POS	Positive / Present
PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

Case Narrative

Client: Wood E&I Solutions Inc
Project/Site: Albion, NY Groundwater Project

Job ID: 480-188550-1

Job ID: 480-188550-1

Laboratory: Eurofins TestAmerica, Buffalo

Narrative

Job Narrative
480-188550-1

Comments
No additional comments.

Receipt
The samples were received on 8/20/2021 10:00 AM. Unless otherwise noted below, the samples arrived in good condition, and where required, properly preserved and on ice. The temperatures of the 2 coolers at receipt time were 2.9º C and 3.2º C.

GC/MS VOA
Method 8260C: The following volatiles samples were diluted due to foaming at the time of purging during the original sample analysis: MW-9R-081821 (480-188550-2), MW-5-081821 (480-188550-4) and MW-10R-081821 (480-188550-7). Elevated reporting limits (RLs) are provided.

Method 8260C: The following sample was diluted to bring the concentration of target analytes within the calibration range: MW-8R-081821 (480-188550-6). Elevated reporting limits (RLs) are provided.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

GC/MS Semi VOA
Method 8270D: The following sample was diluted to bring the concentration of target analytes within the calibration range: MW-8R-081821 (480-188550-6). Elevated reporting limits (RLs) are provided.

Method 8270D: The following sample required a dilution due to the abundance of target analytes: MW-8R-081821 (480-188550-6). Because of this dilution, the surrogate spike concentration in the sample was reduced to a level where the recovery calculation does not provide useful information.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

General Chemistry
No analytical or quality issues were noted, other than those described in the Definitions/Glossary page.

Organic Prep
Method 3510C: Insufficient sample volume was available to perform a matrix spike/matrix spike duplicate/sample duplicate (MS/MSD/DUP) associated with preparation batch 480-593697.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

Detection Summary

Client: Wood E&I Solutions Inc
Project/Site: Albion, NY Groundwater Project

Job ID: 480-188550-1

Client Sample ID: MW-1-081821 — Lab Sample ID: 480-188550-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Cyanide, Total	0.10		0.010	0.0060	mg/L	1		4500 CN E-2011	Total/NA

Client Sample ID: MW-9R-081821 — Lab Sample ID: 480-188550-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Cyanide, Total	0.070		0.010	0.0060	mg/L	1		4500 CN E-2011	Total/NA

Client Sample ID: MW-6-081821 — Lab Sample ID: 480-188550-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Cyanide, Total	0.051		0.010	0.0060	mg/L	1		4500 CN E-2011	Total/NA

Client Sample ID: MW-5-081821 — Lab Sample ID: 480-188550-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Benzene	50		2.0	0.82	ug/L	2		8260C	Total/NA
Toluene	4.1		2.0	1.0	ug/L	2		8260C	Total/NA
Ethylbenzene	10		2.0	1.5	ug/L	2		8260C	Total/NA
m-Xylene & p-Xylene	2.6	J	4.0	1.3	ug/L	2		8260C	Total/NA
o-Xylene	3.3		2.0	1.5	ug/L	2		8260C	Total/NA
Xylenes, Total	5.9		4.0	1.3	ug/L	2		8260C	Total/NA
Total BTEX	70		4.0	2.0	ug/L	2		8260C	Total/NA
Acenaphthene	15		5.0	0.41	ug/L	1		8270D	Total/NA
Acenaphthylene	8.9		5.0	0.38	ug/L	1		8270D	Total/NA
Anthracene	3.9	J	5.0	0.28	ug/L	1		8270D	Total/NA
Fluoranthene	4.8	J	5.0	0.40	ug/L	1		8270D	Total/NA
Fluorene	15		5.0	0.36	ug/L	1		8270D	Total/NA
Naphthalene	5.6		5.0	0.76	ug/L	1		8270D	Total/NA
Phenanthrene	10		5.0	0.44	ug/L	1		8270D	Total/NA
Pyrene	2.7	J	5.0	0.34	ug/L	1		8270D	Total/NA
Cyanide, Total	0.21		0.010	0.0060	mg/L	1		4500 CN E-2011	Total/NA

Client Sample ID: MW-50-081821 — Lab Sample ID: 480-188550-5

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Benzene	52		1.0	0.41	ug/L	1		8260C	Total/NA
Toluene	4.0		1.0	0.51	ug/L	1		8260C	Total/NA
Ethylbenzene	10		1.0	0.74	ug/L	1		8260C	Total/NA
m-Xylene & p-Xylene	2.4		2.0	0.66	ug/L	1		8260C	Total/NA
o-Xylene	3.2		1.0	0.76	ug/L	1		8260C	Total/NA
Xylenes, Total	5.6		2.0	0.66	ug/L	1		8260C	Total/NA
Total BTEX	72		2.0	1.0	ug/L	1		8260C	Total/NA
Acenaphthene	18		5.0	0.41	ug/L	1		8270D	Total/NA
Acenaphthylene	10		5.0	0.38	ug/L	1		8270D	Total/NA
Anthracene	3.9	J	5.0	0.28	ug/L	1		8270D	Total/NA
Fluoranthene	5.3		5.0	0.40	ug/L	1		8270D	Total/NA
Fluorene	17		5.0	0.36	ug/L	1		8270D	Total/NA
Naphthalene	5.3		5.0	0.76	ug/L	1		8270D	Total/NA
Phenanthrene	7.7		5.0	0.44	ug/L	1		8270D	Total/NA
Pyrene	3.0	J	5.0	0.34	ug/L	1		8270D	Total/NA
Cyanide, Total	0.22		0.010	0.0060	mg/L	1		4500 CN E-2011	Total/NA

This Detection Summary does not include radiochemical test results.

Detection Summary

Client: Wood E&I Solutions Inc
Project/Site: Albion, NY Groundwater Project

Job ID: 480-188550-1

Client Sample ID: MW-8R-081821 — Lab Sample ID: 480-188550-6

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Benzene	4700		50	21	ug/L	50		8260C	Total/NA
Toluene	210		50	26	ug/L	50		8260C	Total/NA
Ethylbenzene	380		50	37	ug/L	50		8260C	Total/NA
m-Xylene & p-Xylene	1300		100	33	ug/L	50		8260C	Total/NA
o-Xylene	510		50	38	ug/L	50		8260C	Total/NA
Xylenes, Total	1800		100	33	ug/L	50		8260C	Total/NA
Total BTEX	7100		100	50	ug/L	50		8260C	Total/NA
Acenaphthene	64	J	250	21	ug/L	50		8270D	Total/NA
Acenaphthylene	23	J	250	19	ug/L	50		8270D	Total/NA
Fluorene	42	J	250	18	ug/L	50		8270D	Total/NA
Naphthalene	1900		250	38	ug/L	50		8270D	Total/NA
Phenanthrene	32	J	250	22	ug/L	50		8270D	Total/NA
Cyanide, Total	0.19		0.010	0.0060	mg/L	1		4500 CN E-2011	Total/NA

Client Sample ID: MW-10R-081821 — Lab Sample ID: 480-188550-7

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Benzene	20		2.0	0.82	ug/L	2		8260C	Total/NA
Total BTEX	20		4.0	2.0	ug/L	2		8260C	Total/NA
Acenaphthene	2.1	J	5.0	0.41	ug/L	1		8270D	Total/NA
Naphthalene	8.9		5.0	0.76	ug/L	1		8270D	Total/NA
Cyanide, Total	0.027		0.010	0.0060	mg/L	1		4500 CN E-2011	Total/NA

Client Sample ID: EB-01-081821 — Lab Sample ID: 480-188550-8

No Detections.

Client Sample ID: TRIP BLANK — Lab Sample ID: 480-188550-9

No Detections.

This Detection Summary does not include radiochemical test results.

Client Sample ID: MW-1-081821
Lab Sample ID: 480-188550-1

Date Collected: 08/18/21 08:55
Matrix: Water
Date Received: 08/20/21 10:00

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	ND		1.0	0.41	ug/L			08/24/21 05:03	1
Toluene	ND		1.0	0.51	ug/L			08/24/21 05:03	1
Ethylbenzene	ND		1.0	0.74	ug/L			08/24/21 05:03	1
m-Xylene & p-Xylene	ND		2.0	0.66	ug/L			08/24/21 05:03	1
o-Xylene	ND		1.0	0.76	ug/L			08/24/21 05:03	1
Xylenes, Total	ND		2.0	0.66	ug/L			08/24/21 05:03	1
Total BTEX	ND		2.0	1.0	ug/L			08/24/21 05:03	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Toluene-d8 (Surr)	*91*		*80 - 120*		*08/24/21 05:03*	*1*
1,2-Dichloroethane-d4 (Surr)	*96*		*77 - 120*		*08/24/21 05:03*	*1*
4-Bromofluorobenzene (Surr)	*93*		*73 - 120*		*08/24/21 05:03*	*1*
Dibromofluoromethane (Surr)	*92*		*75 - 123*		*08/24/21 05:03*	*1*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acenaphthene	ND		5.0	0.41	ug/L		08/23/21 09:13	08/24/21 22:20	1
Acenaphthylene	ND		5.0	0.38	ug/L		08/23/21 09:13	08/24/21 22:20	1
Anthracene	ND		5.0	0.28	ug/L		08/23/21 09:13	08/24/21 22:20	1
Benzo[a]anthracene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/24/21 22:20	1
Benzo[a]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/24/21 22:20	1
Benzo[b]fluoranthene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/24/21 22:20	1
Benzo[g,h,i]perylene	ND		5.0	0.35	ug/L		08/23/21 09:13	08/24/21 22:20	1
Benzo[k]fluoranthene	ND		5.0	0.73	ug/L		08/23/21 09:13	08/24/21 22:20	1
Chrysene	ND		5.0	0.33	ug/L		08/23/21 09:13	08/24/21 22:20	1
Dibenz(a,h)anthracene	ND		5.0	0.42	ug/L		08/23/21 09:13	08/24/21 22:20	1
Fluoranthene	ND		5.0	0.40	ug/L		08/23/21 09:13	08/24/21 22:20	1
Fluorene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/24/21 22:20	1
Indeno[1,2,3-cd]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/24/21 22:20	1
Naphthalene	ND		5.0	0.76	ug/L		08/23/21 09:13	08/24/21 22:20	1
Phenanthrene	ND		5.0	0.44	ug/L		08/23/21 09:13	08/24/21 22:20	1
Pyrene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/24/21 22:20	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*112*		*48 - 120*	*08/23/21 09:13*	*08/24/21 22:20*	*1*
Nitrobenzene-d5 (Surr)	*105*		*46 - 120*	*08/23/21 09:13*	*08/24/21 22:20*	*1*
p-Terphenyl-d14 (Surr)	*96*		*60 - 148*	*08/23/21 09:13*	*08/24/21 22:20*	*1*

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	**0.10**		0.010	0.0060	mg/L		08/27/21 18:24	08/27/21 19:58	1

Client Sample ID: MW-9R-081821
Lab Sample ID: 480-188550-2

Date Collected: 08/18/21 11:00
Matrix: Water
Date Received: 08/20/21 10:00

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	ND		4.0	1.6	ug/L			08/24/21 05:26	4
Toluene	ND		4.0	2.0	ug/L			08/24/21 05:26	4
Ethylbenzene	ND		4.0	3.0	ug/L			08/24/21 05:26	4

Client Sample ID: MW-9R-081821
Lab Sample ID: 480-188550-2
Date Collected: 08/18/21 11:00
Matrix: Water
Date Received: 08/20/21 10:00

Method: 8260C - Volatile Organic Compounds by GC/MS (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
m-Xylene & p-Xylene	ND		8.0	2.6	ug/L			08/24/21 05:26	4
o-Xylene	ND		4.0	3.0	ug/L			08/24/21 05:26	4
Xylenes, Total	ND		8.0	2.6	ug/L			08/24/21 05:26	4
Total BTEX	ND		8.0	4.0	ug/L			08/24/21 05:26	4

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Toluene-d8 (Surr)	*91*		*80 - 120*		*08/24/21 05:26*	*4*
1,2-Dichloroethane-d4 (Surr)	*92*		*77 - 120*		*08/24/21 05:26*	*4*
4-Bromofluorobenzene (Surr)	*90*		*73 - 120*		*08/24/21 05:26*	*4*
Dibromofluoromethane (Surr)	*94*		*75 - 123*		*08/24/21 05:26*	*4*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acenaphthene	ND		5.0	0.41	ug/L		08/23/21 09:13	08/24/21 22:46	1
Acenaphthylene	ND		5.0	0.38	ug/L		08/23/21 09:13	08/24/21 22:46	1
Anthracene	ND		5.0	0.28	ug/L		08/23/21 09:13	08/24/21 22:46	1
Benzo[a]anthracene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/24/21 22:46	1
Benzo[a]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/24/21 22:46	1
Benzo[b]fluoranthene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/24/21 22:46	1
Benzo[g,h,i]perylene	ND		5.0	0.35	ug/L		08/23/21 09:13	08/24/21 22:46	1
Benzo[k]fluoranthene	ND		5.0	0.73	ug/L		08/23/21 09:13	08/24/21 22:46	1
Chrysene	ND		5.0	0.33	ug/L		08/23/21 09:13	08/24/21 22:46	1
Dibenz(a,h)anthracene	ND		5.0	0.42	ug/L		08/23/21 09:13	08/24/21 22:46	1
Fluoranthene	ND		5.0	0.40	ug/L		08/23/21 09:13	08/24/21 22:46	1
Fluorene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/24/21 22:46	1
Indeno[1,2,3-cd]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/24/21 22:46	1
Naphthalene	ND		5.0	0.76	ug/L		08/23/21 09:13	08/24/21 22:46	1
Phenanthrene	ND		5.0	0.44	ug/L		08/23/21 09:13	08/24/21 22:46	1
Pyrene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/24/21 22:46	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*89*		*48 - 120*	*08/23/21 09:13*	*08/24/21 22:46*	*1*
Nitrobenzene-d5 (Surr)	*86*		*46 - 120*	*08/23/21 09:13*	*08/24/21 22:46*	*1*
p-Terphenyl-d14 (Surr)	*71*		*60 - 148*	*08/23/21 09:13*	*08/24/21 22:46*	*1*

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	**0.070**		0.010	0.0060	mg/L		08/27/21 18:24	08/27/21 20:00	1

Client Sample ID: MW-6-081821
Lab Sample ID: 480-188550-3
Date Collected: 08/18/21 11:55
Matrix: Water
Date Received: 08/20/21 10:00

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	ND		1.0	0.41	ug/L			08/24/21 05:49	1
Toluene	ND		1.0	0.51	ug/L			08/24/21 05:49	1
Ethylbenzene	ND		1.0	0.74	ug/L			08/24/21 05:49	1
m-Xylene & p-Xylene	ND		2.0	0.66	ug/L			08/24/21 05:49	1
o-Xylene	ND		1.0	0.76	ug/L			08/24/21 05:49	1
Xylenes, Total	ND		2.0	0.66	ug/L			08/24/21 05:49	1

Client Sample ID: MW-6-081821
Lab Sample ID: 480-188550-3
Date Collected: 08/18/21 11:55
Matrix: Water
Date Received: 08/20/21 10:00

Method: 8260C - Volatile Organic Compounds by GC/MS (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	ND		2.0	1.0	ug/L			08/24/21 05:49	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Toluene-d8 (Surr)	*91*		*80 - 120*		*08/24/21 05:49*	*1*
1,2-Dichloroethane-d4 (Surr)	*99*		*77 - 120*		*08/24/21 05:49*	*1*
4-Bromofluorobenzene (Surr)	*92*		*73 - 120*		*08/24/21 05:49*	*1*
Dibromofluoromethane (Surr)	*100*		*75 - 123*		*08/24/21 05:49*	*1*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acenaphthene	ND		5.0	0.41	ug/L		08/23/21 09:13	08/24/21 23:12	1
Acenaphthylene	ND		5.0	0.38	ug/L		08/23/21 09:13	08/24/21 23:12	1
Anthracene	ND		5.0	0.28	ug/L		08/23/21 09:13	08/24/21 23:12	1
Benzo[a]anthracene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/24/21 23:12	1
Benzo[a]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/24/21 23:12	1
Benzo[b]fluoranthene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/24/21 23:12	1
Benzo[g,h,i]perylene	ND		5.0	0.35	ug/L		08/23/21 09:13	08/24/21 23:12	1
Benzo[k]fluoranthene	ND		5.0	0.73	ug/L		08/23/21 09:13	08/24/21 23:12	1
Chrysene	ND		5.0	0.33	ug/L		08/23/21 09:13	08/24/21 23:12	1
Dibenz(a,h)anthracene	ND		5.0	0.42	ug/L		08/23/21 09:13	08/24/21 23:12	1
Fluoranthene	ND		5.0	0.40	ug/L		08/23/21 09:13	08/24/21 23:12	1
Fluorene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/24/21 23:12	1
Indeno[1,2,3-cd]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/24/21 23:12	1
Naphthalene	ND		5.0	0.76	ug/L		08/23/21 09:13	08/24/21 23:12	1
Phenanthrene	ND		5.0	0.44	ug/L		08/23/21 09:13	08/24/21 23:12	1
Pyrene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/24/21 23:12	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*94*		*48 - 120*	*08/23/21 09:13*	*08/24/21 23:12*	*1*
Nitrobenzene-d5 (Surr)	*90*		*46 - 120*	*08/23/21 09:13*	*08/24/21 23:12*	*1*
p-Terphenyl-d14 (Surr)	*72*		*60 - 148*	*08/23/21 09:13*	*08/24/21 23:12*	*1*

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	**0.051**		0.010	0.0060	mg/L		08/27/21 18:24	08/27/21 20:02	1

Client Sample ID: MW-5-081821
Lab Sample ID: 480-188550-4
Date Collected: 08/18/21 13:00
Matrix: Water
Date Received: 08/20/21 10:00

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	**50**		2.0	0.82	ug/L			08/24/21 06:13	2
Toluene	**4.1**		2.0	1.0	ug/L			08/24/21 06:13	2
Ethylbenzene	**10**		2.0	1.5	ug/L			08/24/21 06:13	2
m-Xylene & p-Xylene	**2.6**	**J**	4.0	1.3	ug/L			08/24/21 06:13	2
o-Xylene	**3.3**		2.0	1.5	ug/L			08/24/21 06:13	2
Xylenes, Total	**5.9**		4.0	1.3	ug/L			08/24/21 06:13	2
Total BTEX	**70**		4.0	2.0	ug/L			08/24/21 06:13	2

Client Sample ID: MW-5-081821

Date Collected: 08/18/21 13:00
Date Received: 08/20/21 10:00

Lab Sample ID: 480-188550-4
Matrix: Water

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Toluene-d8 (Surr)	*92*		*80 - 120*		*08/24/21 06:13*	*2*
1,2-Dichloroethane-d4 (Surr)	*94*		*77 - 120*		*08/24/21 06:13*	*2*
4-Bromofluorobenzene (Surr)	*92*		*73 - 120*		*08/24/21 06:13*	*2*
Dibromofluoromethane (Surr)	*90*		*75 - 123*		*08/24/21 06:13*	*2*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acenaphthene	**15**		5.0	0.41	ug/L		08/23/21 09:13	08/24/21 23:38	1
Acenaphthylene	**8.9**		5.0	0.38	ug/L		08/23/21 09:13	08/24/21 23:38	1
Anthracene	**3.9**	**J**	5.0	0.28	ug/L		08/23/21 09:13	08/24/21 23:38	1
Benzo[a]anthracene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/24/21 23:38	1
Benzo[a]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/24/21 23:38	1
Benzo[b]fluoranthene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/24/21 23:38	1
Benzo[g,h,i]perylene	ND		5.0	0.35	ug/L		08/23/21 09:13	08/24/21 23:38	1
Benzo[k]fluoranthene	ND		5.0	0.73	ug/L		08/23/21 09:13	08/24/21 23:38	1
Chrysene	ND		5.0	0.33	ug/L		08/23/21 09:13	08/24/21 23:38	1
Dibenz(a,h)anthracene	ND		5.0	0.42	ug/L		08/23/21 09:13	08/24/21 23:38	1
Fluoranthene	**4.8**	**J**	5.0	0.40	ug/L		08/23/21 09:13	08/24/21 23:38	1
Fluorene	**15**		5.0	0.36	ug/L		08/23/21 09:13	08/24/21 23:38	1
Indeno[1,2,3-cd]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/24/21 23:38	1
Naphthalene	**5.6**		5.0	0.76	ug/L		08/23/21 09:13	08/24/21 23:38	1
Phenanthrene	**10**		5.0	0.44	ug/L		08/23/21 09:13	08/24/21 23:38	1
Pyrene	**2.7**	**J**	5.0	0.34	ug/L		08/23/21 09:13	08/24/21 23:38	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
2-Fluorobiphenyl	*91*		*48 - 120*	*08/23/21 09:13*	*08/24/21 23:38*	*1*
Nitrobenzene-d5 (Surr)	*89*		*46 - 120*	*08/23/21 09:13*	*08/24/21 23:38*	*1*
p-Terphenyl-d14 (Surr)	*84*		*60 - 148*	*08/23/21 09:13*	*08/24/21 23:38*	*1*

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	**0.21**		0.010	0.0060	mg/L		08/27/21 18:24	08/27/21 20:04	1

Client Sample ID: MW-50-081821

Date Collected: 08/18/21 12:00
Date Received: 08/20/21 10:00

Lab Sample ID: 480-188550-5
Matrix: Water

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	**52**		1.0	0.41	ug/L			08/24/21 06:36	1
Toluene	**4.0**		1.0	0.51	ug/L			08/24/21 06:36	1
Ethylbenzene	**10**		1.0	0.74	ug/L			08/24/21 06:36	1
m-Xylene & p-Xylene	**2.4**		2.0	0.66	ug/L			08/24/21 06:36	1
o-Xylene	**3.2**		1.0	0.76	ug/L			08/24/21 06:36	1
Xylenes, Total	**5.6**		2.0	0.66	ug/L			08/24/21 06:36	1
Total BTEX	**72**		2.0	1.0	ug/L			08/24/21 06:36	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Toluene-d8 (Surr)	*91*		*80 - 120*		*08/24/21 06:36*	*1*
1,2-Dichloroethane-d4 (Surr)	*96*		*77 - 120*		*08/24/21 06:36*	*1*
4-Bromofluorobenzene (Surr)	*92*		*73 - 120*		*08/24/21 06:36*	*1*

Client Sample ID: MW-50-081821

Lab Sample ID: 480-188550-5

Date Collected: 08/18/21 12:00
Date Received: 08/20/21 10:00

Matrix: Water

Method: 8260C - Volatile Organic Compounds by GC/MS (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Dibromofluoromethane (Surr)	*94*		*75 - 123*		*08/24/21 06:36*	*1*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acenaphthene	**18**		5.0	0.41	ug/L		08/23/21 09:13	08/25/21 00:05	1
Acenaphthylene	**10**		5.0	0.38	ug/L		08/23/21 09:13	08/25/21 00:05	1
Anthracene	**3.9**	**J**	5.0	0.28	ug/L		08/23/21 09:13	08/25/21 00:05	1
Benzo[a]anthracene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/25/21 00:05	1
Benzo[a]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/25/21 00:05	1
Benzo[b]fluoranthene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/25/21 00:05	1
Benzo[g,h,i]perylene	ND		5.0	0.35	ug/L		08/23/21 09:13	08/25/21 00:05	1
Benzo[k]fluoranthene	ND		5.0	0.73	ug/L		08/23/21 09:13	08/25/21 00:05	1
Chrysene	ND		5.0	0.33	ug/L		08/23/21 09:13	08/25/21 00:05	1
Dibenz(a,h)anthracene	ND		5.0	0.42	ug/L		08/23/21 09:13	08/25/21 00:05	1
Fluoranthene	**5.3**		5.0	0.40	ug/L		08/23/21 09:13	08/25/21 00:05	1
Fluorene	**17**		5.0	0.36	ug/L		08/23/21 09:13	08/25/21 00:05	1
Indeno[1,2,3-cd]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/25/21 00:05	1
Naphthalene	**5.3**		5.0	0.76	ug/L		08/23/21 09:13	08/25/21 00:05	1
Phenanthrene	**7.7**		5.0	0.44	ug/L		08/23/21 09:13	08/25/21 00:05	1
Pyrene	**3.0**	**J**	5.0	0.34	ug/L		08/23/21 09:13	08/25/21 00:05	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
2-Fluorobiphenyl	*109*		*48 - 120*	*08/23/21 09:13*	*08/25/21 00:05*	*1*
Nitrobenzene-d5 (Surr)	*105*		*46 - 120*	*08/23/21 09:13*	*08/25/21 00:05*	*1*
p-Terphenyl-d14 (Surr)	*97*		*60 - 148*	*08/23/21 09:13*	*08/25/21 00:05*	*1*

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	**0.22**		0.010	0.0060	mg/L		08/27/21 18:24	08/27/21 20:06	1

Client Sample ID: MW-8R-081821

Lab Sample ID: 480-188550-6

Date Collected: 08/18/21 14:30
Date Received: 08/20/21 10:00

Matrix: Water

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	**4700**		50	21	ug/L			08/24/21 06:59	50
Toluene	**210**		50	26	ug/L			08/24/21 06:59	50
Ethylbenzene	**380**		50	37	ug/L			08/24/21 06:59	50
m-Xylene & p-Xylene	**1300**		100	33	ug/L			08/24/21 06:59	50
o-Xylene	**510**		50	38	ug/L			08/24/21 06:59	50
Xylenes, Total	**1800**		100	33	ug/L			08/24/21 06:59	50
Total BTEX	**7100**		100	50	ug/L			08/24/21 06:59	50

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Toluene-d8 (Surr)	*92*		*80 - 120*		*08/24/21 06:59*	*50*
1,2-Dichloroethane-d4 (Surr)	*95*		*77 - 120*		*08/24/21 06:59*	*50*
4-Bromofluorobenzene (Surr)	*95*		*73 - 120*		*08/24/21 06:59*	*50*
Dibromofluoromethane (Surr)	*96*		*75 - 123*		*08/24/21 06:59*	*50*

Client Sample ID: MW-8R-081821
Lab Sample ID: 480-188550-6

Date Collected: 08/18/21 14:30
Matrix: Water
Date Received: 08/20/21 10:00

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acenaphthene	**64**	**J**	250	21	ug/L		08/23/21 09:13	08/25/21 16:08	50
Acenaphthylene	**23**	**J**	250	19	ug/L		08/23/21 09:13	08/25/21 16:08	50
Anthracene	ND		250	14	ug/L		08/23/21 09:13	08/25/21 16:08	50
Benzo[a]anthracene	ND		250	18	ug/L		08/23/21 09:13	08/25/21 16:08	50
Benzo[a]pyrene	ND		250	24	ug/L		08/23/21 09:13	08/25/21 16:08	50
Benzo[b]fluoranthene	ND		250	17	ug/L		08/23/21 09:13	08/25/21 16:08	50
Benzo[g,h,i]perylene	ND		250	18	ug/L		08/23/21 09:13	08/25/21 16:08	50
Benzo[k]fluoranthene	ND		250	37	ug/L		08/23/21 09:13	08/25/21 16:08	50
Chrysene	ND		250	17	ug/L		08/23/21 09:13	08/25/21 16:08	50
Dibenz(a,h)anthracene	ND		250	21	ug/L		08/23/21 09:13	08/25/21 16:08	50
Fluoranthene	ND		250	20	ug/L		08/23/21 09:13	08/25/21 16:08	50
Fluorene	**42**	**J**	250	18	ug/L		08/23/21 09:13	08/25/21 16:08	50
Indeno[1,2,3-cd]pyrene	ND		250	24	ug/L		08/23/21 09:13	08/25/21 16:08	50
Naphthalene	**1900**		250	38	ug/L		08/23/21 09:13	08/25/21 16:08	50
Phenanthrene	**32**	**J**	250	22	ug/L		08/23/21 09:13	08/25/21 16:08	50
Pyrene	ND		250	17	ug/L		08/23/21 09:13	08/25/21 16:08	50

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*111*		*48 - 120*	*08/23/21 09:13*	*08/25/21 16:08*	*50*
Nitrobenzene-d5 (Surr)	*113*		*46 - 120*	*08/23/21 09:13*	*08/25/21 16:08*	*50*
p-Terphenyl-d14 (Surr)	*84*		*60 - 148*	*08/23/21 09:13*	*08/25/21 16:08*	*50*

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	**0.19**		0.010	0.0060	mg/L		08/27/21 18:24	08/27/21 20:07	1

Client Sample ID: MW-10R-081821
Lab Sample ID: 480-188550-7

Date Collected: 08/18/21 16:55
Matrix: Water
Date Received: 08/20/21 10:00

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	**20**		2.0	0.82	ug/L			08/24/21 07:22	2
Toluene	ND		2.0	1.0	ug/L			08/24/21 07:22	2
Ethylbenzene	ND		2.0	1.5	ug/L			08/24/21 07:22	2
m-Xylene & p-Xylene	ND		4.0	1.3	ug/L			08/24/21 07:22	2
o-Xylene	ND		2.0	1.5	ug/L			08/24/21 07:22	2
Xylenes, Total	ND		4.0	1.3	ug/L			08/24/21 07:22	2
Total BTEX	**20**		4.0	2.0	ug/L			08/24/21 07:22	2

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Toluene-d8 (Surr)	*91*		*80 - 120*		*08/24/21 07:22*	*2*
1,2-Dichloroethane-d4 (Surr)	*95*		*77 - 120*		*08/24/21 07:22*	*2*
4-Bromofluorobenzene (Surr)	*91*		*73 - 120*		*08/24/21 07:22*	*2*
Dibromofluoromethane (Surr)	*91*		*75 - 123*		*08/24/21 07:22*	*2*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acenaphthene	**2.1**	**J**	5.0	0.41	ug/L		08/23/21 09:13	08/25/21 00:59	1
Acenaphthylene	ND		5.0	0.38	ug/L		08/23/21 09:13	08/25/21 00:59	1
Anthracene	ND		5.0	0.28	ug/L		08/23/21 09:13	08/25/21 00:59	1

Client Sample ID: MW-10R-081821
Lab Sample ID: 480-188550-7

Date Collected: 08/18/21 16:55
Matrix: Water
Date Received: 08/20/21 10:00

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzo[a]anthracene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/25/21 00:59	1
Benzo[a]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/25/21 00:59	1
Benzo[b]fluoranthene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/25/21 00:59	1
Benzo[g,h,i]perylene	ND		5.0	0.35	ug/L		08/23/21 09:13	08/25/21 00:59	1
Benzo[k]fluoranthene	ND		5.0	0.73	ug/L		08/23/21 09:13	08/25/21 00:59	1
Chrysene	ND		5.0	0.33	ug/L		08/23/21 09:13	08/25/21 00:59	1
Dibenz(a,h)anthracene	ND		5.0	0.42	ug/L		08/23/21 09:13	08/25/21 00:59	1
Fluoranthene	ND		5.0	0.40	ug/L		08/23/21 09:13	08/25/21 00:59	1
Fluorene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/25/21 00:59	1
Indeno[1,2,3-cd]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/25/21 00:59	1
Naphthalene	**8.9**		5.0	0.76	ug/L		08/23/21 09:13	08/25/21 00:59	1
Phenanthrene	ND		5.0	0.44	ug/L		08/23/21 09:13	08/25/21 00:59	1
Pyrene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/25/21 00:59	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*95*		*48 - 120*	*08/23/21 09:13*	*08/25/21 00:59*	*1*
Nitrobenzene-d5 (Surr)	*93*		*46 - 120*	*08/23/21 09:13*	*08/25/21 00:59*	*1*
p-Terphenyl-d14 (Surr)	*70*		*60 - 148*	*08/23/21 09:13*	*08/25/21 00:59*	*1*

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	**0.027**		0.010	0.0060	mg/L		08/27/21 18:24	08/27/21 20:09	1

Client Sample ID: EB-01-081821
Lab Sample ID: 480-188550-8

Date Collected: 08/18/21 17:10
Matrix: Water
Date Received: 08/20/21 10:00

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	ND		1.0	0.41	ug/L			08/24/21 07:45	1
Toluene	ND		1.0	0.51	ug/L			08/24/21 07:45	1
Ethylbenzene	ND		1.0	0.74	ug/L			08/24/21 07:45	1
m-Xylene & p-Xylene	ND		2.0	0.66	ug/L			08/24/21 07:45	1
o-Xylene	ND		1.0	0.76	ug/L			08/24/21 07:45	1
Xylenes, Total	ND		2.0	0.66	ug/L			08/24/21 07:45	1
Total BTEX	ND		2.0	1.0	ug/L			08/24/21 07:45	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Toluene-d8 (Surr)	*93*		*80 - 120*		*08/24/21 07:45*	*1*
1,2-Dichloroethane-d4 (Surr)	*92*		*77 - 120*		*08/24/21 07:45*	*1*
4-Bromofluorobenzene (Surr)	*97*		*73 - 120*		*08/24/21 07:45*	*1*
Dibromofluoromethane (Surr)	*91*		*75 - 123*		*08/24/21 07:45*	*1*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acenaphthene	ND		5.0	0.41	ug/L		08/23/21 09:13	08/25/21 01:25	1
Acenaphthylene	ND		5.0	0.38	ug/L		08/23/21 09:13	08/25/21 01:25	1
Anthracene	ND		5.0	0.28	ug/L		08/23/21 09:13	08/25/21 01:25	1
Benzo[a]anthracene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/25/21 01:25	1
Benzo[a]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/25/21 01:25	1
Benzo[b]fluoranthene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/25/21 01:25	1

Client: Wood E&I Solutions Inc
Project/Site: Albion, NY Groundwater Project

Job ID: 480-188550-1

Client Sample ID: EB-01-081821

Lab Sample ID: 480-188550-8
Matrix: Water
Date Collected: 08/18/21 17:10
Date Received: 08/20/21 10:00

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzo[g,h,i]perylene	ND		5.0	0.35	ug/L		08/23/21 09:13	08/25/21 01:25	1
Benzo[k]fluoranthene	ND		5.0	0.73	ug/L		08/23/21 09:13	08/25/21 01:25	1
Chrysene	ND		5.0	0.33	ug/L		08/23/21 09:13	08/25/21 01:25	1
Dibenz(a,h)anthracene	ND		5.0	0.42	ug/L		08/23/21 09:13	08/25/21 01:25	1
Fluoranthene	ND		5.0	0.40	ug/L		08/23/21 09:13	08/25/21 01:25	1
Fluorene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/25/21 01:25	1
Indeno[1,2,3-cd]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/25/21 01:25	1
Naphthalene	ND		5.0	0.76	ug/L		08/23/21 09:13	08/25/21 01:25	1
Phenanthrene	ND		5.0	0.44	ug/L		08/23/21 09:13	08/25/21 01:25	1
Pyrene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/25/21 01:25	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*107*		*48 - 120*	*08/23/21 09:13*	*08/25/21 01:25*	*1*
Nitrobenzene-d5 (Surr)	*100*		*46 - 120*	*08/23/21 09:13*	*08/25/21 01:25*	*1*
p-Terphenyl-d14 (Surr)	*97*		*60 - 148*	*08/23/21 09:13*	*08/25/21 01:25*	*1*

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.010	0.0060	mg/L		09/01/21 16:19	09/01/21 16:59	1

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-188550-9
Matrix: Water
Date Collected: 08/18/21 07:00
Date Received: 08/20/21 10:00

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	ND		1.0	0.41	ug/L			08/24/21 08:08	1
Toluene	ND		1.0	0.51	ug/L			08/24/21 08:08	1
Ethylbenzene	ND		1.0	0.74	ug/L			08/24/21 08:08	1
m-Xylene & p-Xylene	ND		2.0	0.66	ug/L			08/24/21 08:08	1
o-Xylene	ND		1.0	0.76	ug/L			08/24/21 08:08	1
Xylenes, Total	ND		2.0	0.66	ug/L			08/24/21 08:08	1
Total BTEX	ND		2.0	1.0	ug/L			08/24/21 08:08	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Toluene-d8 (Surr)	*93*		*80 - 120*		*08/24/21 08:08*	*1*
1,2-Dichloroethane-d4 (Surr)	*96*		*77 - 120*		*08/24/21 08:08*	*1*
4-Bromofluorobenzene (Surr)	*93*		*73 - 120*		*08/24/21 08:08*	*1*
Dibromofluoromethane (Surr)	*93*		*75 - 123*		*08/24/21 08:08*	*1*

Surrogate Summary

Client: Wood E&I Solutions Inc
Project/Site: Albion, NY Groundwater Project

Job ID: 480-188550-1

Method: 8260C - Volatile Organic Compounds by GC/MS

Matrix: Water — **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)			
		TOL	DCA	BFB	DBFM
Lab Sample ID	Client Sample ID	(80-120)	(77-120)	(73-120)	(75-123)
480-188550-1	MW-1-081821	91	96	93	92
480-188550-2	MW-9R-081821	91	92	90	94
480-188550-3	MW-6-081821	91	99	92	100
480-188550-4	MW-5-081821	92	94	92	90
480-188550-5	MW-50-081821	91	96	92	94
480-188550-6	MW-8R-081821	92	95	95	96
480-188550-7	MW-10R-081821	91	95	91	91
480-188550-8	EB-01-081821	93	92	97	91
480-188550-9	TRIP BLANK	93	96	93	93
LCS 480-593779/6	Lab Control Sample	90	94	92	93
MB 480-593779/8	Method Blank	92	94	93	96

Surrogate Legend

TOL = Toluene-d8 (Surr)
DCA = 1,2-Dichloroethane-d4 (Surr)
BFB = 4-Bromofluorobenzene (Surr)
DBFM = Dibromofluoromethane (Surr)

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Matrix: Water — **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)		
		FBP	NBZ	TPHd14
Lab Sample ID	Client Sample ID	(48-120)	(46-120)	(60-148)
480-188550-1	MW-1-081821	112	105	96
480-188550-2	MW-9R-081821	89	86	71
480-188550-3	MW-6-081821	94	90	72
480-188550-4	MW-5-081821	91	89	84
480-188550-5	MW-50-081821	109	105	97
480-188550-6	MW-8R-081821	111	113	84
480-188550-7	MW-10R-081821	95	93	70
480-188550-8	EB-01-081821	107	100	97
LCS 480-593697/2-A	Lab Control Sample	103	97	103
LCSD 480-593697/3-A	Lab Control Sample Dup	96	94	100
MB 480-593697/1-A	Method Blank	109	100	112

Surrogate Legend

FBP = 2-Fluorobiphenyl
NBZ = Nitrobenzene-d5 (Surr)
TPHd14 = p-Terphenyl-d14 (Surr)

Method: 8260C - Volatile Organic Compounds by GC/MS

Lab Sample ID: MB 480-593779/8
Matrix: Water
Analysis Batch: 593779

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	ND		1.0	0.41	ug/L			08/24/21 01:12	1
Toluene	ND		1.0	0.51	ug/L			08/24/21 01:12	1
Ethylbenzene	ND		1.0	0.74	ug/L			08/24/21 01:12	1
m-Xylene & p-Xylene	ND		2.0	0.66	ug/L			08/24/21 01:12	1
o-Xylene	ND		1.0	0.76	ug/L			08/24/21 01:12	1
Xylenes, Total	ND		2.0	0.66	ug/L			08/24/21 01:12	1
Total BTEX	ND		2.0	1.0	ug/L			08/24/21 01:12	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Toluene-d8 (Surr)	*92*		*80 - 120*		*08/24/21 01:12*	*1*
1,2-Dichloroethane-d4 (Surr)	*94*		*77 - 120*		*08/24/21 01:12*	*1*
4-Bromofluorobenzene (Surr)	*93*		*73 - 120*		*08/24/21 01:12*	*1*
Dibromofluoromethane (Surr)	*96*		*75 - 123*		*08/24/21 01:12*	*1*

Lab Sample ID: LCS 480-593779/6
Matrix: Water
Analysis Batch: 593779

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	25.0	24.9		ug/L		100	71 - 124
Toluene	25.0	23.4		ug/L		94	80 - 122
Ethylbenzene	25.0	23.6		ug/L		94	77 - 123
m-Xylene & p-Xylene	25.0	24.0		ug/L		96	76 - 122
o-Xylene	25.0	23.0		ug/L		92	76 - 122

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
Toluene-d8 (Surr)	*90*		*80 - 120*
1,2-Dichloroethane-d4 (Surr)	*94*		*77 - 120*
4-Bromofluorobenzene (Surr)	*92*		*73 - 120*
Dibromofluoromethane (Surr)	*93*		*75 - 123*

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Lab Sample ID: MB 480-593697/1-A
Matrix: Water
Analysis Batch: 593888

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 593697

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acenaphthene	ND		5.0	0.41	ug/L		08/23/21 09:13	08/24/21 20:34	1
Acenaphthylene	ND		5.0	0.38	ug/L		08/23/21 09:13	08/24/21 20:34	1
Anthracene	ND		5.0	0.28	ug/L		08/23/21 09:13	08/24/21 20:34	1
Benzo[a]anthracene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/24/21 20:34	1
Benzo[a]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/24/21 20:34	1
Benzo[b]fluoranthene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/24/21 20:34	1
Benzo[g,h,i]perylene	ND		5.0	0.35	ug/L		08/23/21 09:13	08/24/21 20:34	1
Benzo[k]fluoranthene	ND		5.0	0.73	ug/L		08/23/21 09:13	08/24/21 20:34	1
Chrysene	ND		5.0	0.33	ug/L		08/23/21 09:13	08/24/21 20:34	1
Dibenz(a,h)anthracene	ND		5.0	0.42	ug/L		08/23/21 09:13	08/24/21 20:34	1

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 480-593697/1-A
Matrix: Water
Analysis Batch: 593888

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 593697

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Fluoranthene	ND		5.0	0.40	ug/L		08/23/21 09:13	08/24/21 20:34	1
Fluorene	ND		5.0	0.36	ug/L		08/23/21 09:13	08/24/21 20:34	1
Indeno[1,2,3-cd]pyrene	ND		5.0	0.47	ug/L		08/23/21 09:13	08/24/21 20:34	1
Naphthalene	ND		5.0	0.76	ug/L		08/23/21 09:13	08/24/21 20:34	1
Phenanthrene	ND		5.0	0.44	ug/L		08/23/21 09:13	08/24/21 20:34	1
Pyrene	ND		5.0	0.34	ug/L		08/23/21 09:13	08/24/21 20:34	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*109*		*48 - 120*	*08/23/21 09:13*	*08/24/21 20:34*	*1*
Nitrobenzene-d5 (Surr)	*100*		*46 - 120*	*08/23/21 09:13*	*08/24/21 20:34*	*1*
p-Terphenyl-d14 (Surr)	*112*		*60 - 148*	*08/23/21 09:13*	*08/24/21 20:34*	*1*

Lab Sample ID: LCS 480-593697/2-A
Matrix: Water
Analysis Batch: 593888

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 593697

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acenaphthene	32.0	32.5		ug/L		102	60 - 120
Acenaphthylene	32.0	35.6		ug/L		111	63 - 120
Anthracene	32.0	33.5		ug/L		105	67 - 120
Benzo[a]anthracene	32.0	32.9		ug/L		103	70 - 121
Benzo[a]pyrene	32.0	31.3		ug/L		98	60 - 123
Benzo[b]fluoranthene	32.0	33.7		ug/L		105	66 - 126
Benzo[g,h,i]perylene	32.0	32.6		ug/L		102	66 - 150
Benzo[k]fluoranthene	32.0	32.6		ug/L		102	65 - 124
Chrysene	32.0	32.2		ug/L		101	69 - 120
Dibenz(a,h)anthracene	32.0	33.7		ug/L		105	65 - 135
Fluoranthene	32.0	34.9		ug/L		109	69 - 126
Fluorene	32.0	33.4		ug/L		104	66 - 120
Indeno[1,2,3-cd]pyrene	32.0	31.9		ug/L		100	69 - 146
Naphthalene	32.0	31.9		ug/L		100	57 - 120
Phenanthrene	32.0	34.3		ug/L		107	68 - 120
Pyrene	32.0	32.8		ug/L		102	70 - 125

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
2-Fluorobiphenyl	*103*		*48 - 120*
Nitrobenzene-d5 (Surr)	*97*		*46 - 120*
p-Terphenyl-d14 (Surr)	*103*		*60 - 148*

Lab Sample ID: LCSD 480-593697/3-A
Matrix: Water
Analysis Batch: 593888

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 593697

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Acenaphthene	32.0	30.4		ug/L		95	60 - 120	7	24
Acenaphthylene	32.0	34.0		ug/L		106	63 - 120	5	18
Anthracene	32.0	31.6		ug/L		99	67 - 120	6	15
Benzo[a]anthracene	32.0	32.1		ug/L		100	70 - 121	2	15

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCSD 480-593697/3-A
Matrix: Water
Analysis Batch: 593888

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 593697

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzo[a]pyrene			32.0	29.6		ug/L		92	60 - 123	6	15
Benzo[b]fluoranthene			32.0	32.6		ug/L		102	66 - 126	3	15
Benzo[g,h,i]perylene			32.0	30.5		ug/L		95	66 - 150	7	15
Benzo[k]fluoranthene			32.0	29.9		ug/L		93	65 - 124	9	22
Chrysene			32.0	31.5		ug/L		98	69 - 120	2	15
Dibenz(a,h)anthracene			32.0	31.9		ug/L		100	65 - 135	6	15
Fluoranthene			32.0	33.2		ug/L		104	69 - 126	5	15
Fluorene			32.0	31.5		ug/L		98	66 - 120	6	15
Indeno[1,2,3-cd]pyrene			32.0	29.8		ug/L		93	69 - 146	7	15
Naphthalene			32.0	29.9		ug/L		93	57 - 120	6	29
Phenanthrene			32.0	32.4		ug/L		101	68 - 120	6	15
Pyrene			32.0	31.9		ug/L		100	70 - 125	3	19

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
2-Fluorobiphenyl	*96*		*48 - 120*
Nitrobenzene-d5 (Surr)	*94*		*46 - 120*
p-Terphenyl-d14 (Surr)	*100*		*60 - 148*

Method: 4500 CN E-2011 - Cyanide, Total: Colorimetric Method

Lab Sample ID: MB 240-501461/1-A
Matrix: Water
Analysis Batch: 501479

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 501461

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.010	0.0060	mg/L		08/27/21 18:24	08/27/21 19:17	1

Lab Sample ID: LCS 240-501461/2-A
Matrix: Water
Analysis Batch: 501479

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 501461

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Cyanide, Total			0.238	0.239		mg/L		100	85 - 115		

Lab Sample ID: MRL 240-501479/10
Matrix: Water
Analysis Batch: 501479

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	MRL Result	MRL Qualifier	Unit	D	%Rec	%Rec. Limits		
Cyanide, Total			0.0100	0.00990	J	mg/L		99	70 - 130		

Lab Sample ID: MB 240-502048/1-A
Matrix: Water
Analysis Batch: 502161

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 502048

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.010	0.0060	mg/L		09/01/21 16:19	09/01/21 16:56	1

Method: 4500 CN E-2011 - Cyanide, Total: Colorimetric Method (Continued)

Lab Sample ID: LCS 240-502048/2-A
Matrix: Water
Analysis Batch: 502161

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 502048

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Cyanide, Total			0.238	0.238		mg/L		100	85 - 115		

Lab Sample ID: 480-188550-8 MS
Matrix: Water
Analysis Batch: 502161

Client Sample ID: EB-01-081821
Prep Type: Total/NA
Prep Batch: 502048

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Cyanide, Total	ND		0.0400	0.0395		mg/L		99	22 - 135		

Lab Sample ID: 480-188550-8 MSD
Matrix: Water
Analysis Batch: 502161

Client Sample ID: EB-01-081821
Prep Type: Total/NA
Prep Batch: 502048

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Cyanide, Total	ND		0.0400	0.0413		mg/L		103	22 - 135	4	40

GC/MS VOA

Analysis Batch: 593779

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-188550-1	MW-1-081821	Total/NA	Water	8260C	
480-188550-2	MW-9R-081821	Total/NA	Water	8260C	
480-188550-3	MW-6-081821	Total/NA	Water	8260C	
480-188550-4	MW-5-081821	Total/NA	Water	8260C	
480-188550-5	MW-50-081821	Total/NA	Water	8260C	
480-188550-6	MW-8R-081821	Total/NA	Water	8260C	
480-188550-7	MW-10R-081821	Total/NA	Water	8260C	
480-188550-8	EB-01-081821	Total/NA	Water	8260C	
480-188550-9	TRIP BLANK	Total/NA	Water	8260C	
MB 480-593779/8	Method Blank	Total/NA	Water	8260C	
LCS 480-593779/6	Lab Control Sample	Total/NA	Water	8260C	

GC/MS Semi VOA

Prep Batch: 593697

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-188550-1	MW-1-081821	Total/NA	Water	3510C	
480-188550-2	MW-9R-081821	Total/NA	Water	3510C	
480-188550-3	MW-6-081821	Total/NA	Water	3510C	
480-188550-4	MW-5-081821	Total/NA	Water	3510C	
480-188550-5	MW-50-081821	Total/NA	Water	3510C	
480-188550-6	MW-8R-081821	Total/NA	Water	3510C	
480-188550-7	MW-10R-081821	Total/NA	Water	3510C	
480-188550-8	EB-01-081821	Total/NA	Water	3510C	
MB 480-593697/1-A	Method Blank	Total/NA	Water	3510C	
LCS 480-593697/2-A	Lab Control Sample	Total/NA	Water	3510C	
LCSD 480-593697/3-A	Lab Control Sample Dup	Total/NA	Water	3510C	

Analysis Batch: 593888

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-188550-1	MW-1-081821	Total/NA	Water	8270D	593697
480-188550-2	MW-9R-081821	Total/NA	Water	8270D	593697
480-188550-3	MW-6-081821	Total/NA	Water	8270D	593697
480-188550-4	MW-5-081821	Total/NA	Water	8270D	593697
480-188550-5	MW-50-081821	Total/NA	Water	8270D	593697
480-188550-7	MW-10R-081821	Total/NA	Water	8270D	593697
480-188550-8	EB-01-081821	Total/NA	Water	8270D	593697
MB 480-593697/1-A	Method Blank	Total/NA	Water	8270D	593697
LCS 480-593697/2-A	Lab Control Sample	Total/NA	Water	8270D	593697
LCSD 480-593697/3-A	Lab Control Sample Dup	Total/NA	Water	8270D	593697

Analysis Batch: 594071

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-188550-6	MW-8R-081821	Total/NA	Water	8270D	593697

General Chemistry

Prep Batch: 501461

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-188550-1	MW-1-081821	Total/NA	Water	Distill/CN	
480-188550-2	MW-9R-081821	Total/NA	Water	Distill/CN	
480-188550-3	MW-6-081821	Total/NA	Water	Distill/CN	

General Chemistry (Continued)

Prep Batch: 501461 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-188550-4	MW-5-081821	Total/NA	Water	Distill/CN	
480-188550-5	MW-50-081821	Total/NA	Water	Distill/CN	
480-188550-6	MW-8R-081821	Total/NA	Water	Distill/CN	
480-188550-7	MW-10R-081821	Total/NA	Water	Distill/CN	
MB 240-501461/1-A	Method Blank	Total/NA	Water	Distill/CN	
LCS 240-501461/2-A	Lab Control Sample	Total/NA	Water	Distill/CN	

Analysis Batch: 501479

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-188550-1	MW-1-081821	Total/NA	Water	4500 CN E-2011	501461
480-188550-2	MW-9R-081821	Total/NA	Water	4500 CN E-2011	501461
480-188550-3	MW-6-081821	Total/NA	Water	4500 CN E-2011	501461
480-188550-4	MW-5-081821	Total/NA	Water	4500 CN E-2011	501461
480-188550-5	MW-50-081821	Total/NA	Water	4500 CN E-2011	501461
480-188550-6	MW-8R-081821	Total/NA	Water	4500 CN E-2011	501461
480-188550-7	MW-10R-081821	Total/NA	Water	4500 CN E-2011	501461
MB 240-501461/1-A	Method Blank	Total/NA	Water	4500 CN E-2011	501461
LCS 240-501461/2-A	Lab Control Sample	Total/NA	Water	4500 CN E-2011	501461
MRL 240-501479/10	Lab Control Sample	Total/NA	Water	4500 CN E-2011	

Prep Batch: 502048

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-188550-8	EB-01-081821	Total/NA	Water	Distill/CN	
MB 240-502048/1-A	Method Blank	Total/NA	Water	Distill/CN	
LCS 240-502048/2-A	Lab Control Sample	Total/NA	Water	Distill/CN	
480-188550-8 MS	EB-01-081821	Total/NA	Water	Distill/CN	
480-188550-8 MSD	EB-01-081821	Total/NA	Water	Distill/CN	

Analysis Batch: 502161

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-188550-8	EB-01-081821	Total/NA	Water	4500 CN E-2011	502048
MB 240-502048/1-A	Method Blank	Total/NA	Water	4500 CN E-2011	502048
LCS 240-502048/2-A	Lab Control Sample	Total/NA	Water	4500 CN E-2011	502048
480-188550-8 MS	EB-01-081821	Total/NA	Water	4500 CN E-2011	502048
480-188550-8 MSD	EB-01-081821	Total/NA	Water	4500 CN E-2011	502048

Lab Chronicle

Client: Wood E&I Solutions Inc
Job ID: 480-188550-1
Project/Site: Albion, NY Groundwater Project

Client Sample ID: MW-1-081821
Lab Sample ID: 480-188550-1
Date Collected: 08/18/21 08:55
Matrix: Water
Date Received: 08/20/21 10:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	593779	08/24/21 05:03	ATG	TAL BUF
Total/NA	Prep	3510C			593697	08/23/21 09:13	JMP	TAL BUF
Total/NA	Analysis	8270D		1	593888	08/24/21 22:20	PJQ	TAL BUF
Total/NA	Prep	Distill/CN			501461	08/27/21 18:24	AGC	TAL CAN
Total/NA	Analysis	4500 CN E-2011		1	501479	08/27/21 19:58	AGC	TAL CAN

Client Sample ID: MW-9R-081821
Lab Sample ID: 480-188550-2
Date Collected: 08/18/21 11:00
Matrix: Water
Date Received: 08/20/21 10:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		4	593779	08/24/21 05:26	ATG	TAL BUF
Total/NA	Prep	3510C			593697	08/23/21 09:13	JMP	TAL BUF
Total/NA	Analysis	8270D		1	593888	08/24/21 22:46	PJQ	TAL BUF
Total/NA	Prep	Distill/CN			501461	08/27/21 18:24	AGC	TAL CAN
Total/NA	Analysis	4500 CN E-2011		1	501479	08/27/21 20:00	AGC	TAL CAN

Client Sample ID: MW-6-081821
Lab Sample ID: 480-188550-3
Date Collected: 08/18/21 11:55
Matrix: Water
Date Received: 08/20/21 10:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	593779	08/24/21 05:49	ATG	TAL BUF
Total/NA	Prep	3510C			593697	08/23/21 09:13	JMP	TAL BUF
Total/NA	Analysis	8270D		1	593888	08/24/21 23:12	PJQ	TAL BUF
Total/NA	Prep	Distill/CN			501461	08/27/21 18:24	AGC	TAL CAN
Total/NA	Analysis	4500 CN E-2011		1	501479	08/27/21 20:02	AGC	TAL CAN

Client Sample ID: MW-5-081821
Lab Sample ID: 480-188550-4
Date Collected: 08/18/21 13:00
Matrix: Water
Date Received: 08/20/21 10:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		2	593779	08/24/21 06:13	ATG	TAL BUF
Total/NA	Prep	3510C			593697	08/23/21 09:13	JMP	TAL BUF
Total/NA	Analysis	8270D		1	593888	08/24/21 23:38	PJQ	TAL BUF
Total/NA	Prep	Distill/CN			501461	08/27/21 18:24	AGC	TAL CAN
Total/NA	Analysis	4500 CN E-2011		1	501479	08/27/21 20:04	AGC	TAL CAN

Client Sample ID: MW-50-081821
Lab Sample ID: 480-188550-5
Date Collected: 08/18/21 12:00
Matrix: Water
Date Received: 08/20/21 10:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	593779	08/24/21 06:36	ATG	TAL BUF

Lab Chronicle

Client: Wood E&I Solutions Inc
Project/Site: Albion, NY Groundwater Project

Job ID: 480-188550-1

Client Sample ID: MW-50-081821
Date Collected: 08/18/21 12:00
Date Received: 08/20/21 10:00

Lab Sample ID: 480-188550-5
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3510C			593697	08/23/21 09:13	JMP	TAL BUF
Total/NA	Analysis	8270D		1	593888	08/25/21 00:05	PJQ	TAL BUF
Total/NA	Prep	Distill/CN			501461	08/27/21 18:24	AGC	TAL CAN
Total/NA	Analysis	4500 CN E-2011		1	501479	08/27/21 20:06	AGC	TAL CAN

Client Sample ID: MW-8R-081821
Date Collected: 08/18/21 14:30
Date Received: 08/20/21 10:00

Lab Sample ID: 480-188550-6
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		50	593779	08/24/21 06:59	ATG	TAL BUF
Total/NA	Prep	3510C			593697	08/23/21 09:13	JMP	TAL BUF
Total/NA	Analysis	8270D		50	594071	08/25/21 16:08	PJQ	TAL BUF
Total/NA	Prep	Distill/CN			501461	08/27/21 18:24	AGC	TAL CAN
Total/NA	Analysis	4500 CN E-2011		1	501479	08/27/21 20:07	AGC	TAL CAN

Client Sample ID: MW-10R-081821
Date Collected: 08/18/21 16:55
Date Received: 08/20/21 10:00

Lab Sample ID: 480-188550-7
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		2	593779	08/24/21 07:22	ATG	TAL BUF
Total/NA	Prep	3510C			593697	08/23/21 09:13	JMP	TAL BUF
Total/NA	Analysis	8270D		1	593888	08/25/21 00:59	PJQ	TAL BUF
Total/NA	Prep	Distill/CN			501461	08/27/21 18:24	AGC	TAL CAN
Total/NA	Analysis	4500 CN E-2011		1	501479	08/27/21 20:09	AGC	TAL CAN

Client Sample ID: EB-01-081821
Date Collected: 08/18/21 17:10
Date Received: 08/20/21 10:00

Lab Sample ID: 480-188550-8
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	593779	08/24/21 07:45	ATG	TAL BUF
Total/NA	Prep	3510C			593697	08/23/21 09:13	JMP	TAL BUF
Total/NA	Analysis	8270D		1	593888	08/25/21 01:25	PJQ	TAL BUF
Total/NA	Prep	Distill/CN			502048	09/01/21 16:19	AGC	TAL CAN
Total/NA	Analysis	4500 CN E-2011		1	502161	09/01/21 16:59	AGC	TAL CAN

Client Sample ID: TRIP BLANK
Date Collected: 08/18/21 07:00
Date Received: 08/20/21 10:00

Lab Sample ID: 480-188550-9
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	593779	08/24/21 08:08	ATG	TAL BUF

Lab Chronicle

Client: Wood E&I Solutions Inc
Project/Site: Albion, NY Groundwater Project

Job ID: 480-188550-1

Laboratory References:

TAL BUF = Eurofins TestAmerica, Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

TAL CAN = Eurofins TestAmerica, Canton, 4101 Shuffel Street NW, North Canton, OH 44720, TEL (330)497-9396

Accreditation/Certification Summary

Client: Wood E&I Solutions Inc
Job ID: 480-188550-1
Project/Site: Albion, NY Groundwater Project

Laboratory: Eurofins TestAmerica, Buffalo

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Program	Identification Number	Expiration Date
New York	NELAP	10026	04-01-22

The following analytes are included in this report, but the laboratory is not certified by the governing authority. This list may include analytes for which the agency does not offer certification.

Analysis Method	Prep Method	Matrix	Analyte
8260C		Water	Total BTEX

Laboratory: Eurofins TestAmerica, Canton

All accreditations/certifications held by this laboratory are listed. Not all accreditations/certifications are applicable to this report.

Authority	Program	Identification Number	Expiration Date
California	State	2927	02-23-22
Connecticut	State	PH-0590	12-31-21
Florida	NELAP	E87225	06-30-22
Georgia	State	4062	02-23-22
Illinois	NELAP	200004	07-31-22
Iowa	State	421	06-01-23
Kansas	NELAP	E-10336	04-30-22
Kentucky (UST)	State	112225	02-23-22
Kentucky (WW)	State	KY98016	12-31-21
Minnesota	NELAP	OH00048	12-31-21
Minnesota (Petrofund)	State	3506	08-01-23
New Jersey	NELAP	OH001	06-30-22
New York	NELAP	10975	03-31-22
Ohio VAP	State	CL0024	12-21-23
Oregon	NELAP	4062	02-23-22
Pennsylvania	NELAP	68-00340	08-31-22
Texas	NELAP	T104704517-18-10	08-31-22
USDA	US Federal Programs	P330-18-00281	09-17-21
Virginia	NELAP	010101	09-14-21
Washington	State	C971	01-12-22
West Virginia DEP	State	210	12-31-21

Method Summary

Client: Wood E&I Solutions Inc
Project/Site: Albion, NY Groundwater Project

Job ID: 480-188550-1

Method	Method Description	Protocol	Laboratory
8260C	Volatile Organic Compounds by GC/MS	SW846	TAL BUF
8270D	Semivolatile Organic Compounds (GC/MS)	SW846	TAL BUF
4500 CN E-2011	Cyanide, Total: Colorimetric Method	SM	TAL CAN
3510C	Liquid-Liquid Extraction (Separatory Funnel)	SW846	TAL BUF
5030C	Purge and Trap	SW846	TAL BUF
Distill/CN	Distillation, Cyanide	None	TAL CAN

Protocol References:

None = None

SM = "Standard Methods For The Examination Of Water And Wastewater"

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

Laboratory References:

TAL BUF = Eurofins TestAmerica, Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

TAL CAN = Eurofins TestAmerica, Canton, 4101 Shuffel Street NW, North Canton, OH 44720, TEL (330)497-9396

Sample Summary

Client: Wood E&I Solutions Inc
Project/Site: Albion, NY Groundwater Project

Job ID: 480-188550-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
480-188550-1	MW-1-081821	Water	08/18/21 08:55	08/20/21 10:00
480-188550-2	MW-9R-081821	Water	08/18/21 11:00	08/20/21 10:00
480-188550-3	MW-6-081821	Water	08/18/21 11:55	08/20/21 10:00
480-188550-4	MW-5-081821	Water	08/18/21 13:00	08/20/21 10:00
480-188550-5	MW-50-081821	Water	08/18/21 12:00	08/20/21 10:00
480-188550-6	MW-8R-081821	Water	08/18/21 14:30	08/20/21 10:00
480-188550-7	MW-10R-081821	Water	08/18/21 16:55	08/20/21 10:00
480-188550-8	EB-01-081821	Water	08/18/21 17:10	08/20/21 10:00
480-188550-9	TRIP BLANK	Water	08/18/21 07:00	08/20/21 10:00

Eurofins TestAmerica, Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone: 716-691-2600 Fax: 716-691-7991

Chain of Custody Record

eurofins | Environment Testing America

Client Information	Sampler: Amelia Lyons	Lab PM: Fischer, Brian J	Carrier Tracking No(s):	COC No: 480-164114-33519.1
Client Contact: Accounts Payable- Oakland	Phone: 724-757-6525	E-Mail: Brian.Fischer@Eurofinset.com	State of Origin: NY	Page: Page 1 of 1
Company: Wood E&I Solutions Inc	PWSID:			Job #:
Address: 180 Grand Avenue Suite 1100	Due Date Requested:			
City: Oakland	TAT Requested (days): Standard			
State, Zip: CA, 94612	Compliance Project: Δ Yes Δ No			
Phone:	PO #: 0078000050.03.02B			
Email: apinvoice.us@woodplc.com	WO #:			
Project Name: Albion, NY Groundwater Project	Project #: 48021262			
Site:	SSOW#:			

Analysis Requested

Preservation Codes:
A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)
Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	4500_CN_E - Local Method	8270D - PAH Semivolatiles	8260C - BTEX - 8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:				B	N	A		
MW-1-081821	8/18/21	855	G	Water			X	X	X	6	
MW-9R-081821		1100		Water							
MW-6-081821		1155		Water							
MW-5-081821		1300		Water							
MW-50-081821		1200		Water							
MW-8R-081821		1430		Water							MW-8R-081821
MW-10R-081821		1655		Water							
EB-01-081821		1710		Water							
TRIP Blank		700		Water						2	

480-188550 Chain of Custody

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☑ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
1		8/19/21 1100	WOOD	FEDEX		
2	Relinquished by:	Date/Time:	Company	Received by:	Date/Time: 8/20/21 1000	Company TAS
3	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.:

Cooler Temperature(s) °C and Other Remarks: #1 3.2 2.9

Ver: 06/08/2021

Eurofins TestAmerica, Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone: 716-691-2600 Fax: 716-691-7991

Chain of Custody Record

eurofins Environment Testing America

Client Information (Sub Contract Lab)	Sampler:	Lab PM: Fischer, Brian J	Carrier Tracking No(s):	COC No: 480-85978.1
Client Contact: Shipping/Receiving	Phone:	E-Mail: Brian.Fischer@Eurofinset.com	State of Origin: New York	Page: Page 1 of 1
Company: TestAmerica Laboratories, Inc.		Accreditations Required (See note): NELAP - New York		Job #: 480-188550-1
Address: 4101 Shuffel Street NW,	Due Date Requested: 9/19/2021			
City: North Canton	TAT Requested (days):			
State, Zip: OH, 44720				
Phone: 330-497-9396(Tel) 330-497-0772(Fax)	PO #:			
Email:	WO #:			
Project Name: Albion, NY Groundwater Project	Project #: 48021262			
Site:	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL
B - NaOH
C - Zn Acetate
D - Nitric Acid
E - NaHSO4
F - MeOH
G - Amchlor
H - Ascorbic Acid
I - Ice
J - DI Water
K - EDTA
L - EDA
M - Hexane
N - None
O - AsNaO2
P - Na2O4S
Q - Na2SO3
R - Na2S2O3
S - H2SO4
T - TSP Dodecahydrate
U - Acetone
V - MCAA
W - pH 4-5
Z - other (specify)
Other:

W115

Special Instructions/Note:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	4500_CN_E/Distill_CN	Total Number of containers
			Preservation Code:					
MW-1-081821 (480-188550-1)	8/18/21	08:55 Eastern		Water			X	1
MW-9R-081821 (480-188550-2)	8/18/21	11:00 Eastern		Water			X	1
MW-6-081821 (480-188550-3)	8/18/21	11:55 Eastern		Water			X	1
MW-5-081821 (480-188550-4)	8/18/21	13:00 Eastern		Water			X	1
MW-50-081821 (480-188550-5)	8/18/21	12:00 Eastern		Water			X	1
MW-8R-081821 (480-188550-6)	8/18/21	14:30 Eastern		Water			X	1
MW-10R-081821 (480-188550-7)	8/18/21	16:55 Eastern		Water			X	1
EB-01-081821 (480-188550-8)	8/18/21	17:10 Eastern		Water			X	1

Note: Since laboratory accreditations are subject to change, Eurofins TestAmerica places the ownership of method, analyte & accreditation compliance upon our subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed, the samples must be shipped back to the Eurofins TestAmerica laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins TestAmerica attention immediately. If all requested accreditations are current to date, return the signed Chain of Custody attesting to said compliance to Eurofins TestAmerica.

Possible Hazard Identification: Unconfirmed	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month): ☐ Return To Client ☐ Disposal By Lab ☐ Archive For ____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 2	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:
Relinquished by: Christian Arnold	Date/Time: 8/20/21 1700	Company: TA	Received by:	Date/Time: 8-21-21 1000	Company: ETA
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: ☐ Yes ☐ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks

Ver: 06/08/2021

Eurofins TestAmerica Canton Sample Receipt Form/Narrative **Login # :** _____
Canton Facility

Client FTA Site Name _____ Cooler unpacked by: Matt
Cooler Received on 3-21-21 Opened on 3-21-21
FedEx: 1st Grd Exp UPS FAS Clipper Client Drop Off TestAmerica Courier Other
Receipt After-hours: Drop-off Date/Time _____ Storage Location _____
TestAmerica Cooler # 14 Foam Box Client Cooler Box Other _____
Packing material used: Bubble Wrap Foam Plastic Bag None Other _____
COOLANT: Wet Ice Blue Ice Dry Ice Water None

1. Cooler temperature upon receipt ☐ See Multiple Cooler Form
IR GUN# IR-11 (CF +0.1 °C) Observed Cooler Temp. 0.7 °C Corrected Cooler Temp. 0.8 °C
IR GUN #IR-12 (CF +0.2°C) Observed Cooler Temp. _____ °C Corrected Cooler Temp. _____ °C

2. Were tamper/custody seals on the outside of the cooler(s)? If Yes Quantity 1	(Yes)	No
-Were the seals on the outside of the cooler(s) signed & dated?	(Yes)	No NA
-Were tamper/custody seals on the bottle(s) or bottle kits (LLHg/MeHg)?	Yes	(No)
-Were tamper/custody seals intact and uncompromised?	(Yes)	No NA
3. Shippers' packing slip attached to the cooler(s)?	(Yes)	No
4. Did custody papers accompany the sample(s)?	(Yes)	No
5. Were the custody papers relinquished & signed in the appropriate place?	(Yes)	No
6. Was/were the person(s) who collected the samples clearly identified on the COC?	Yes	(No)
7. Did all bottles arrive in good condition (Unbroken)?	(Yes)	No
8. Could all bottle labels (ID/Date/Time) be reconciled with the COC?	(Yes)	No
9. For each sample, does the COC specify preservatives (Y/N) # of containers (Y/N), and sample type of grab/comp (Y/N)?	(Yes)	No
10. Were correct bottle(s) used for the test(s) indicated?	(Yes)	No
11. Sufficient quantity received to perform indicated analyses?	(Yes)	No
12. Are these work share samples and all listed on the COC?	(Yes)	No
If yes, Questions 13-17 have been checked at the originating laboratory.		
13. Were all preserved sample(s) at the correct pH upon receipt?	Yes	No NA pH Strip Lot# HC157842
14. Were VOAs on the COC?	Yes	No
15. Were air bubbles >6 mm in any VOA vials? ⬤ ⇐ Larger than this.	Yes	No NA
16. Was a VOA trip blank present in the cooler(s)? Trip Blank Lot # _____	Yes	No
17. Was a LL Hg or Me Hg trip blank present? _____	Yes	No

Tests that are not checked for pH by Receiving:
VOAs
Oil and Grease
TOC

Contacted PM _____ Date _____ by _____ via Verbal Voice Mail Other

Concerning _____

18. CHAIN OF CUSTODY & SAMPLE DISCREPANCIES ☐ additional next page — Samples processed by:

19. SAMPLE CONDITION
Sample(s) _____ were received after the recommended holding time had expired.
Sample(s) _____ were received in a broken container.
Sample(s) _____ were received with bubble >6 mm in diameter. (Notify PM)

20. SAMPLE PRESERVATION
Sample(s) _____ were further preserved in the laboratory.
Time preserved: _____ Preservative(s) added/Lot number(s): _____

VOA Sample Preservation - Date/Time VOAs Frozen: _____

WI-NC-099

Login Sample Receipt Checklist

Client: Wood E&I Solutions Inc

Job Number: 480-188550-1

Login Number: 188550
List Number: 1
Creator: Yeager, Brian A

List Source: Eurofins TestAmerica, Buffalo

Question	Answer	Comment
Radioactivity either was not measured or, if measured, is at or below background	True	
The cooler's custody seal, if present, is intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the sample IDs on the containers and the COC.	True	
Samples are received within Holding Time (Excluding tests with immediate HTs)..	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
VOA sample vials do not have headspace or bubble is <6mm (1/4") in diameter.	True	
If necessary, staff have been informed of any short hold time or quick TAT needs	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Sampling Company provided.	True	WOOD
Samples received within 48 hours of sampling.	True	
Samples requiring field filtration have been filtered in the field.	True	
Chlorine Residual checked.	N/A	

APPENDIX C

Soil Cap Inspection Form

wood.

APPENDIX D

EXAMPLE SITE INSPECTION FORM

Former MPG Site No. 837012
Albion, New York

Date: 4/13/21
Inspection By: Amelia Lyons
Others On Site: N/A

Weather: Cloudy, 50°FS
Time In: 645
Time Out:

Visual Observations – Soil Cap and Monitoring Well Network:

	YES	NO	Comments
Is the Soil Cap intact?	✓		
Any signs of significant erosion?		✓	
Any signs of tree roots or vegetation damaging the cap?		✓	
Any signs of intrusive work (earth disturbing activities) in the capped area?		✓	
Are the groundwater monitoring wells accessible and intact?	✓		

If maintenance is required to resolve any of the above noted items, describe what actions taken, if any. Were all maintenance items resolved during this site visit? If no, what items remain to be resolved?

monitoring well network is in good repair.

Documentation:

	YES	NO	Comments
Are maintenance records on-site and up-to-date?		✓	
Are monitoring records on-site and up-to-date?		✓	records are with me.

wood.

	YES	NO	Comments
Is the most recent Monitoring and Sampling Plan on-site?		✓	record is kept with me
Is the Site Management Plan on-site?		/	record is kept with me
If there is intrusive work being performed: - Is there a Health and Safety Plan on-site?			N/A
- If the surface area of construction activities is greater than 1 acre in size, is there a Stormwater Pollution Prevention Plan (SWPPP) on-site?			N/A

If maintenance is required to resolve any of the above noted items, describe what actions taken, if any. Were all maintenance items resolved during this site visit? If no, what items remain to be resolved?

All pertinent documents are brought to the site and kept with Wood personel.

Note: This form is provided as an example template only and should be modified and updated as needed to reflect current project conditions.