



September 12, 2025

Edward Koppers
New York State Department of Environmental Conservation
625 Broadway
Albany, NY 12233

**RE: Limited Subsurface Investigation Report
Richard L. Hanson Fire Training Center
4610 New York State Route 5, Mohawk, Montgomery County, New York
NYSDEC Site #B00138**

Dear Mr. Koppers:

LaBella Associates, D.P.C. (LaBella) has prepared this report to document overburden soil and groundwater assessment methodologies and sampling results for the above referenced location. All field investigation activities were performed at the discretion of and in accordance with LaBella's Limited Subsurface Investigation Work Plan submitted April 4, 2025 and approved by the New York State Department of Environmental Conservation (NYSDEC) April 9, 2025.

SITE BACKGROUND

The Site consists of an individual parcel (65.2-19) totaling 12.00 acres and is located adjacent northwest of New York State Route 5. **Figure 1** depicts the Site location. The Site includes a single-story masonry block classroom building located on the southwest portion of the property and a multi-story concrete block fire-training tower situated on the western portion of the Site. A pond is located on the northern portion of the property. The attached **Figure 2** depicts property features and boundaries.

The Site is situated in a rural area with residential homes located northeast and southwest. Undeveloped land is visible to the north, northwest, and east of the Site. Regional topography slopes from the Site towards the Mohawk River located east and south of the property. The Site buildings are serviced by an onsite drinking water well and septic system.

The property was purchased by the New York Central and Hudson River Railroad in 1891 and was reportedly used as a mining operation. A refueling station for the railroad may have also been located onsite. A partial transfer of the Site to Montgomery County occurred in July 1933 to reportedly widen the highway right-of-way for NYS Route 5 and Prame Road. Arthur and Agnes Peters purchased the Site in 1940 and was transferred to the Peters Oil Co., Inc. in January 1948. The Site was leased to the Gulf Oil Corporation in July 1948 and was utilized as a fueling station, truck stop, and diner. Montgomery County purchased the Site in 1970 and historically utilized the Site for highway truck storage and maintenance. The county constructed the Richard L. Hanson Fire Training Center, and the former buildings were demolished. To date, the Site continues to operate as a fire training facility.

According to information contained in the NYSDEC's Environmental Restoration Record of Decision (ROD) dated March 2003, multiple petroleum bulk storage (PBS) tanks were historically onsite while the property was leased to Gulf Oil Corporation. The tanks included two (2) 20,000-gallon petroleum aboveground storage tanks (ASTs), one (1) 12,000-gallon petroleum AST, one (1) 12,000-gallon solvent based liquid underground storage tank (UST), and one (1) 500-gallon heating oil UST. One (1) 1,000-gallon, presumed to be heating oil, UST was discovered and removed during a November 2001 site investigation.

NYSDEC Spill Numbers 96-06805 and 96-08496 were associated with the 500-gallon heating oil UST, associated with the former maintenance garage, and the 12,000-gallon solvent based liquid UST, located approximately 300 feet northeast of the current fire training tower. These spill numbers were closed on March 24, 2008 and November 11, 1997 after investigations, respectively.

Montgomery County currently has one (1) 275-gallon heating oil AST, located along the southeast corner of the classroom building, to provide heating needs as necessary.

SUBSURFACE INVESTIGATION

Air Monitoring

Air monitoring was conducted during all ground-intrusive work at the Site (April 14, 15, and 16, 2025) in accordance with the New York State Department of Health (NYSDOH) Generic Community Air Monitoring Plan (CAMP). One dedicated Dust Trak unit for dust monitoring and a photo-ionization detector (PID) to monitor organic vapor was positioned upwind with a second dedicated unit placed downwind at each boring location. No exceedances for volatiles or particulates were recorded.

Soil Boring and Monitoring Well Installation

Prior to the initiation of intrusive groundwork, an underground utility stake-out, via UDig NY, was completed at the Site to locate utilities in the areas where the subsurface assessment would take place.

LaBella provided oversight of drilling activities, performed soil headspace screening, soil classification, and both soil and groundwater sampling.

On April 14, 15, and 16, 2025, LaBella advanced soil borings (SB-1 through SB-9) utilizing a Geoprobe 7822DT and direct-push techniques to terminal depths ranging from 10 to 15 fbg, based on the encountered groundwater table. Each boring was hand-cleared to 5 ft fbg using a hand auger to confirm subsurface utilities were not encountered. The soil boring locations were chosen by NYSDEC to focus on the fire training concrete burn pad area and Site boundaries. Soil borings that were not converted to monitoring wells were backfilled with number 2 filtration sand and grouted to the surface. The soil boring locations are shown on **Figure 3**.

Overburden soil encountered during drilling activities consisted primarily of medium to fine sand with varying amounts of silt which typically increased in depth to the end of boring.

Screened soils did not exhibit any visual evidence of impacts. However, a slight petroleum odor was noted at SB-1 and SB-5 at intervals ranging from 0.5 fbg to 1.0 fbg and 5.0 fbg to 8 fbg, respectively.

Monitoring wells were installed by over-drilling the borehole utilizing 4 ¼" ID hollow stem augers. The assembly consisted of 2-inch PVC 0.010-inch slot screen set to straddle the water table and casing to grade. A #00 well sand filter pack was installed to fill the borehole annulus to approximately one (1) to two (2) feet above the screened interval. Bentonite chips were added atop the sand to seal the casing from surface water intrusion and subsequently hydrated with per- and polyfluoroalkyl substance (PFAS)-free water. Well sand was added as needed to the finish grade. Each well was finished within a flush mount road box.

Each newly installed groundwater monitoring well was developed on April 25, 2025, by using dedicated bailers to remove three (3) well volumes followed by peristaltic pump and YSI water quality meter. Water quality field parameters were collected in 5-minute intervals until stabilization of standard parameters (temperature, pH, conductivity, ORP, DO, and turbidity) was achieved. During well development activities, a petroleum odor was noted on the purge water from MW-1 and MW-5 and a sheen was observed on purge water from MW-5. Monitoring well specifications are presented below. Individual boring logs are attached. Monitoring well locations are depicted on the attached Figure 3.



Monitoring Well Specifications							
Well ID	Associated Soil Boring	Boring Depth (ft)	Well Diameter (in)	Screened Interval	Sand Packed Interval (ft)	Bentonite Seal (ft)	Observed DTW (ft)
MW-1	SB-1	15	2	15-5'	15-3'	3-1'	1.34
MW-2	SB-5	10	2	15-5'	15-3'	3-1'	4.28
MW-3	SB-7	15	2	15-5'	15-3'	3-1'	4.63
MW-4	SB-8	15	2	15-5'	15-3'	3-1'	2.08
MW-5	SB-9	15	2	15-5'	15-3'	3-1'	6.21
Notes: Depth to Water (DTW) was measured on April 28, 2025 from Top of Casing (TOC)							

Soil Sampling

Individual soil samples were visually classified and headspace screened with a PID. Soil samples from select boring locations were collected from the following intervals:

- 0" to 2 -inch, beneath vegetative cover,
- 2" to 12" below grade, and
- Air/water interface (water table) as observed in the borehole.

From the nine (9) soil borings, a total of 27 discrete subsurface soil samples were collected and transferred into laboratory supplied glassware. Samples were placed on ice in a cooler and transported under chain of custody protocol to Pace Analytical Services, LLC (Pace) in East Longmeadow, Massachusetts. The soil samples were analyzed for United States Environmental Protection Agency (USEPA) Method 1633 list of 40 PFAS compounds.

Additional samples collected included two equipment blanks, two MS/MSDs and two duplicates following quality control procedures. The attached boring logs reference the parent sample for the MS/MSD and duplicate samples.

Groundwater Sampling

Five (5) groundwater samples were collected from the groundwater monitoring wells on April 28, 2025. Samples were collected utilizing low-flow/low-stress sampling techniques with a peristaltic pump and associated HDPE and silicone tubing. Water quality field parameters (temperature, pH, conductivity, ORP, DO, and turbidity) were recorded during the well purging at five (5) minute intervals up to the sample time. A copy of the stabilization logs is attached. Samples were immediately placed on ice and transferred to Pace under chain of custody protocols. Groundwater samples were analyzed for PFAS compounds using modified USEPA Method 1633.

Petroleum odors and sheens were detected on purge water from MW-1 and MW-2 during the sampling event.

Additional samples collected for quality control included an MS/MSD, Field Duplicate, and Equipment Blank. Monitoring well MW-3 was the parent sample for the MS/MSD. The duplicate parent was monitoring well MW-4. The Equipment Blank samples were performed on HDPE tubing associated with the peristaltic pump.

Sediment Sampling

One (1) sediment sample was collected from the western bank of the on-Site pond on April 15, 2025 using a stainless-steel trowel. The sample was immediately placed on ice, transferred to Pace under



chain of custody protocols, and analyzed for PFAS using USEPA Method 1633. No visual or olfactory evidence of impacts were observed during the collection of the sediment sample.

Surface Water Sampling

One (1) surface water sample was collected from the western bank of the on-Site pond on April 15, 2025 using a stainless-steel cup. The sample was placed on ice in a cooler, transferred to Pace under chain of custody protocols, and analyzed for PFAS using USEPA Method 1633. No visual or olfactory evidence of impacts were observed during the collection of the surface water sample.

Additional samples collected for quality control included an MS/MSD and Field Duplicate.

Monitoring Well Gauging and Groundwater Flow Direction

A limited site survey was completed by LaBella on August 20, 2025 to determine relative elevations of the groundwater monitoring well casings.

Depth to groundwater was measured from the top of casing (TOC) during well development and sampling activities on April 28, 2025. Measurements were collected using an electronic oil/water interface probe graduated in 0.01-foot intervals.

Gauging data is presented on Table 1 and **Figure 4**. Depth to water ranged from 1.34 feet below top of casing (ft BTOC) at monitoring well MW-1 to 6.21 ft BTOC at MW-5. The average depth to water was 3.71 ft BTOC. Based on the monitoring well gauging data, the groundwater flow beneath the Site was generally to the west northwest during the groundwater sampling event on April 28, 2025.

DISCUSSION OF ANALYTICAL RESULTS

Standards, Criteria, and Guidance Values

The following documents were used to evaluate the soil, groundwater, and surface water analytical results:

Soil:

Unrestricted Use and Residential Use soil guidance values from NYSDEC Sampling, Analysis, and Assessment of PFAS Under NYSDEC's Part 375 Remedial Programs, April 2023.

Groundwater and Surface Water:

Screening levels identified in NYSDEC Sampling, Analysis, and Assessment of PFAS Under NYSDEC's Part 375 Remedial Programs, April 2023.

Soil Results

Of the 27 soil samples submitted for analysis, 25 sampled intervals across nine (9) locations had one or more PFAS compounds detected.

PFOA was detected at 20 intervals across each of the nine borings ranging in concentrations from 0.08 µg/kg to 0.61 µg/kg and were below the Unrestricted Use guidance value. PFOA was detected slightly above the Unrestricted Use guidance values but below the Commercial Use guidance value at four (4) intervals across three (3) borings ranging in concentrations from 0.71 µg/kg to 2.3 µg/kg.

PFOS was detected at 12 intervals across six (6) borings ranging in concentrations from 0.08 µg/kg to 0.83 µg/kg and were below the Unrestricted Use guidance value. PFOS was detected above the Unrestricted Use guidance values but below the Commercial Use guidance value at 12 intervals across five (5) borings ranging in concentrations from 1.2 µg/kg to 190 µg/kg.

PFAS compounds that were detected but do not have corresponding guidance values include: 8:2FTS, 6:2FTS, PFDS, PFHpS, FOSA, PFDA, PFDoDS, PFDoA, PFHpA, PFHxS, PFHxA, PFBA, PFNS, PFNA, PFPeS, PDPeA, PFTA, PFTTrDA, and PFUnA. Refer to **Table 2** and **Figure 5** for additional details.

Groundwater Results

Each of the five (5) monitoring wells had one or more PFAS compounds detected.

PFOA was detected at one (1) monitoring well below the NYSDEC Guidelines at a concentration of 0.44 ng/L. PFOA was detected above the NYSDEC Guidelines at three (3) monitoring wells ranging from 11 ng/L to 140 ng/L.

PFOS was detected at three (3) monitoring wells below the NYSDEC Guidelines at concentrations ranging from 0.47 ng/L to 1.2 ng/L. PFOS was detected above the NYSDEC Guidelines at two (2) monitoring wells ranging from 44 ng/L to 1,100 ng/L.

PFAS compounds that were detected but do not have corresponding guidance values include: 8:2FTS, 6:2FTS, PFHpS, FOSA, PFBS, PFDA, PFHpA, PFHxS, PFHxA, PFBA, PFNA, PFPeS, and PDPeA. Refer to **Table 3** and **Figure 6** for additional details.

Sediment Results

PFOA and PFOS were detected in the sediment sample at 0.13 µg/kg and 0.81 µg/kg, respectively.

PFDA, PFNA, and PFUnA were also detected in the sediment sample at concentrations ranging from 0.14 µg/kg to 0.21 µg/kg. Refer to **Table 4** and **Figure 7** for additional details.

Surface Water Results

PFOA was detected below the NYSDEC Guidelines at a concentration of 1.5 ng/L. PFOS was detected above the NYSDEC Guidelines at a concentration of 16 ng/L.

PFAS compounds that were detected but do not have corresponding guidance values include: PFBS, PFHpA, PFHxS, PFHxA, PFBA, PFNA, and PFPeS. Refer to **Table 5** and **Figure 8** for additional details.

RECOMMENDATIONS

Based on the information gathered from this limited subsurface investigation, additional investigation is warranted to understand the potential sources of impact. LaBella recommends routine monitoring and sampling of onsite wells and the collection of a drinking water well sample from the Site building. Additional subsurface sampling of adjacent downgradient properties may be justified to confirm if impacts from the Site have extended offsite.

Sincerely,
LaBella Associates, D.P.C.



Sierra Vaverchak
Environmental Geologist

Attachments

Figures

Tables

Boring Logs

Well Development Logs

Low Flow Stabilization Sampling Logs

Laboratory Analytical Reports





FIGURES

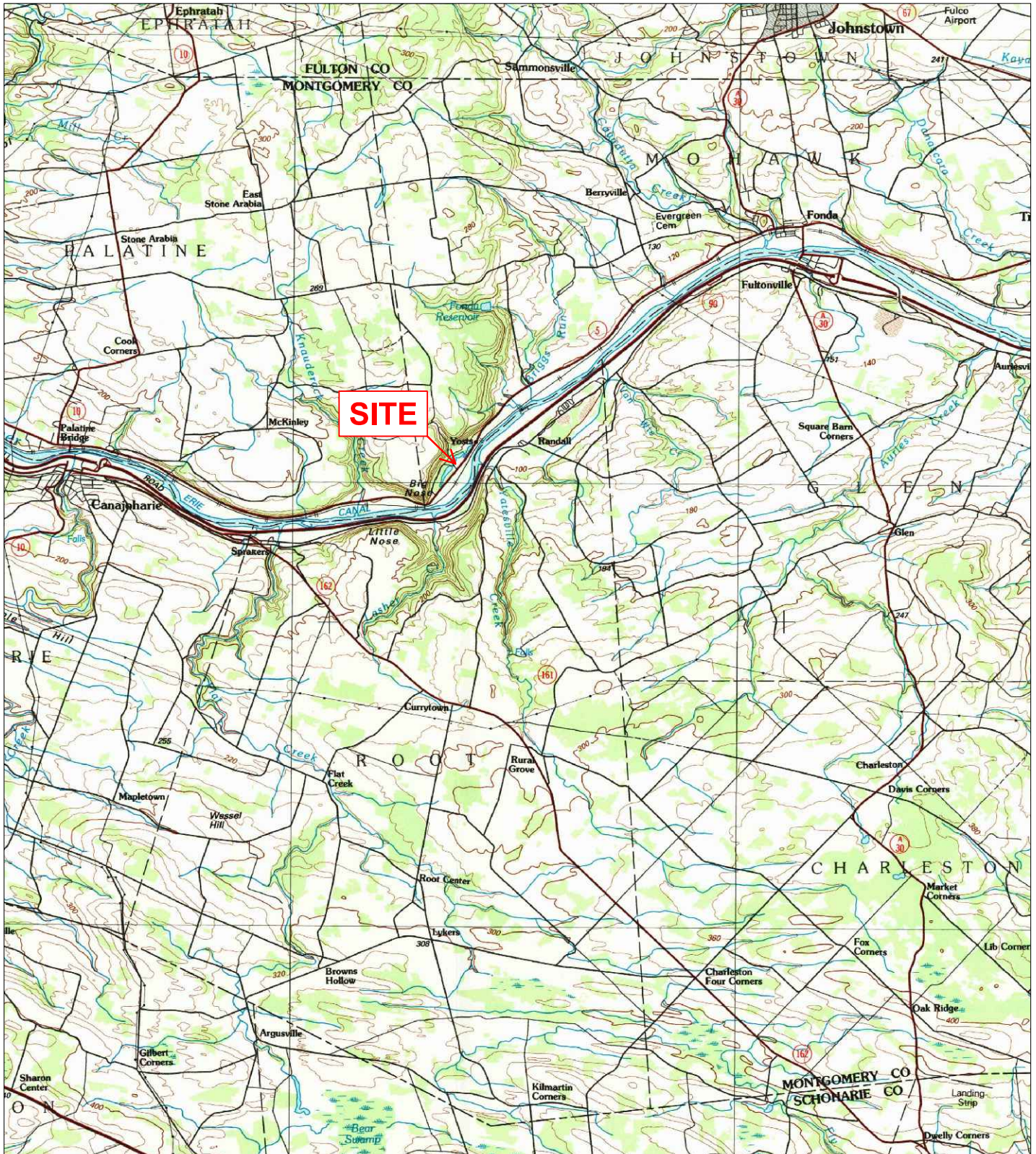


FIGURE 1 Site Location Map

Richard L. Hanson Fire Training Center
4610 NYS Route 5, Mohawk, NY
Montgomery County
NYSDEC Site # B00138

Date: April 2025

Not To Scale



FIGURE 2 Site Features Map

Richard L. Hanson Fire Training Center
4610 NYS Route 5, Mohawk, NY
Montgomery County
NYSDEC Site # B00138

Date: April 2025

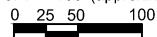
Not To Scale



FIGURE 3 Sampling Location Map

Date: April 2025

Scale: 1" = 100' (approximate)



**Richard L. Hanson
Fire Training Center
4610 NYS Route 5, Mohawk, NY
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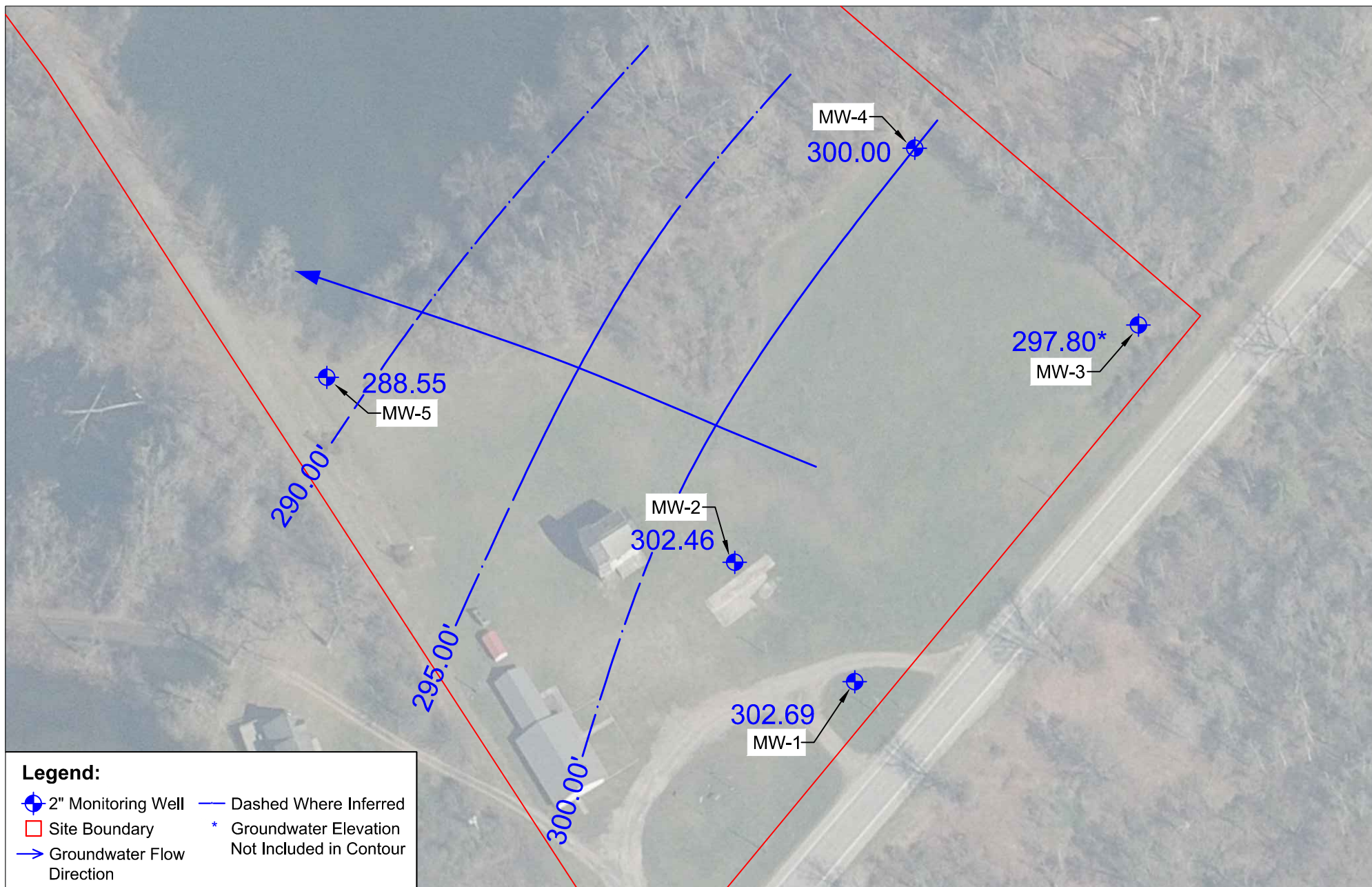
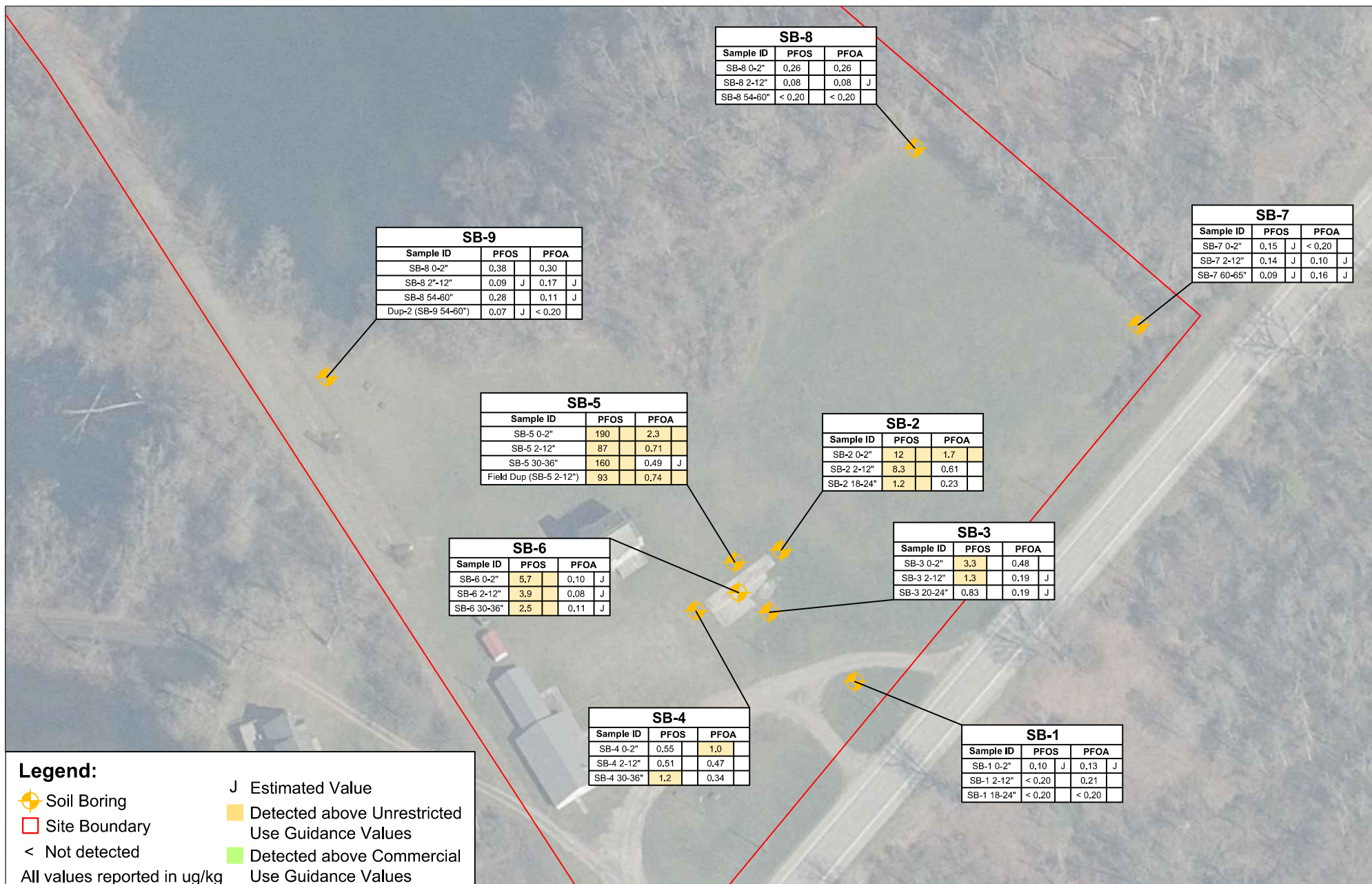


FIGURE 4 Groundwater Contour Map

Date: April 28, 2025

Scale: 1" = 100' (approximate)
0 25 50 100

Richard L. Hanson
Fire Training Center
4610 NYS Route 5, Mohawk, NY
Montgomery County
NYSDEC Site # B00138



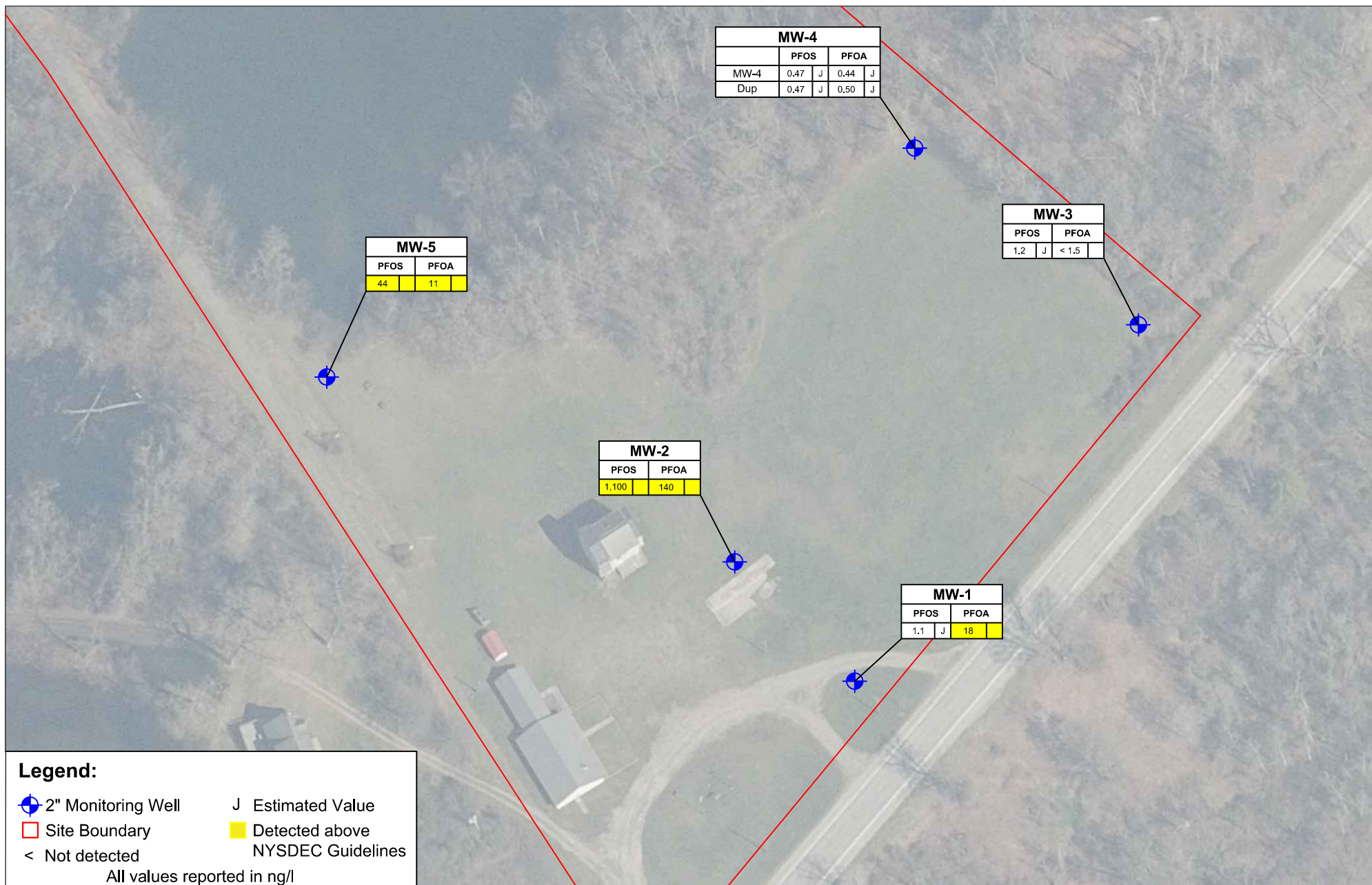
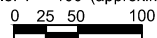


FIGURE 6 Groundwater PFOA & PFOS Results

Date: April 28, 2025

Scale: 1" = 100' (approximate)



Richard L. Hanson
Fire Training Center
4610 NYS Route 5, Mohawk, NY
Montgomery County
NYSDEC Site # B00138



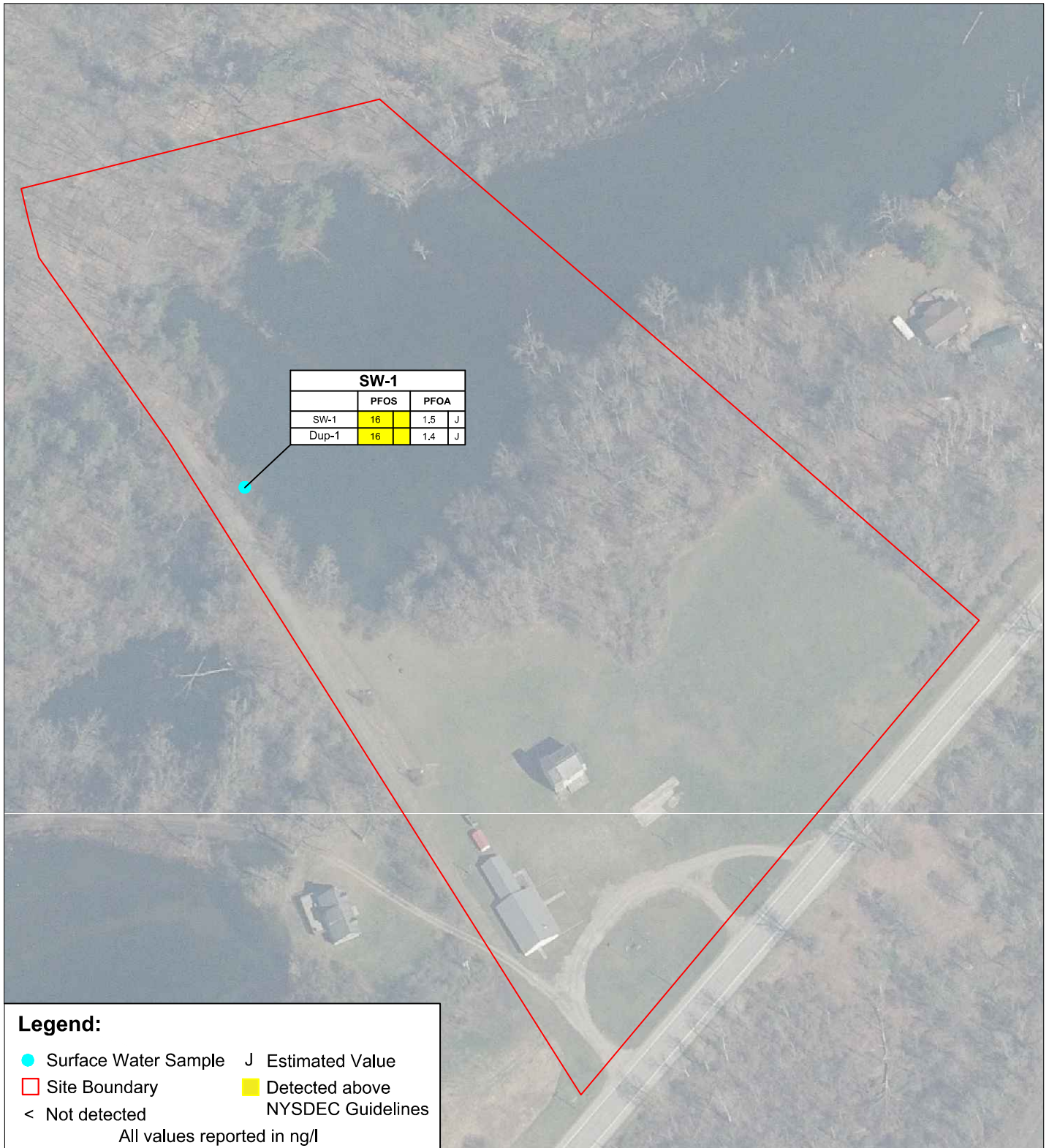
FIGURE 7

Sediment PFOA & PFOS Results

Richard L. Hanson Fire Training Center
4610 NYS Route 5, Mohawk, NY
Montgomery County
NYSDEC Site # B00138

Date: April 15, 2025

Scale: 1" = 150' (approximate)
0 75 150



Legend:

- Surface Water Sample
 - Site Boundary
 - J Estimated Value
 - Detected above NYSDEC Guidelines
 - < Not detected
- All values reported in ng/l



FIGURE 8
Surface Water PFOA & PFOS Results

Richard L. Hanson Fire Training Center
4610 NYS Route 5, Mohawk, NY
Montgomery County
NYSDEC Site # B00138

Date: April 15, 2025

Scale: 1" = 150' (approximate)
0 75 150



TABLES

Table 1
Richard L. Hanson Fire Training Center
4610 New York State Route 5, Mohawk, New York
Groundwater Elevation Data
NYSDEC Site No. B00138

MONITORING WELL ID		MW-1	MW-2	MW-3	MW-4	MW-5
TOP OF CASING (ft)		304.03	306.74	302.43	302.08	294.76
BOTTOM OF MONITORING WELL (ft)		14.27	14.11	14.42	14.09	13.74
GAUGING DATE	DATA	GROUNDWATER ELEVATIONS				
4/25/2025	GW Elevation	302.55	302.02	299.90	295.89	290.42
	DTW	1.48	4.72	2.53	6.19	4.34
4/28/2025	GW Elevation	302.69	302.46	297.80	300.00	288.55
	DTW	1.34	4.28	4.63	2.08	6.21

Notes:

GW Elev = Groundwater Elevation (ft.)

DTW = Depth to water (ft.)

Table 2
Richard L. Hanson Fire Training Center
4610 New York State Route 5, Mohawk, New York
Soil Laboratory Analytical Summary - Emergent Contaminants
NYSDEC Site No. B00138

Sample ID	Unrestricted Use Guidance Value ¹	Commercial Use Guidance Value ¹	SB-1			SB-2			SB-3		
Laboratory Samples ID			25D1389-01	25D1389-02	25D1389-03	25D1389-04	25D1389-05	25D1389-06	25D1389-07	25D1389-08	25D1389-09
Sample Depth (ft bgs)			0-2"	2-12"	18-24"	0-2"	2-12"	18-24"	0-2"	2-12"	20-24"
Sample Date			4/14/2025			4/14/2025			4/14/2025		
PFAS											
11Cl-PF30UdS	NC	NC	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40
1H,1H,2H,2H-Perfluorodecanesulfonic acid (8:2FTS)	NC	NC	< 0.80	< 0.79	< 0.79	< 0.79	< 0.80	< 0.80	< 0.79	< 0.80	< 0.79
1H,1H,2H,2H-Perfluorohexanesulfonic Acid (4:2FTS)	NC	NC	< 0.80	< 0.79	< 0.79	< 0.79	< 0.80	< 0.80	< 0.79	< 0.80	< 0.79
1H,1H,2H,2H-Perfluorooctanesulfonic acid (6:2FTS)	NC	NC	< 0.80	< 0.79	< 0.79	< 0.79	< 0.80	< 0.80	< 0.79	< 0.80	< 0.79
3:3FTCA	NC	NC	< 1.0	< 0.99	< 0.99	< 0.99	< 1.0	< 1.0	< 0.99	< 1.0	< 0.99
5:3FTCA	NC	NC	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
7:3FTCA	NC	NC	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
9Cl-PF3ONS	NC	NC	< 0.80	< 0.79	< 0.79	< 0.79	< 0.80	< 0.80	< 0.79	< 0.80	< 0.79
ADONA	NC	NC	< 0.80	< 0.79	< 0.79	< 0.79	< 0.80	< 0.80	< 0.79	< 0.80	< 0.79
HFPO-DA	NC	NC	< 0.80	< 0.79	< 0.79	< 0.79	< 0.80	< 0.80	< 0.79	< 0.80	< 0.79
NEtFOSA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
NEtFOSAA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
NEtFOSE	NC	NC	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
NFDHA	NC	NC	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40
NMeFOSA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
NMeFOSAA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
NMeFOSE	NC	NC	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Perfluoro-1-decanesulfonic acid (PFDS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluoro-1-heptanesulfonic acid (PFHpS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluoro-1-octanesulfonamide (FOSA)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorobutanesulfonic acid (PFBS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorodecanoic acid (PFDA)	NC	NC	< 0.20	< 0.20	< 0.20	0.96	0.47	< 0.20	1.2	0.45	0.16 J
Perfluorododecane Sulfonic Acid (PFDoDS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorododecanoic acid (PFDoA)	NC	NC	< 0.20	< 0.20	< 0.20	0.14 J	< 0.20	< 0.20	0.30	< 0.20	< 0.20
Perfluoroheptanoic acid (PFHpA)	NC	NC	< 0.20	< 0.20	< 0.20	0.86	0.41	0.12 J	0.22	0.13 J	0.14 J
Perfluorohexanesulfonic Acid (PFHxS)	NC	NC	< 0.20	< 0.20	< 0.20	0.20	0.11 J	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorohexanoic acid (PFHxA)	NC	NC	< 0.20	< 0.20	< 0.20	0.46	0.23	0.11 J	0.15 J	0.08 J	0.10 J
Perfluoro-n-butanoic acid (PFBA)	NC	NC	< 0.80	< 0.79	< 0.79	0.60 J	< 0.80	< 0.80	< 0.79	< 0.80	< 0.79
Perfluorononanesulfonic Acid (PFNS)	NC	NC	< 0.20	< 0.20	< 0.20	0.05 J	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorononanoic acid (PFNA)	NC	NC	< 0.20	< 0.20	< 0.20	1.3	0.72	0.15 J	0.58	0.28	0.55
Perfluorooctanesulfonic Acid (PFOS)	0.88	440	0.10 J	< 0.20	< 0.20	12	8.3	1.2	3.3	1.3	0.83
Perfluorooctanoic acid (PFOA)	0.66	500	0.13 J	0.21	< 0.20	1.7	0.61	0.23	0.48	0.19 J	0.19 J
Perfluoropentanesulfonic Acid (PFPeS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluoropentanoic acid (PFPeA)	NC	NC	< 0.40	< 0.40	< 0.40	0.78	0.46	0.16 J	0.16 J	< 0.40	0.14 J
Perfluorotetradecanoic acid (PFTA)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorotridecanoic acid (PFTTrDA)	NC	NC	< 0.20	< 0.20	< 0.20	0.07 J	< 0.20	< 0.20	0.12 J	< 0.20	< 0.20
Perfluoroundecanoic acid (PFUnA)	NC	NC	< 0.20	< 0.20	< 0.20	0.63	0.13 J	< 0.20	1.0	0.17 J	< 0.20
PFEESA	NC	NC	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40
PFMBA	NC	NC	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40
PFMPA	NC	NC	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40
Total:			0.23 J	0.21	< 0.20	20 J	11 J	1.97 J	7.51 J	2.60 J	2.11

NOTES:

¹New York State Department of Environmental Conservation, Sampling, Analysis, and Assessment of Per- and Polyfluoroalkyl Substances (PFAS), April 2023

PFAS values displayed in microgram per kilogram (µg/kg) or parts per billion (ppb)

NC - No criteria currently exists

c - Indicates compound was not detected above the indicated laboratory method detection limit (MDL)

J indicates an estimated value

Bold - Indicates the compound was detected

Highlighted - Indicates the compound was detected above Unrestricted Use guidance value

Highlighted - Indicates the compound was detected above Commercial Use guidance value

Table 2
Richard L. Hanson Fire Training Center
4610 New York State Route 5, Mohawk, New York
Soil Laboratory Analytical Summary - Emergent Contaminants
NYSDEC Site No. B00138

Sample ID	Unrestricted Use Guidance Value ¹	Commercial Use Guidance Value ¹	SB-4			SB-5			Field Dup	SB-6		
Laboratory Samples ID			25D1389-10	25D1389-11	25D1389-12	25D1389-13	25D1389-14	25D1389-15	25D1389-22	25D1372-04	25D1372-05	25D1372-06
Sample Depth (ft bgs)			0-2"	2-12"	30-36"	0-2"	2-12"	30-36"	2-12"	0-2"	2-12"	30-36"
Sample Date			4/14/2025			4/14/2025			4/14/2025	4/15/2025		
PFAS												
11CI-PF30UdS	NC	NC	< 0.40	< 0.40	< 0.40	< 1.9	< 0.80	< 1.9	< 0.79	< 0.80	< 0.79	< 0.80
1H,1H,2H,2H-Perfluorodecanesulfonic acid (8:2FTS)	NC	NC	0.73 J	< 0.80	< 0.79	7.7	< 1.6	< 3.8	< 0.79	9.2	1.1	< 0.80
1H,1H,2H,2H-Perfluorohexanesulfonic Acid (4:2FTS)	NC	NC	< 0.80	< 0.80	< 0.79	< 3.7	< 1.6	< 3.8	< 0.79	< 0.80	< 0.79	< 0.80
1H,1H,2H,2H-Perfluorooctanesulfonic acid (6:2FTS)	NC	NC	< 0.80	< 0.80	< 0.79	4.7	< 1.6	< 3.8	< 0.79	0.68	< 0.79	< 0.80
3:3FTCA	NC	NC	< 1.0	< 0.99	< 0.99	< 4.7	< 2.0	< 4.8	< 0.99	< 1.0	< 0.99	< 1.0
5:3FTCA	NC	NC	< 5.0	< 5.0	< 5.0	< 23	< 10	< 24	< 5.0	< 5.0	< 5.0	< 5.0
7:3FTCA	NC	NC	< 5.0	< 5.0	< 5.0	< 23	< 10	< 24	< 5.0	< 5.0	< 5.0	< 5.0
9CI-PF3ONS	NC	NC	< 0.80	< 0.80	< 0.79	< 3.7	< 1.6	< 3.8	< 0.79	< 0.80	< 0.79	< 0.80
ADONA	NC	NC	< 0.80	< 0.80	< 0.79	< 3.7	< 1.6	< 3.8	< 0.79	< 0.80	< 0.79	< 0.80
HFPO-DA	NC	NC	< 0.80	< 0.80	< 0.79	< 3.7	< 1.6	< 3.8	< 0.79	< 0.80	< 0.79	< 0.80
NEtFOSA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.90	< 0.40	< 0.96	< 2.0	< 0.20	< 0.20	< 0.20
NEtFOSAA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.90	< 0.40	< 0.96	< 0.20	< 0.20	< 0.20	< 0.20
NEtFOSE	NC	NC	< 2.0	< 2.0	< 2.0	< 9.3	< 4.0	< 9.6	< 0.20	< 2.0	< 2.0	< 2.0
NFDHA	NC	NC	< 0.40	< 0.40	< 0.40	< 1.9	< 0.80	< 1.9	< 0.40	< 0.40	< 0.40	< 0.40
NMeFOSA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.93	< 0.40	< 0.96	< 2.0	< 0.20	< 0.20	< 0.20
NMeFOSAA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.93	< 0.40	< 0.96	< 0.20	< 0.20	< 0.20	< 0.20
NMeFOSE	NC	NC	< 2.0	< 2.0	< 2.0	< 9.3	< 4.0	< 9.6	< 0.20	< 2.0	< 2.0	< 2.0
Perfluoro-1-decanesulfonic acid (PFDS)	NC	NC	< 0.20	< 0.20	< 0.20	1.5	0.17 J	< 0.96	0.15 J	0.16	< 0.20	< 0.20
Perfluoro-1-heptanesulfonic acid (PFHpS)	NC	NC	< 0.20	< 0.20	< 0.20	0.77 J	0.39 J	< 0.96	0.35	< 0.20	< 0.20	< 0.20
Perfluoro-1-octanesulfonamide (FOSA)	NC	NC	< 0.20	< 0.20	< 0.20	1.5	0.22 J	< 0.96	0.23	1.7	0.20	0.10 J
Perfluorobutanesulfonic acid (PFBS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.93	< 0.40	< 0.96	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorodecanoic acid (PFDA)	NC	NC	3.3	2.1	1.4	4.8	4.0	1.6	3.7	0.35	0.22	< 0.20
Perfluorododecane Sulfonic Acid (PFDoDS)	NC	NC	< 0.20	< 0.20	< 0.20	0.5 J	< 0.40	< 0.96	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorododecanoic acid (PFDoA)	NC	NC	0.41	0.08 J	< 0.20	2.60	0.23 J	< 0.96	0.20	0.44	< 0.20	0.08
Perfluoroheptanoic acid (PFHpA)	NC	NC	0.69	0.37	0.21	1.2	0.39 J	< 0.96	0.39	< 0.20	< 0.20	0.12
Perfluorohexanesulfonic Acid (PFHxS)	NC	NC	< 0.20	< 0.20	< 0.20	7.9	1.9	1.9	1.8	0.19 J	0.23	0.25
Perfluorohexanoic acid (PFHxA)	NC	NC	0.34	0.17 J	0.10 J	1.1	0.40	< 0.96	0.37	0.09 J	< 0.20	< 0.20
Perfluoro-n-butanoic acid (PFBA)	NC	NC	0.31 J	< 0.80	< 0.79	< 3.7	< 1.6	< 3.8	< 0.79	< 0.80	< 0.79	< 0.80
Perfluorononanesulfonic Acid (PFNS)	NC	NC	< 0.20	< 0.20	< 0.20	2.8	0.55	< 0.96	0.53	0.26	0.18 J	0.06 J
Perfluorononanoic acid (PFNA)	NC	NC	1.1	0.69	0.81	1.9	1.1	0.72 J	1.1	0.19 J	0.11 J	0.08 J
Perfluorooctanesulfonic Acid (PFOS)	0.88	440	0.55	0.51	1.2	190	87	160	93	5.7	3.9	2.5
Perfluorooctanoic acid (PFOA)	0.66	500	1.0	0.47	0.34	2.3	0.71	0.49 J	0.74	0.10 J	0.08 J	0.11 J
Perfluoropentanesulfonic Acid (PFPeS)	NC	NC	< 0.20	< 0.20	< 0.20	0.70 J	< 0.40	< 0.96	0.10 J	< 0.20	< 0.20	< 0.20
Perfluoropentanoic acid (PFPeA)	NC	NC	0.54	0.52	0.16 J	1.2 J	0.73 J	< 1.9	0.72	< 0.40	< 0.40	< 0.40
Perfluorotetradecanoic acid (PFTA)	NC	NC	< 0.20	< 0.20	< 0.20	0.50 J	< 0.40	< 0.96	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorotridecanoic acid (PFTDA)	NC	NC	0.10 J	< 0.20	< 0.20	0.90 J	< 0.40	< 0.96	< 0.20	0.15 J	< 0.20	< 0.20
Perfluoroundecanoic acid (PFUnA)	NC	NC	1.9	0.38	0.09 J	6.4	0.72	< 0.96	0.66	0.74	0.41	0.10 J
PFEESA	NC	NC	< 0.40	< 0.40	< 0.40	< 1.9	< 0.80	< 1.9	< 0.40	< 0.40	< 0.40	< 0.40
PFMBA	NC	NC	< 0.40	< 0.40	< 0.40	< 1.9	< 0.80	< 1.9	< 0.40	< 0.40	< 0.40	< 0.40
PFMPA	NC	NC	< 0.40	< 0.40	< 0.40	< 1.9	< 0.80	< 1.9	< 0.40	< 0.40	< 0.40	< 0.40
		Total:	11 J	5.29 J	4.31 J	241 J	99 J	165 J	104	20 J	6.43 J	3.40

NOTES:

¹New York State Department of Environmental Conservation, Sampling, Analysis, and Assessment of Per- and Polyfluoroalkyl Substances (PFAS), April 2023

PFAS values displayed in microgram per kilogram (µg/kg) or parts per billion (ppb)

NC - No criteria currently exists

"<" - Indicates compound was not detected above the indicated laboratory method detection limit (MDL)

J indicates an estimated value

Bold - Indicates the compound was detected

Highlighted - Indicates the compound was detected above Unrestricted Use guidance value

Highlighted - Indicates the compound was detected above Commercial Use guidance value

Table 2
Richard L. Hanson Fire Training Center
4610 New York State Route 5, Mohawk, New York
Soil Laboratory Analytical Summary - Emergent Contaminants
NYSDEC Site No. B00138

Sample ID	Unrestricted Use Guidance Value ¹	Commercial Use Guidance Value ¹	SB-7			SB-8			SB-9			DUP-2
Laboratory Samples ID			25D1389-16	25D1389-17	25D1389-18	25D1389-19	25D1389-20	25D1389-21	25D1372-01	25D1372-02	25D1372-03	25D1372-07
Sample Depth (ft bgs)			0-2"	2-12"	60-65"	0-2"	2-12"	54-60"	0-2"	2-12"	54-60"	54-60"
Sample Date			4/14/2025			4/14/2025			4/15/2025			4/15/2025
PFAS												
11CI-PF30UdS	NC	NC	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.80	< 0.79	< 0.80	< 0.80
1H,1H,2H,2H-Perfluorodecanesulfonic acid (8:2FTS)	NC	NC	< 0.80	< 0.79	< 0.79	< 0.80	< 0.80	< 0.80	< 0.80	< 0.79	< 0.80	< 0.80
1H,1H,2H,2H-Perfluorohexanesulfonic Acid (4:2FTS)	NC	NC	< 0.80	< 0.79	< 0.79	< 0.80	< 0.80	< 0.80	< 0.80	< 0.79	< 0.80	< 0.80
1H,1H,2H,2H-Perfluorooctanesulfonic acid (6:2FTS)	NC	NC	< 0.80	< 0.79	< 0.79	< 0.80	< 0.80	< 0.80	< 0.80	< 0.79	< 0.80	< 0.80
3:3FTCA	NC	NC	< 1.0	< 0.99	< 0.99	< 1.0	< 1.0	< 1.0	< 0.99	< 0.98	< 1.0	< 1.0
5:3FTCA	NC	NC	< 5.0	< 5.0	< 4.9	< 5.0	< 5.0	< 5.0	< 5.0	< 4.9	< 5.0	< 5.0
7:3FTCA	NC	NC	< 5.0	< 5.0	< 4.9	< 5.0	< 5.0	< 5.0	< 5.0	< 4.9	< 5.0	< 5.0
9CI-PF3ONS	NC	NC	< 0.80	< 0.79	< 0.79	< 0.80	< 0.80	< 0.80	< 0.80	< 0.79	< 0.80	< 0.80
ADONA	NC	NC	< 0.80	< 0.79	< 0.79	< 0.80	< 0.80	< 0.80	< 0.80	< 0.79	< 0.80	< 0.80
HFPO-DA	NC	NC	< 0.80	< 0.79	< 0.79	< 0.80	< 0.80	< 0.80	< 0.80	< 0.79	< 0.80	< 0.80
NEtFOSA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
NEtFOSAA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
NEtFOSE	NC	NC	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
NFDHA	NC	NC	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.39	< 0.40	< 0.40
NMeFOSA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 2.0
NMeFOSAA	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
NMeFOSE	NC	NC	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 0.20
Perfluoro-1-decanesulfonic acid (PFDS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluoro-1-heptanesulfonic acid (PFHpS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluoro-1-octanesulfonamide (FOSA)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorobutanesulfonic acid (PFBS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorodecanoic acid (PFDA)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	0.11 J	< 0.20	< 0.20	< 0.20
Perfluorododecane Sulfonic Acid (PFDoDS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorododecanoic acid (PFDoA)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluoroheptanoic acid (PFHpA)	NC	NC	< 0.20	< 0.20	< 0.20	0.11 J	< 0.20	< 0.20	0.11	0.09	< 0.20	< 0.20
Perfluorohexanesulfonic Acid (PFHxS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	0.10 J	0.09 J
Perfluorohexanoic acid (PFHxA)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	0.08 J	< 0.20	< 0.20
Perfluoro-n-butanoic acid (PFBA)	NC	NC	< 0.80	< 0.79	< 0.79	< 0.80	< 0.80	< 0.80	< 0.80	< 0.79	< 0.80	< 0.80
Perfluorononanesulfonic Acid (PFNS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorononanoic acid (PFNA)	NC	NC	< 0.20	< 0.20	< 0.20	0.19 J	< 0.20	< 0.20	0.40	< 0.20	< 0.20	< 0.20
Perfluorooctanesulfonic Acid (PFOS)	0.88	440	0.15 J	0.14 J	0.09 J	0.26	0.08	< 0.20	0.38	0.09 J	0.28	0.07 J
Perfluorooctanoic acid (PFOA)	0.66	500	< 0.20	0.10 J	0.16 J	0.26	0.08 J	< 0.20	0.30	0.17 J	0.11 J	< 0.20
Perfluoropentanesulfonic Acid (PFPeS)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluoropentanoic acid (PFPeA)	NC	NC	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.39	< 0.40	< 0.40
Perfluorotetradecanoic acid (PFTA)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluorotridecanoic acid (PFTDA)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20
Perfluoroundecanoic acid (PFUnA)	NC	NC	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	< 0.20	0.12 J	< 0.20	< 0.20	< 0.20
PFEESA	NC	NC	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.39	< 0.40	< 0.40
PFMBA	NC	NC	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.39	< 0.40	< 0.40
PFMPA	NC	NC	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.40	< 0.39	< 0.40	< 0.40
		Total:	0.15 J	0.24 J	0.25 J	0.82 J	0.17 J	< 0.20	1.42 J	0.44 J	0.49 J	0.15

NOTES:

¹New York State Department of Environmental Conservation, Sampling, Analysis, and Assessment of Per- and Polyfluoroalkyl Substances (PFAS), April 2023

PFAS values displayed in microgram per kilogram (µg/kg) or parts per billion (ppb)

NC - No criteria currently exists

*< - Indicates compound was not detected above the indicated laboratory method detection limit (MDL)

J indicates an estimated value

Bold - Indicates the compound was detected

Highlighted - Indicates the compound was detected above Unrestricted Use guidance value

Highlighted - Indicates the compound was detected above Commercial Use guidance value

Table 3
Richard L. Hanson Fire Training Center
4610 New York State Route 5, Mohawk, New York
Groundwater Laboratory Analytical Summary - Emergent Contaminants
NYSDEC Site No. B00138

Sample ID	NYSDEC Guidelines ¹	MW-1		MW-2		MW-3		MW-4		Dup		MW-5	
		Monitoring Wells											
		25E0264-01		25E0264-02		25E0264-03		25E0264-04		25E0264-06		25E0264-05	
		Sample Date		4/28/2025		4/28/2025		4/28/2025		4/28/2025		4/28/2025	
PFAS													
11CI-PF30UdS	NC	< 5.8		< 22		< 5.8		< 5.7		< 5.6		< 7.0	
1H,1H,2H,2H-Perfluorodecanesulfonic acid (8:2FTS)	NC	< 5.8		73		< 5.8		< 5.7		< 5.6		< 7.0	
1H,1H,2H,2H-Perfluorohexanesulfonic Acid (4:2FTS)	NC	< 5.8		< 22		< 5.8		< 5.7		< 5.6		< 7.0	
1H,1H,2H,2H-Perfluorooctanesulfonic acid (6:2FTS)	NC	4.6	J	66		< 5.8		< 5.7		< 5.6		< 7.0	
3:3FTCA	NC	< 7.3		< 28		< 7.3		< 7.1		< 7.0		< 8.7	
5:3FTCA	NC	< 36		< 140		< 36		< 36		< 35		< 44	
7:3FTCA	NC	< 36		< 140		< 36		< 36		< 35		< 44	
9CI-PF3ONS	NC	< 5.8		< 22		< 5.8		< 5.7		< 5.6		< 7.0	
ADONA	NC	< 5.8		< 22		< 5.8		< 5.7		< 5.6		< 7.0	
HFPO-DA	NC	< 5.8		< 22		< 5.8		< 5.7		< 5.6		< 7.0	
NEtFOSA	NC	< 1.5		< 5.6		< 1.5		< 1.4		< 1.4		< 1.7	
NEtFOSAA	NC	< 1.5		< 5.6		< 1.5		< 1.4		< 1.4		< 1.7	
NEtFOSE	NC	< 15		< 56		< 15		< 14		< 14		< 17	
NFDHA	NC	< 2.9		< 11		< 2.9		< 2.9		< 2.8		< 3.5	
NMeFOSA	NC	< 1.5		< 5.6		< 1.5		< 1.4		< 1.4		< 1.7	
NMeFOSAA	NC	< 1.5		< 5.6		< 1.5		< 1.4		< 1.4		< 1.7	
NMeFOSE	NC	< 15		< 56		< 15		< 14		< 14		< 17	
Perfluoro-1-decanesulfonic acid (PFDS)	NC	< 1.5		< 5.6		< 1.5		< 1.4		< 1.4		< 1.7	
Perfluoro-1-heptanesulfonic acid (PFHpS)	NC	< 1.5		6.8		< 1.5		< 1.4		< 1.4		1.2	J
Perfluoro-1-octanesulfonamide (FOSA)	NC	< 1.5		4.8	J	< 1.5		< 1.4		< 1.4		< 1.7	
Perfluorobutanesulfonic acid (PFBS)	NC	2.4		16		< 1.5		< 1.4		< 1.4		3.7	
Perfluorodecanoic acid (PFDA)	NC	< 1.5		10		< 1.5		< 1.4		< 1.4		< 1.7	
Perfluorododecane Sulfonic Acid (PFDoDS)	NC	< 1.5		< 5.6		< 1.5		< 1.4		< 1.4		< 1.7	
Perfluorododecanoic acid (PFDoA)	NC	< 1.5		< 5.6		< 1.5		< 1.4		< 1.4		< 1.7	
Perfluoroheptanoic acid (PFHpA)	NC	21		160		< 1.5		< 1.4		< 1.4		16	
Perfluorohexanesulfonic Acid (PFHxS)	NC	2.2		240		< 1.5		< 1.4		< 1.4		30	
Perfluorohexanoic acid (PFHxA)	NC	41		140		< 1.5		< 1.4		< 1.4		8.2	
Perfluoro-n-butanoic acid (PFBA)	NC	< 5.8		66		< 5.8		0.82	J	0.85	J	13	
Perfluorononanesulfonic Acid (PFNS)	NC	< 1.5		< 5.6		< 1.5		< 1.4		< 1.4		< 1.7	
Perfluorononanoic acid (PFNA)	NC	0.89	J	53		< 1.5		< 1.4		< 1.4		1.7	J
Perfluorooctanesulfonic Acid (PFOS)	10	1.1	J	1,100		1.2	J	0.47	J	0.47	J	44	
Perfluorooctanoic acid (PFOA)	10	18		140		< 1.5		0.44	J	0.50	J	11	
Perfluoropentanesulfonic Acid (PFPeS)	NC	< 1.5		28		< 1.5		< 1.4		< 1.4		4.2	
Perfluoropentanoic acid (PFPeA)	NC	120		200		< 2.9		< 2.9		< 2.8		5.0	
Perfluorotetradecanoic acid (PFTA) OR (PFTeDA)	NC	< 1.5		< 5.6		< 1.5		< 1.4		< 1.4		< 1.7	
Perfluorotridecanoic acid (PFTTrDA)	NC	< 1.5		< 5.6		< 1.5		< 1.4		< 1.4		< 1.7	
Perfluoroundecanoic acid (PFUnA)	NC	< 1.5		< 5.6		< 1.5		< 1.4		< 1.4		< 1.7	
PFEESA	NC	< 2.9		< 11		< 2.9		< 2.9		< 2.8		< 3.5	
PFMBA	NC	< 2.9		< 11		< 2.9		< 2.9		< 2.8		< 3.5	
PFMPA	NC	< 2.9		< 11		< 2.9		< 2.9		< 2.8		< 3.5	
Total:		211	J	2,304	J	1.20	J	1.73	J	1.82	J	138	J

NOTES:

¹New York State Department of Environmental Conservation, Sampling, Analysis, and Assessment of Per- and Polyfluoroalkyl Substances (PFAS), April 2023

PFAS values displayed in nanograms per grams (ng/l) or parts per trillion (ppt)

NC - No criteria currently exists

"<" - Indicates compound was not detected above the indicated laboratory method detection limit (MDL)

J indicates an estimated value

Bold - Indicates the compound was detected

Yellow highlight indicates that the compound was detected at a concentration above applicable NYSDEC Standards, Criteria, & Guidance Values

Table 4
Richard L. Hanson Fire Training Center
4610 New York State Route 5, Mohawk, New York
Sediment Laboratory Analytical Summary - Emergent Contaminants
NYSDEC Site No. B00138

Sample ID	Unrestricted Use Guidance Value ¹	Commercial Use Guidance Value ¹	SED-1	
Laboratory Samples ID			25D1372-09	
Sample Depth (ft bgs)			-	
Sample Date			4/15/2025	
PFAS				
11CI-PF30UdS	NC	NC	< 0.80	
1H,1H,2H,2H-Perfluorodecanesulfonic acid (8:2FTS)	NC	NC	< 0.80	
1H,1H,2H,2H-Perfluorohexanesulfonic Acid (4:2FTS)	NC	NC	< 0.80	
1H,1H,2H,2H-Perfluorooctanesulfonic acid (6:2FTS)	NC	NC	< 0.80	
3:3FTCA	NC	NC	< 0.99	
5:3FTCA	NC	NC	< 5.0	
7:3FTCA	NC	NC	< 5.0	
9CI-PF30NS	NC	NC	< 0.80	
ADONA	NC	NC	< 0.80	
HFPO-DA	NC	NC	< 0.80	
NEtFOSA	NC	NC	< 0.20	
NEtFOSAA	NC	NC	< 0.20	
NEtFOSE	NC	NC	< 2.0	
NFDHA	NC	NC	< 0.40	
NMeFOSA	NC	NC	< 0.20	
NMeFOSAA	NC	NC	< 0.20	
NMeFOSE	NC	NC	< 2.0	
Perfluoro-1-decanesulfonic acid (PFDS)	NC	NC	< 0.20	
Perfluoro-1-heptanesulfonic acid (PFHpS)	NC	NC	< 0.20	
Perfluoro-1-octanesulfonamide (FOSA)	NC	NC	< 0.20	
Perfluorobutanesulfonic acid (PFBS)	NC	NC	< 0.20	
Perfluorodecanoic acid (PFDA)	NC	NC	0.14 J	
Perfluorododecane Sulfonic Acid (PFDoDS)	NC	NC	< 0.20	
Perfluorododecanoic acid (PFDoA)	NC	NC	< 0.20	
Perfluoroheptanoic acid (PFHpA)	NC	NC	< 0.20	
Perfluorohexanesulfonic Acid (PFHxS)	NC	NC	< 0.20	
Perfluorohexanoic acid (PFHxA)	NC	NC	< 0.20	
Perfluoro-n-butanoic acid (PFBA)	NC	NC	< 0.80	
Perfluorononanesulfonic Acid (PFNS)	NC	NC	< 0.20	
Perfluorononanoic acid (PFNA)	NC	NC	0.19 J	
Perfluorooctanesulfonic Acid (PFOS)	NC	NC	0.81	
Perfluorooctanoic acid (PFOA)	NC	NC	0.13 J	
Perfluoropentanesulfonic Acid (PFPeS)	NC	NC	< 0.20	
Perfluoropentanoic acid (PFPeA)	NC	NC	< 0.40	
Perfluorotetradecanoic acid (PFTA)	NC	NC	< 0.20	
Perfluorotridecanoic acid (PFTrDA)	NC	NC	< 0.20	
Perfluoroundecanoic acid (PFUnA)	NC	NC	0.21	
PFEESA	NC	NC	< 0.40	
PFMBA	NC	NC	< 0.40	
PFMPA	NC	NC	< 0.40	
		Total:	1.48 J	

NOTES:

¹New York State Department of Environmental Conservation, Sampling, Analysis, and Assessment of Per- and Polyfluoroalkyl Substances (PFAS), April 2023

PFAS values displayed in microgram per kilogram (µg/kg) or parts per billion (ppb)

NC - No criteria currently exists

"<" - Indicates compound was not detected above the indicated laboratory method detection limit (MDL).

J indicates an estimated value

Bold - Indicates the compound was detected

Table 5
Richard L. Hanson Fire Training Center
4610 New York State Route 5, Mohawk, New York
Surface Water Laboratory Analytical Summary - Emergent Contaminants
NYSDEC Site No. B00138

Sample ID Laboratory Samples ID Sample Date	NYSDEC Guidelines ¹	SW-1		DUP-1	
		Surface Water			
		25D1372-08	25D1372-08		
		4/15/2025	4/15/2025		
PFAS					
11CI-PF3OUdS	NC	< 6.3		< 6.0	
1H,1H,2H,2H-Perfluorodecanesulfonic acid (8:2FTS)	NC	< 6.3		< 6.0	
1H,1H,2H,2H-Perfluorohexanesulfonic Acid (4:2FTS)	NC	< 6.3		< 6.0	
1H,1H,2H,2H-Perfluorooctanesulfonic acid (6:2FTS)	NC	< 6.3		< 6.0	
3:3FTCA	NC	< 7.9		< 7.5	
5:3FTCA	NC	< 39		< 38	
7:3FTCA	NC	< 39		< 38	
9CI-PF3ONS	NC	< 6.3		< 6.0	
ADONA	NC	< 6.3		< 6.0	
HFPO-DA	NC	< 6.3		< 6.0	
NEtFOSA	NC	< 1.6		< 1.5	
NEtFOSAA	NC	< 1.6		< 1.5	
NEtFOSE	NC	< 16		< 15	
NFDHA	NC	< 3.2		< 3.0	
NMeFOSA	NC	< 1.6		< 1.5	
NMeFOSAA	NC	< 1.6		< 1.5	
NMeFOSE	NC	< 16		< 15	
Perfluoro-1-decanesulfonic acid (PFDS)	NC	< 1.6		< 1.5	
Perfluoro-1-heptanesulfonic acid (PFHpS)	NC	< 1.6		< 1.5	
Perfluoro-1-octanesulfonamide (FOSA)	NC	< 1.6		< 1.5	
Perfluorobutanesulfonic acid (PFBS)	NC	0.92	J	0.83	J
Perfluorodecanoic acid (PFDA)	NC	< 1.6		< 1.5	
Perfluorododecane Sulfonic Acid (PFDoDS)	NC	< 1.6		< 1.5	
Perfluorododecanoic acid (PFDoA)	NC	< 1.6		< 1.5	
Perfluoroheptanoic acid (PFHpA)	NC	1.5	J	1.5	
Perfluorohexanesulfonic Acid (PFHxS)	NC	8.8		8.7	
Perfluorohexanoic acid (PFHxA)	NC	1.4	J	1.3	J
Perfluoro-n-butanoic acid (PFBA)	NC	3.5	J	4.8	J
Perfluorononanesulfonic Acid (PFNS)	NC	< 1.6		< 1.5	
Perfluorononanoic acid (PFNA)	NC	0.69	J	< 1.5	
Perfluorooctanesulfonic Acid (PFOS)	10	16		16	
Perfluorooctanoic acid (PFOA)	10	1.5	J	1.4	J
Perfluoropentanesulfonic Acid (PFPeS)	NC	0.85	J	0.90	J
Perfluoropentanoic acid (PFPeA)	NC	< 3.2		1.1	J
Perfluorotetradecanoic acid (PFTA) OR (PFTeDA)	NC	< 1.6		< 1.5	
Perfluorotridecanoic acid (PFTTrDA)	NC	< 1.6		< 1.5	
Perfluoroundecanoic acid (PFUnA)	NC	< 1.6		< 1.5	
PFEESA	NC	< 3.2		< 3.0	
PFMBA	NC	< 3.2		< 3.0	
PFMPA	NC	< 3.2		< 3.0	
Total:		35	J	35	J

NOTES:

¹New York State Department of Environmental Conservation, Sampling, Analysis, and Assessment of Per- and Polyfluoroalkyl Substances (PFAS), April 2023

PFAS values displayed in nanograms per grams (ng/l) or parts per trillion (ppt)

NC - No criteria currently exists

"<" - Indicates compound was not detected above the indicated laboratory method detection limit (MDL).

J indicates an estimated value

Bold - Indicates the compound was detected

Yellow highlight indicates that the compound was detected at a concentration above applicable NYSDEC Standards, Criteria, & Guidance Values



BORING LOGS

MONITORING WELL / BORING NO. **SB-1/MW-1**

Site Name: NYSDEC Richard L. Hanson FTC Date Drilled: April 14-15, 2025

Location: 4610 NYS Route 5, Mohawk, NY Drilling Co.: LaBella Associates

Client: NYSDEC Driller: A. Willard

Phone No.: N/A Logged by: S. Vaverchak

Drilling Method: Geoprobe 7822 DT (Dia): 2" Sampling Method: Macro Core (Dia): 2"

Drilled TD: 15' (Dia): 2" Sampled TD: see samples collected (Dia):

Well TD: 15' (Dia): 2" Well Type: PVC

Screen Interval: 15-5' Slot Size: 0.010" Diameter: 2-inch

Cased Interval: 5-0' Type: PVC Diameter: 2-inch

Sand Pack Interval: 15-3' Type: #2 Wellhead Prot: Flush Mount

Bentonite Seal Interval: 3-1' Type: Chips Grouted Interval: N/A



Soil Samples Collected:

SB-1 0-2"

SB-1 2-12"

SB-1 18-24"

Duplicate Parent SB-05 0-2"

Notes:

Slight petroleum odor detected at 0.5'-1.0' interval
Groundwater encountered @ 2'

Depth (Feet)	Monitoring Well Construction	Recovery;	PID (ppm):	Description / Soil Classification
0	2" cap 8" road box Concrete Well Sand Bentonite	Hand cleared	< 1.0	0.0' - 0.5' Brown, dry, organics, fine SAND and SILT (topsoil) 0.5' - 1.0' Brown, moist, medium to fine SAND, some rounded pebbles
5	2" PVC Riser #2 Well Sand 10 Slot PVC Screen	S-1: 2.0' - 5.0' Rec: 1.0'/3.0'	< 1.0	1.0' - 15' Gray, saturated, SILT, some Sand
10		S-2: 5.0' - 10' Rec: 0.0'/5.0'	N/A	
15		S-3: 10' - 15' Rec: 5.0'/5.0'	< 1.0	End of boring @ 15'
20				
25				
30				
35				

MONITORING WELL / BORING NO. **SB-2**

Site Name: NYSDEC Richard L. Hanson FTC Date Drilled: April 14, 2025

Location: 4610 NYS Route 5, Mohawk, NY Drilling Co.: LaBella Associates

Client: NYSDEC Driller: A. Willard

Phone No.: N/A Logged by: S. Vaverchak

Drilling Method: Geoprobe 7822 DT (Dia): 2" Sampling Method: Macro Core (Dia): 2"

Drilled TD: 15' (Dia): 2" Sampled TD: see samples collected (Dia):

Well TD: N/A (Dia): N/A Well Type: N/A

Screen Interval: N/A Slot Size: N/A Diameter: N/A

Cased Interval: N/A Type: N/A Diameter: N/A

Sand Pack Interval: N/A Type: N/A Wellhead Prot: N/A

Bentonite Seal Interval: N/A Type: N/A Grouted Interval: N/A



Soil Samples Collected:

SB-2 0-2"

SB-2 2-12"

SB-2 18-24"

Notes:

Groundwater encountered @ 2'
No monitoring well installed at SB-2

Depth (Feet)	Monitoring Well Construction	Recovery;	PID (ppm):	Description / Soil Classification
0				
		Hand cleared	< 1.0	0.0' - 0.5' Brown, dry, organics, fine SAND and SILT (topsoil)
		S-1: 1.0' - 5.0' Rec: 0.0'/4.0'	N/A	0.5' - 1.0' Brown, moist, medium to fine SAND, some rounded Gravel
				1.0' - 5.5' Brown, saturated, medium to fine SAND, some Silt
5		S-2: 5.0' - 10' Rec: 0.5'/5.0'	< 1.0	
10		S-3: 10' - 15' Rec: 5.0'/5.0'	< 1.0	Brown to gray, saturated, medium to fine SAND, some Silt
15				13' - 15' Gray, saturated, SILT, some fine Sand
				End of boring @ 15'
15'				
20				
25				
30				
35				

MONITORING WELL / BORING NO. **SB-3**

Site Name: NYSDEC Richard L. Hanson FTC Date Drilled: April 14, 2025

Location: 4610 NYS Route 5, Mohawk, NY Drilling Co.: LaBella Associates

Client: NYSDEC Driller: A. Willard

Phone No.: N/A Logged by: S. Vaverchak

Drilling Method: Geoprobe 7822 DT (Dia): 2" Sampling Method: Macro Core (Dia): 2"

Drilled TD: 10' (Dia): 2" Sampled TD: see samples collected (Dia):

Well TD: N/A (Dia): N/A Well Type: N/A

Screen Interval: N/A Slot Size: N/A Diameter: N/A

Cased Interval: N/A Type: N/A Diameter: N/A

Sand Pack Interval: N/A Type: N/A Wellhead Prot: N/A

Bentonite Seal Interval: N/A Type: N/A Grouted Interval: N/A



SB-3 20-24"

Notes:

Groundwater encountered @ 2'
No monitoring well installed at SB-3

Depth (Feet)	Monitoring Well Construction	Recovery;	PID (ppm):	Description / Soil Classification
0 </				

MONITORING WELL / BORING NO. **SB-4**

Site Name: NYSDEC Richard L. Hanson FTC Date Drilled: April 14, 2025

Location: 4610 NYS Route 5, Mohawk, NY Drilling Co.: LaBella Associates

Client: NYSDEC Driller: A. Willard

Phone No.: N/A Logged by: S. Vaverchak

Drilling Method: Geoprobe 7822 DT (Dia): 2" Sampling Method: Macro Core (Dia): 2"

Drilled TD: 10' (Dia): 2" Sampled TD: see samples collected (Dia):

Well TD: N/A (Dia): N/A Well Type: N/A

Screen Interval: N/A Slot Size: N/A Diameter: N/A

Cased Interval: N/A Type: N/A Diameter: N/A

Sand Pack Interval: N/A Type: N/A Wellhead Prot: N/A

Bentonite Seal Interval: N/A Type: N/A Grouted Interval: N/A



Soil Samples Collected:

SB-4 0-2"

SB-4 2-12"

SB-4 2-12" MS/MSD

SB-4 30-36"

Notes:

Groundwater encountered @ 3'

No monitoring well installed at SB-4

Depth (Feet)	Monitoring Well Construction	Recovery;	PID (ppm):	Description / Soil Classification
0				
		Hand cleared	< 1.0	0.0' - 0.25' Brown, dry, organics, fine SAND and SILT (topsoil) 0.25' - 5.0' Dark brown, dry, medium to fine SAND, some angular Cobbles
		S-1: 3.0' - 5.0' Rec: 1.0'/2.0'	< 1.0	
5		S-2: 5.0' - 10' Rec: 3.0'/5.0'	< 1.0	5.0' - 6.5' Brown, saturated, SILT, some Clay 6.5' - 10' Brown, saturated, SILT, some medium to fine Sand 8.0' - 10' Brown, saturated, SILT, some Clay, little fine Sand End of boring @ 10'
10				10'
15				
20				
25				
30				
35				

MONITORING WELL / BORING NO. **SB-5/MW-2**

Site Name: NYSDEC Richard L. Hanson FTC Date Drilled: April 14-15, 2025
 Location: 4610 NYS Route 5, Mohawk, NY Drilling Co.: LaBella Associates
 Client: NYSDEC Driller: A. Willard
 Phone No.: N/A Logged by: S. Vaverchak
 Drilling Method: Geoprobe 7822 DT (Dia): 2" Sampling Method: Macro Core (Dia): 2"
 Drilled TD: 15' (Dia): 2" Sampled TD: see samples collected (Dia):
 Well TD: 15' (Dia): 2" Well Type: PVC
 Screen Interval: 15-5' Slot Size: 0.010" Diameter: 2-inch
 Cased Interval: 5-0' Type: PVC Diameter: 2-inch
 Sand Pack Interval: 15-3' Type: #2 Wellhead Prot: Flush Mount
 Bentonite Seal Interval: 3-1' Type: Chips Grouted Interval: N/A



Soil Samples Collected:

SB-5 0-2"

SB-1 2-12"

SB-1 18-24"

Duplicate Parent SB-05 2-12"

Notes:

Slight petroleum odor detected at 5.0'-8.0' interval
 Groundwater encountered @ 3'

Depth (Feet)	Monitoring Well Construction	Recovery;	PID (ppm):	Description / Soil Classification
0				
		Hand cleared	< 1.0	0.0' - 0.5' Brown, dry, organics, fine SAND and SILT (topsoil), metal debris 0.5' - 5.0' Dark to light brown, moist, medium to fine SAND, some Gravel and Cobbles
		S-1: 3.0' - 5.0' Rec: 1.0'/2.0'	0.0	
		S-2: 5.0' - 10' Rec: 5.0'/5.0'	N/A	5.0' - 15' Brown to gray, saturated, SILT, little fine Sand
		S-3: 10' - 15' Rec: 5.0'/5.0'	0.0	
15				End of boring @ 15'
15'				
20				
25				
30				
35				

MONITORING WELL / BORING NO. **SB-6**

Site Name: NYSDEC Richard L. Hanson FTC Date Drilled: April 15, 2025

Location: 4610 NYS Route 5, Mohawk, NY Drilling Co.: LaBella Associates

Client: NYSDEC Driller: A. Willard

Phone No.: N/A Logged by: S. Vaverchak

Drilling Method: Geoprobe 7822 DT (Dia): 2" Sampling Method: Macro Core (Dia): 2"

Drilled TD: 15' (Dia): 2" Sampled TD: see samples collected (Dia):

Well TD: N/A (Dia): N/A Well Type: N/A

Screen Interval: N/A Slot Size: N/A Diameter: N/A

Cased Interval: N/A Type: N/A Diameter: N/A

Sand Pack Interval: N/A Type: N/A Wellhead Prot: N/A

Bentonite Seal Interval: N/A Type: N/A Grouted Interval: N/A



Soil Samples Collected:

SB-6 0-2"

SB-6 2-12"

SB-6 30-36"

Notes:

Groundwater encountered @ 3'
No monitoring well installed at SB-6
SB-6 not hand cleared due to concrete pad

Depth (Feet)	Monitoring Well Construction	Recovery;	PID (ppm):	Description / Soil Classification
0				0.0' - 0.5' Concrete
	S-1: 0.0' - 5.0' Rec: 1.5'/5.0'	< 1.0		0.5' - 10' Brown, moist, medium to fine SAND, some angular Gravel
5	S-2: 5.0' - 10' Rec: 3.0'/5.0'	< 1.0		
10	S-3: 10' - 15' Rec: 3.0'/5.0'	< 1.0		10' - 12' Brown, saturated, medium to fine SAND, some Silt, few Cobbles
15				12' - 15' Brown to gray, saturated, SILT, some medium to fine Sand
				End of boring @ 15'
20				
25				
30				
35				

MONITORING WELL / BORING NO. **SB-7/MW-3**

Site Name: NYSDEC Richard L. Hanson FTC Date Drilled: April 14-15, 2025

Location: 4610 NYS Route 5, Mohawk, NY Drilling Co.: LaBella Associates

Client: NYSDEC Driller: A. Willard

Phone No.: N/A Logged by: S. Vaverchak

Drilling Method: Geoprobe 7822 DT (Dia): 2" Sampling Method: Macro Core (Dia): 2"

Drilled TD: 15' (Dia): 2" Sampled TD: see samples collected (Dia):

Well TD: 15' (Dia): 2" Well Type: PVC

Screen Interval: 15-5' Slot Size: 0.010" Diameter: 2-inch

Cased Interval: 5-0' Type: PVC Diameter: 2-inch

Sand Pack Interval: 15-3' Type: #2 Wellhead Prot: Flush Mount

Bentonite Seal Interval: 3-1' Type: Chips Grouted Interval: N/A



Soil Samples Collected:

SB-7 0-2"

SB-7 2-12"

SB-7 60-65"

Notes:

Groundwater encountered @ 5.5'

Depth (Feet)	Monitoring Well Construction	Recovery;	PID (ppm):	Description / Soil Classification
0				
		Hand cleared	< 1.0	0.0' - 0.5' Brown, dry, organics, fine SAND and SILT (topsoil) 0.5' - 5.5' Brown, dry, medium to fine SAND, rounded Cobbles, some brick fragments
		S-2: 5.0' - 10' Rec: 4.0'/5.0'	< 1.0	5.5' - 6.5' Brown, saturated, medium to fine SAND, some Silt 6.5' - 9.0' Brown, saturated, SILT, some Clay Gray, saturated, SILT, some Clay
		S-3: 10' - 15' Rec: 5.0'/5.0'	< 1.0	13' - 15' Gray, saturated, SILT, some medium to fine Sand End of boring @ 15'
15				15'
20				
25				
30				
35				

MONITORING WELL / BORING NO. **SB-8/MW-4**

Site Name: NYSDEC Richard L. Hanson FTC Date Drilled: April 14-15, 2025

Location: 4610 NYS Route 5, Mohawk, NY Drilling Co.: LaBella Associates

Client: NYSDEC Driller: A. Willard

Phone No.: N/A Logged by: S. Vaverchak

Drilling Method: Geoprobe 7822 DT (Dia): 2" Sampling Method: Macro Core (Dia): 2"

Drilled TD: 15' (Dia): 2" Sampled TD: see samples collected (Dia):

Well TD: 15' (Dia): 2" Well Type: PVC

Screen Interval: 15-5' Slot Size: 0.010" Diameter: 2-inch

Cased Interval: 5-0' Type: PVC Diameter: 2-inch

Sand Pack Interval: 15-3' Type: #2 Wellhead Prot: Flush Mount

Bentonite Seal Interval: 3-1' Type: Chips Grouted Interval: N/A



Soil Samples Collected:

SB-8 0-2"

SB-8 2-12"

SB-8 54-60"

Notes:

Groundwater encountered @ 5.0'

Depth (Feet)	Monitoring Well Construction	Recovery;	PID (ppm):	Description / Soil Classification
0	2" cap 8" road box Concrete Well Sand Bentonite			
0.0' - 0.5'				Brown, dry, organics, fine SAND and SILT (topsoil)
0.5' - 5.0'				Brown, moist, medium to fine SAND, few cobbles
5		Hand cleared	< 1.0	
5.0' - 8.0'				Brown, saturated, fine SAND, some Silt
8.0' - 10'		S-2: 5.0' - 10' Rec: 5.0'/5.0'	< 1.0	Dark brown, saturated, fine SAND, some Silt
10' - 15'		S-3: 10' - 15' Rec: 5.0'/5.0'	< 1.0	Dark brown to gray, saturated, fine SAND, some Silt
15	2" PVC Riser #2 Well Sand 10 Slot PVC Screen			End of boring @ 15'
15'				
20				
25				
30				
35				

MONITORING WELL / BORING NO. **SB-9/MW-5**

Site Name: NYSDEC Richard L. Hanson FTC Date Drilled: April 15, 2025

Location: 4610 NYS Route 5, Mohawk, NY Drilling Co.: LaBella Associates

Client: NYSDEC Driller: A. Willard

Phone No.: N/A Logged by: S. Vaverchak

Drilling Method: Geoprobe 7822 DT (Dia): 2" Sampling Method: Macro Core (Dia): 2"

Drilled TD: 15' (Dia): 2" Sampled TD: see samples collected (Dia):

Well TD: 15' (Dia): 2" Well Type: PVC

Screen Interval: 15-5' Slot Size: 0.010" Diameter: 2-inch

Cased Interval: 5-0' Type: PVC Diameter: 2-inch

Sand Pack Interval: 15-3' Type: #2 Wellhead Prot: Flush Mount

Bentonite Seal Interval: 3-1' Type: Chips Grouted Interval: N/A



Soil Samples Collected:

SB-9 0-2"

SB-9 2-12"

SB-9 2-12" MS/MSD

SB-9 54-60"

Duplicate Parent SB-9 54-60"

Notes:

Groundwater encountered @ 5.5'

Depth (Feet)	Monitoring Well Construction	Recovery;	PID (ppm):	Description / Soil Classification
0	2" cap 8" road box Concrete Well Sand Bentonite			
0.0' - 0.5'				Brown, dry, organics, fine SAND and SILT (topsoil)
0.5' - 6.0'		Hand cleared	< 1.0	Dark brown, moist, medium to fine SAND, little Silt, Gravel, and Cobbles
5	2" PVC Riser			
6.0' - 10'		S-2: 5.0' - 10' Rec: 4.0'/5.0'	< 1.0	Dark brown, saturated, medium SAND, Gravel and Cobble fragments
10	#2 Well Sand			
10' - 11'				Brown, saturated, medium to fine SAND, little Silt
10' - 15'		S-3: 10' - 15' Rec: 5.0'/5.0'	< 1.0	Brown to gray, saturated, medium to fine SAND, some Silt
15	10 Slot PVC Screen			End of boring @ 15'
15'				
20				
25				
30				
35				



WELL DEVELOPMENT LOGS



LOW FLOW STABILIZATION SAMPLING LOGS

Well ID: MW-2
Date: 4/28/25
Weather: 65°F, Sunny
Sampled By: LM

Client: NYSDEC
Project Name: NYSDEC Mohawk
Project Location: 4610 NYS Rt 5, Mohawk, NY
Project No.: 2234026.134

WELL SAMPLING INFORMATION

Well Diameter: 2 in
Well Depth: 14.11
Measuring Pt.: TOC
Measuring Pt Elev.: -

Static Depth to Water (Ft): 4.28
Static Depth to Product (Ft): -
Water Column (Ft): 9.83
Well Volume (Gal): 1.85 $1.85 \times 3 = 4.80$

Tubing Type: HDPE
Tubing Dia (in.): 1.31
Depth of Pump/Tubing: 13.11
Equipment Decontamination: Alconox wash followed by triple rinse between wells

WELL CASING VOLUME CALCULATION

Water Level/Interface probe #: IP #6
Peristaltic Pump #: Geopump #3
YSI / Horiba #: YSI #1
Other Equipment used: -

Well Dia. (in)	Gal/Ft Depth	Well Dia. (in)	Gal/Ft Depth
1	0.0408	6	1.4681
1.5	0.0918	8	2.6100
2	0.1631	10	4.0782
3	0.3670	12	5.8726
4	0.6525	16	10.440
5	1.0195	24	23.500

Well Volume Gallons = Water Column (ft) X Gal/Ft. depth

Stabilization is achieved when the following changes are noted over three consecutive 3-5 minute readings:
± 0.1 change in pH
± 3% change in conductivity
± 10 millivolt change in ORP
± 10% change in DO
± 10% change in Turbidity

FIELD PARAMETER MEASUREMENTS

Purge Start Time: 12:00
Groundwater Color: Orange-brown to brown

Purge End Time: 13:10
Groundwater Odor: slight fuel

Well Headspace (ppm): -
Sheen, Product or NAPL Present: some spots

Time	Pumping Rate (mL/min)	Gals. Purged	pH	Turbidity (NTU)	Temp. (°C)	D.O. (mg/L)	ORP (mV)	S.C. (mS/cm)	Depth to Water (Ft)
12:00	500 mL/min	Trace	7.04	56.97	10.7	0.10	-54.5	0.659	4.28
12:05		0.2	6.98	47.84	11.3	0.10	-51.9	0.663	4.34
12:10		0.4	6.96	138.82	12.3	0.09	-52.5	0.675	4.37
12:15		0.6	6.96	103.30	12.3	0.08	-53.6	0.674	4.40
12:20		0.8	6.97	100.25	12.1	0.08	-50.4	0.670	4.43
12:25	200 mL/min	0.9	6.97	79.38	12.0	0.08	-49.3	0.667	4.47
12:30		1.0	6.97	42.41	11.9	0.08	-41.7	0.665	4.50
12:35		1.1	6.97	35.73	11.9	0.08	-37.4	0.662	4.59
12:40		1.2	6.95	96.66	12.5	0.06	-41.4	0.665	4.56
12:45		1.3	6.94	139.36	13.0	0.04	-50.7	0.667	4.54
12:50		1.4	6.94	303.42	12.5	0.06	-51.4	0.660	4.54
12:55		1.5	6.94	195.02	12.3	0.06	-55.7	0.655	4.54
13:00		1.6	6.93	79.07	11.9	0.06	-57.4	0.650	4.54
13:05		1.7	6.91	74.46	11.6	0.06	-58.3	0.645	4.54
13:10		1.8	6.91	82.10	11.8	0.05	-60.5	0.646	4.54

Total Gallons Purged: 1.8

Final Depth to Water (Ft): 4.54

Sample time: 13:15

Page 1 of 1



LABORATORY ANALYTICAL REPORTS

May 8, 2025

Sierra Vaverchak
NYDEC_Labella Associates - Ballston Spa, NY
5 McCrea Hill Road
Ballston Spa, NY 12020

Project Location: Mohawk, NY
Client Job Number:
Project Number: B00138
Laboratory Work Order Number: 25D1389

Enclosed are results of analyses for samples as received by the laboratory on April 15, 2025. If you have any questions concerning this report, please feel free to contact me.

Sincerely,



Kyle A. Murray
Project Manager

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Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

NYDEC_Labella Associates - Ballston Spa, NY
5 McCrea Hill Road
Ballston Spa, NY 12020
ATTN: Sierra Vaverchak

REPORT DATE: 5/8/2025

PURCHASE ORDER NUMBER: 152879

PROJECT NUMBER: B00138

ANALYTICAL SUMMARY

WORK ORDER NUMBER: 25D1389

The results of analyses performed on the following samples submitted to Pace Analytical Services, LLC - East Longmeadow, Ma, are found in this report.

PROJECT LOCATION: Mohawk, NY

FIELD SAMPLE #	LAB ID:	MATRIX	SAMPLE DESCRIPTION	TEST	SUB LAB
SB-1 0-2in	25D1389-01	Soil		Draft Method 1633 SM 2540G	
SB-1 2-12in	25D1389-02	Soil		Draft Method 1633 SM 2540G	
SB-1 18-24in	25D1389-03	Soil		Draft Method 1633 SM 2540G	
SB-2 0-2in	25D1389-04	Soil		Draft Method 1633 SM 2540G	
SB-2 2-12in	25D1389-05	Soil		Draft Method 1633 SM 2540G	
SB-2 18-24in	25D1389-06	Soil		Draft Method 1633 SM 2540G	
SB-3 0-2in	25D1389-07	Soil		Draft Method 1633 SM 2540G	
SB-3 2-12in	25D1389-08	Soil		Draft Method 1633 SM 2540G	
SB-3 20-24in	25D1389-09	Soil		Draft Method 1633 SM 2540G	
SB-4 0-2in	25D1389-10	Soil		Draft Method 1633 SM 2540G	
SB-4 2-12in	25D1389-11	Soil		Draft Method 1633 SM 2540G	
SB-4 30-36in	25D1389-12	Soil		Draft Method 1633 SM 2540G	
SB-5 0-2in	25D1389-13	Soil		Draft Method 1633 SM 2540G	
SB-5 2-12in	25D1389-14	Soil		Draft Method 1633 SM 2540G	
SB-5 30-36in	25D1389-15	Soil		Draft Method 1633 SM 2540G	
SB-7 0-2in	25D1389-16	Soil		Draft Method 1633 SM 2540G	
SB-7 2-12in	25D1389-17	Soil		Draft Method 1633 SM 2540G	
SB-7 60-65in	25D1389-18	Soil		Draft Method 1633 SM 2540G	
SB-8 0-2in	25D1389-19	Soil		Draft Method 1633 SM 2540G	
SB-8 2-12in	25D1389-20	Soil		Draft Method 1633 SM 2540G	



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

NYDEC_Labella Associates - Ballston Spa, NY
5 McCrea Hill Road
Ballston Spa, NY 12020
ATTN: Sierra Vaverchak

REPORT DATE: 5/8/2025

PURCHASE ORDER NUMBER: 152879

PROJECT NUMBER: B00138

ANALYTICAL SUMMARY

WORK ORDER NUMBER: 25D1389

The results of analyses performed on the following samples submitted to Pace Analytical Services, LLC - East Longmeadow, Ma, are found in this report.

PROJECT LOCATION: Mohawk, NY

FIELD SAMPLE #	LAB ID:	MATRIX	SAMPLE DESCRIPTION	TEST	SUB LAB
SB-8 54-60in	25D1389-21	Soil		Draft Method 1633 SM 2540G	
Field Dup	25D1389-22	Soil		Draft Method 1633 SM 2540G	
Equipment Blank	25D1389-23	Equipment Blank Water		Draft Method 1633	

CASE NARRATIVE SUMMARY

All reported results are within defined laboratory quality control objectives unless listed below or otherwise qualified in this report.

Trip Blank not received, sample -24 canceled.

Draft Method 1633

Qualifications:

D-01

Sample extracted/prepared at a dilution due to sample matrix.

Analyte & Samples(s) Qualified:

25D1389-13RE1[SB-5 0-2in], 25D1389-14RE1[SB-5 2-12in], 25D1389-15RE1[SB-5 30-36in]

L-03

Laboratory fortified blank/laboratory control sample recovery is outside of control limits. Reported value for this compound is likely to be biased on the low side.

Analyte & Samples(s) Qualified:

3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTC)^A

25D1389-01[SB-1 0-2in], 25D1389-02[SB-1 2-12in], 25D1389-03[SB-1 18-24in], 25D1389-04[SB-2 0-2in], 25D1389-05[SB-2 2-12in], 25D1389-06[SB-2 18-24in], 25D1389-07[SB-3 0-2in], 25D1389-08[SB-3 2-12in], 25D1389-09[SB-3 20-24in], 25D1389-10[SB-4 0-2in], 25D1389-11[SB-4 2-12in], 25D1389-12[SB-4 30-36in], 25D1389-16[SB-7 0-2in], 25D1389-17[SB-7 2-12in], 25D1389-18[SB-7 60-65in], 25D1389-19[SB-8 0-2in], B403456-BLK1, B403456-BS1, B403456-MRL1, B403456-MS1, B403456-MSD1

MS-07A

Matrix spike and spike duplicate recovery is outside of control limits. Analysis is in control based on laboratory fortified blank recovery. Possibility of matrix effects that lead to low bias or non-homogeneous sample aliquot cannot be eliminated.

Analyte & Samples(s) Qualified:

3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTC)^A

B403456-MS1, B403456-MSD1

MS-12

Matrix spike recovery and matrix spike duplicate recovery outside of control limits. Possibility of sample matrix effects that lead to a high bias for reported result or non-homogeneous sample aliquots cannot be eliminated.

Analyte & Samples(s) Qualified:

Perfluorooctanesulfonic acid (PFOS)

25D1389-22RE1[Field Dup], B403618-MS1, B403618-MSD1

PF-17

Extracted Internal Standard recovery is outside of control limits. Data is not significantly affected since associated analyte is not detected and bias is on the high side.

Analyte & Samples(s) Qualified:

13C2-4:2FTS

S120704-CCB2, S120704-CCB3

13C2-PFTeDA

25D1389-01[SB-1 0-2in], 25D1389-02[SB-1 2-12in], 25D1389-16[SB-7 0-2in]

1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FT)

S120704-CCB2, S120704-CCB3

Perfluorotetradecanoic acid (PFTeDA)

25D1389-01[SB-1 0-2in], 25D1389-02[SB-1 2-12in], 25D1389-16[SB-7 0-2in]

PF-22

Qualifier ion ratio >150% of associated calibration. Detection is suspect.

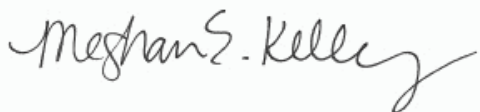
Analyte & Samples(s) Qualified:

Perfluorooctanesulfonamide (PFOSA)

25D1389-13RE1[SB-5 0-2in], 25D1389-22[Field Dup]

The results of analyses reported only relate to samples submitted to Pace Analytical Services, LLC - East Longmeadow, Ma, for testing.

I certify that the analyses listed above, unless specifically listed as subcontracted, if any, were performed under my direction according to the approved methodologies listed in this document, and that based upon my inquiry of those individuals immediately responsible for obtaining the information, the material contained in this report is, to the best of my knowledge and belief, accurate and complete.



Meghan E. Kelley
Reporting Specialist

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-1 0-2in

Sampled: 4/14/2025 10:25

Sample ID: 25D1389-01

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorooctanoic acid (PFOA)	0.13	0.20	0.069	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorononanoic acid (PFNA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorodecanoic acid (PFDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1	PF-17	Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorooctanesulfonic acid (PFOS)	0.095	0.20	0.060	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
11Cl-PF3OUs (F53B Major)	ND	0.80	0.26	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 10:22	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-1 0-2in

Sampled: 4/14/2025 10:25

Sample ID: 25D1389-01

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:22	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	92.1		8-130				4/25/25 10:22			
13C5-PFPeA	104		35-130				4/25/25 10:22			
13C5-PFHxA	106		40-130				4/25/25 10:22			
13C4-PFHpA	107		40-130				4/25/25 10:22			
13C8-PFOA	107		40-130				4/25/25 10:22			
13C9-PFNA	106		40-130				4/25/25 10:22			
13C6-PFDA	105		40-130				4/25/25 10:22			
13C7-PFUnA	121		40-130				4/25/25 10:22			
13C2-PFDoA	124		40-130				4/25/25 10:22			
13C2-PFTeDA	131		* 20-130				4/25/25 10:22			
13C3-PFBS	114		40-135				4/25/25 10:22			
13C3-PFHxS	107		40-130				4/25/25 10:22			
13C8-PFOS	105		40-130				4/25/25 10:22			
13C2-4:2FTS	130		40-165				4/25/25 10:22			
13C2-6:2FTS	125		40-215				4/25/25 10:22			
13C2-8:2FTS	137		40-275				4/25/25 10:22			
13C8-PFOSA	115		40-130				4/25/25 10:22			
D3-NMeFOSA	91.3		10-130				4/25/25 10:22			
D5-NEtFOSA	92.6		10-130				4/25/25 10:22			
D3-NMeFOSAA	119		40-135				4/25/25 10:22			
D5-NEtFOSAA	126		40-150				4/25/25 10:22			
D7-NMeFOSE	102		20-130				4/25/25 10:22			
D9-NEtFOSE	102		15-130				4/25/25 10:22			
13C3-HFPO-DA	103		40-130				4/25/25 10:22			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-1 0-2in

Sampled: 4/14/2025 10:25

Sample ID: 25D1389-01

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	78.6		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-1 2-12in

Sampled: 4/14/2025 10:30

Sample ID: 25D1389-02

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.79	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorooctanoic acid (PFOA)	0.21	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorononanoic acid (PFNA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorodecanoic acid (PFDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1	PF-17	Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorooctanesulfonic acid (PFOS)	ND	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	0.28	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.79	0.37	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	0.33	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.79	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
9Cl-PF3ONS (F53B Minor)	ND	0.79	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
11Cl-PF3OUs (F53B Major)	ND	0.79	0.26	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 10:31	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-1 2-12in

Sampled: 4/14/2025 10:30

Sample ID: 25D1389-02

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:31	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	89.3		8-130				4/25/25 10:31			
13C5-PFPeA	102		35-130				4/25/25 10:31			
13C5-PFHxA	104		40-130				4/25/25 10:31			
13C4-PFHpA	103		40-130				4/25/25 10:31			
13C8-PFOA	104		40-130				4/25/25 10:31			
13C9-PFNA	104		40-130				4/25/25 10:31			
13C6-PFDA	105		40-130				4/25/25 10:31			
13C7-PFUnA	121		40-130				4/25/25 10:31			
13C2-PFDoA	121		40-130				4/25/25 10:31			
13C2-PFTeDA	134 *		20-130		PF-17		4/25/25 10:31			
13C3-PFBS	113		40-135				4/25/25 10:31			
13C3-PFHxS	106		40-130				4/25/25 10:31			
13C8-PFOS	102		40-130				4/25/25 10:31			
13C2-4:2FTS	154		40-165				4/25/25 10:31			
13C2-6:2FTS	159		40-215				4/25/25 10:31			
13C2-8:2FTS	140		40-275				4/25/25 10:31			
13C8-PFOSA	95.7		40-130				4/25/25 10:31			
D3-NMeFOSA	81.9		10-130				4/25/25 10:31			
D5-NEtFOSA	84.2		10-130				4/25/25 10:31			
D3-NMeFOSAA	107		40-135				4/25/25 10:31			
D5-NEtFOSAA	111		40-150				4/25/25 10:31			
D7-NMeFOSE	103		20-130				4/25/25 10:31			
D9-NEtFOSE	103		15-130				4/25/25 10:31			
13C3-HFPO-DA	101		40-130				4/25/25 10:31			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-1 2-12in

Sampled: 4/14/2025 10:30

Sample ID: 25D1389-02

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	83.6		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-1 18-24in

Sampled: 4/14/2025 10:35

Sample ID: 25D1389-03

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.79	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorooctanoic acid (PFOA)	ND	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorononanoic acid (PFNA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorodecanoic acid (PFDA)	ND	0.20	0.062	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorooctanesulfonic acid (PFOS)	ND	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.049	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	0.28	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.79	0.36	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.70	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	0.33	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.79	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
9Cl-PF3ONS (F53B Minor)	ND	0.79	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
11Cl-PF3OUs (F53B Major)	ND	0.79	0.26	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 10:40	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-1 18-24in

Sampled: 4/14/2025 10:35

Sample ID: 25D1389-03

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:40	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	77.2		8-130				4/25/25 10:40			
13C5-PFPeA	101		35-130				4/25/25 10:40			
13C5-PFHxA	102		40-130				4/25/25 10:40			
13C4-PFHpA	99.5		40-130				4/25/25 10:40			
13C8-PFOA	103		40-130				4/25/25 10:40			
13C9-PFNA	99.7		40-130				4/25/25 10:40			
13C6-PFDA	105		40-130				4/25/25 10:40			
13C7-PFUnA	108		40-130				4/25/25 10:40			
13C2-PFDoA	110		40-130				4/25/25 10:40			
13C2-PFTeDA	116		20-130				4/25/25 10:40			
13C3-PFBS	111		40-135				4/25/25 10:40			
13C3-PFHxS	102		40-130				4/25/25 10:40			
13C8-PFOS	96.5		40-130				4/25/25 10:40			
13C2-4:2FTS	115		40-165				4/25/25 10:40			
13C2-6:2FTS	106		40-215				4/25/25 10:40			
13C2-8:2FTS	99.7		40-275				4/25/25 10:40			
13C8-PFOSA	103		40-130				4/25/25 10:40			
D3-NMeFOSA	91.2		10-130				4/25/25 10:40			
D5-NEtFOSA	93.7		10-130				4/25/25 10:40			
D3-NMeFOSAA	105		40-135				4/25/25 10:40			
D5-NEtFOSAA	108		40-150				4/25/25 10:40			
D7-NMeFOSE	107		20-130				4/25/25 10:40			
D9-NEtFOSE	109		15-130				4/25/25 10:40			
13C3-HFPO-DA	100		40-130				4/25/25 10:40			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-1 18-24in

Sampled: 4/14/2025 10:35

Sample ID: 25D1389-03

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	81.4		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-2 0-2in

Sampled: 4/14/2025 11:15

Sample ID: 25D1389-04

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	0.60	0.79	0.27	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluoropentanoic acid (PFPeA)	0.78	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorohexanoic acid (PFHxA)	0.46	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluoroheptanoic acid (PFHpA)	0.86	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorooctanoic acid (PFOA)	1.7	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorononanoic acid (PFNA)	1.3	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorodecanoic acid (PFDA)	0.96	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluoroundecanoic acid (PFUnA)	0.63	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorododecanoic acid (PFDoA)	0.14	0.20	0.074	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorotridecanoic acid (PFTrDA)	0.066	0.20	0.063	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorohexanesulfonic acid (PFHxS)	0.20	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorooctanesulfonic acid (PFOS)	12	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorononanesulfonic acid (PFNS)	0.054	0.20	0.050	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	0.28	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.79	0.37	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	0.33	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.79	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
9Cl-PF3ONS (F53B Minor)	ND	0.79	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
11Cl-PF3OUs (F53B Major)	ND	0.79	0.26	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 10:49	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-2 0-2in

Sampled: 4/14/2025 11:15

Sample ID: 25D1389-04

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:49	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	93.3		8-130				4/25/25 10:49			
13C5-PFPeA	102		35-130				4/25/25 10:49			
13C5-PFHxA	103		40-130				4/25/25 10:49			
13C4-PFHpA	103		40-130				4/25/25 10:49			
13C8-PFOA	107		40-130				4/25/25 10:49			
13C9-PFNA	103		40-130				4/25/25 10:49			
13C6-PFDA	102		40-130				4/25/25 10:49			
13C7-PFUnA	113		40-130				4/25/25 10:49			
13C2-PFDoA	106		40-130				4/25/25 10:49			
13C2-PFTeDA	114		20-130				4/25/25 10:49			
13C3-PFBS	111		40-135				4/25/25 10:49			
13C3-PFHxS	101		40-130				4/25/25 10:49			
13C8-PFOS	102		40-130				4/25/25 10:49			
13C2-4:2FTS	106		40-165				4/25/25 10:49			
13C2-6:2FTS	107		40-215				4/25/25 10:49			
13C2-8:2FTS	100		40-275				4/25/25 10:49			
13C8-PFOSA	111		40-130				4/25/25 10:49			
D3-NMeFOSA	100		10-130				4/25/25 10:49			
D5-NEtFOSA	104		10-130				4/25/25 10:49			
D3-NMeFOSAA	105		40-135				4/25/25 10:49			
D5-NEtFOSAA	110		40-150				4/25/25 10:49			
D7-NMeFOSE	114		20-130				4/25/25 10:49			
D9-NEtFOSE	120		15-130				4/25/25 10:49			
13C3-HFPO-DA	106		40-130				4/25/25 10:49			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-2 0-2in

Sampled: 4/14/2025 11:15

Sample ID: 25D1389-04

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	87.8		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-2 2-12in

Sampled: 4/14/2025 11:20

Sample ID: 25D1389-05

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluoropentanoic acid (PFPeA)	0.46	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorohexanoic acid (PFHxA)	0.23	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluoroheptanoic acid (PFHpA)	0.41	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorooctanoic acid (PFOA)	0.61	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorononanoic acid (PFNA)	0.72	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorodecanoic acid (PFDA)	0.47	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluoroundecanoic acid (PFUnA)	0.13	0.20	0.082	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorohexanesulfonic acid (PFHxS)	0.11	0.20	0.075	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorooctanesulfonic acid (PFOS)	8.3	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
11Cl-PF3OUs (F53B Major)	ND	0.80	0.26	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 10:59	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-2 2-12in

Sampled: 4/14/2025 11:20

Sample ID: 25D1389-05

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 10:59	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	89.8		8-130				4/25/25 10:59			
13C5-PFPeA	101		35-130				4/25/25 10:59			
13C5-PFHxA	102		40-130				4/25/25 10:59			
13C4-PFHpA	100		40-130				4/25/25 10:59			
13C8-PFOA	104		40-130				4/25/25 10:59			
13C9-PFNA	103		40-130				4/25/25 10:59			
13C6-PFDA	109		40-130				4/25/25 10:59			
13C7-PFUnA	120		40-130				4/25/25 10:59			
13C2-PFDoA	112		40-130				4/25/25 10:59			
13C2-PFTeDA	114		20-130				4/25/25 10:59			
13C3-PFBS	110		40-135				4/25/25 10:59			
13C3-PFHxS	98.9		40-130				4/25/25 10:59			
13C8-PFOS	104		40-130				4/25/25 10:59			
13C2-4:2FTS	111		40-165				4/25/25 10:59			
13C2-6:2FTS	105		40-215				4/25/25 10:59			
13C2-8:2FTS	90.6		40-275				4/25/25 10:59			
13C8-PFOSA	106		40-130				4/25/25 10:59			
D3-NMeFOSA	91.2		10-130				4/25/25 10:59			
D5-NEtFOSA	94.9		10-130				4/25/25 10:59			
D3-NMeFOSAA	109		40-135				4/25/25 10:59			
D5-NEtFOSAA	110		40-150				4/25/25 10:59			
D7-NMeFOSE	111		20-130				4/25/25 10:59			
D9-NEtFOSE	114		15-130				4/25/25 10:59			
13C3-HFPO-DA	102		40-130				4/25/25 10:59			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-2 2-12in

Sampled: 4/14/2025 11:20

Sample ID: 25D1389-05

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	88.5		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-2 18-24in

Sampled: 4/14/2025 11:25

Sample ID: 25D1389-06

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluoropentanoic acid (PFPeA)	0.16	0.40	0.13	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorohexanoic acid (PFHxA)	0.11	0.20	0.082	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluoroheptanoic acid (PFHpA)	0.12	0.20	0.083	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorooctanoic acid (PFOA)	0.23	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorononanoic acid (PFNA)	0.15	0.20	0.075	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorodecanoic acid (PFDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.083	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.068	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorooctanesulfonic acid (PFOS)	1.2	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.065	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.058	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.090	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
11Cl-PF3OUs (F53B Major)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 11:09	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-2 18-24in

Sampled: 4/14/2025 11:25

Sample ID: 25D1389-06

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:09	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	81.7		8-130				4/25/25 11:09			
13C5-PFPeA	102		35-130				4/25/25 11:09			
13C5-PFHxA	103		40-130				4/25/25 11:09			
13C4-PFHpA	101		40-130				4/25/25 11:09			
13C8-PFOA	95.2		40-130				4/25/25 11:09			
13C9-PFNA	105		40-130				4/25/25 11:09			
13C6-PFDA	105		40-130				4/25/25 11:09			
13C7-PFUnA	116		40-130				4/25/25 11:09			
13C2-PFDoA	106		40-130				4/25/25 11:09			
13C2-PFTeDA	111		20-130				4/25/25 11:09			
13C3-PFBS	108		40-135				4/25/25 11:09			
13C3-PFHxS	103		40-130				4/25/25 11:09			
13C8-PFOS	103		40-130				4/25/25 11:09			
13C2-4:2FTS	115		40-165				4/25/25 11:09			
13C2-6:2FTS	110		40-215				4/25/25 11:09			
13C2-8:2FTS	98.2		40-275				4/25/25 11:09			
13C8-PFOSA	107		40-130				4/25/25 11:09			
D3-NMeFOSA	92.6		10-130				4/25/25 11:09			
D5-NEtFOSA	96.8		10-130				4/25/25 11:09			
D3-NMeFOSAA	109		40-135				4/25/25 11:09			
D5-NEtFOSAA	109		40-150				4/25/25 11:09			
D7-NMeFOSE	114		20-130				4/25/25 11:09			
D9-NEtFOSE	114		15-130				4/25/25 11:09			
13C3-HFPO-DA	103		40-130				4/25/25 11:09			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-2 18-24in

Sampled: 4/14/2025 11:25

Sample ID: 25D1389-06

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	82.1		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-3 0-2in

Sampled: 4/14/2025 11:30

Sample ID: 25D1389-07

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.79	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluoropentanoic acid (PFPeA)	0.16	0.40	0.12	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorohexanoic acid (PFHxA)	0.15	0.20	0.081	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluoroheptanoic acid (PFHpA)	0.22	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorooctanoic acid (PFOA)	0.48	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorononanoic acid (PFNA)	0.58	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorodecanoic acid (PFDA)	1.2	0.20	0.062	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluoroundecanoic acid (PFUnA)	1.0	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorododecanoic acid (PFDoA)	0.30	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorotridecanoic acid (PFTrDA)	0.12	0.20	0.063	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorooctanesulfonic acid (PFOS)	3.3	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.049	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	0.28	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.79	0.36	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.70	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	0.33	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	0.79	0.31	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
9Cl-PF3ONS (F53B Minor)	ND	0.79	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
11Cl-PF3OUDS (F53B Major)	ND	0.79	0.26	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 11:18	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-3 0-2in

Sampled: 4/14/2025 11:30

Sample ID: 25D1389-07

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:18	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	94.9		8-130				4/25/25 11:18			
13C5-PFPeA	104		35-130				4/25/25 11:18			
13C5-PFHxA	103		40-130				4/25/25 11:18			
13C4-PFHpA	104		40-130				4/25/25 11:18			
13C8-PFOA	101		40-130				4/25/25 11:18			
13C9-PFNA	104		40-130				4/25/25 11:18			
13C6-PFDA	107		40-130				4/25/25 11:18			
13C7-PFUnA	115		40-130				4/25/25 11:18			
13C2-PFDoA	111		40-130				4/25/25 11:18			
13C2-PFTeDA	115		20-130				4/25/25 11:18			
13C3-PFBS	114		40-135				4/25/25 11:18			
13C3-PFHxS	104		40-130				4/25/25 11:18			
13C8-PFOS	106		40-130				4/25/25 11:18			
13C2-4:2FTS	106		40-165				4/25/25 11:18			
13C2-6:2FTS	103		40-215				4/25/25 11:18			
13C2-8:2FTS	93.9		40-275				4/25/25 11:18			
13C8-PFOSA	113		40-130				4/25/25 11:18			
D3-NMeFOSA	101		10-130				4/25/25 11:18			
D5-NEtFOSA	101		10-130				4/25/25 11:18			
D3-NMeFOSAA	108		40-135				4/25/25 11:18			
D5-NEtFOSAA	113		40-150				4/25/25 11:18			
D7-NMeFOSE	114		20-130				4/25/25 11:18			
D9-NEtFOSE	114		15-130				4/25/25 11:18			
13C3-HFPO-DA	105		40-130				4/25/25 11:18			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-3 0-2in

Sampled: 4/14/2025 11:30

Sample ID: 25D1389-07

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	85.4		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-3 2-12in

Sampled: 4/14/2025 11:35

Sample ID: 25D1389-08

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.13	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorohexanoic acid (PFHxA)	0.083	0.20	0.082	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluoroheptanoic acid (PFHpA)	0.13	0.20	0.083	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorooctanoic acid (PFOA)	0.19	0.20	0.069	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorononanoic acid (PFNA)	0.28	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorodecanoic acid (PFDA)	0.45	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluoroundecanoic acid (PFUnA)	0.17	0.20	0.083	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.068	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorooctanesulfonic acid (PFOS)	1.3	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.065	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.058	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.090	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
11Cl-PF3OUdS (F53B Major)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 11:27	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-3 2-12in

Sampled: 4/14/2025 11:35

Sample ID: 25D1389-08

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.25	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:27	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	75.3		8-130				4/25/25 11:27			
13C5-PFPeA	99.0		35-130				4/25/25 11:27			
13C5-PFHxA	102		40-130				4/25/25 11:27			
13C4-PFHpA	101		40-130				4/25/25 11:27			
13C8-PFOA	104		40-130				4/25/25 11:27			
13C9-PFNA	103		40-130				4/25/25 11:27			
13C6-PFDA	106		40-130				4/25/25 11:27			
13C7-PFUnA	119		40-130				4/25/25 11:27			
13C2-PFDoA	106		40-130				4/25/25 11:27			
13C2-PFTeDA	113		20-130				4/25/25 11:27			
13C3-PFBS	118		40-135				4/25/25 11:27			
13C3-PFHxS	104		40-130				4/25/25 11:27			
13C8-PFOS	105		40-130				4/25/25 11:27			
13C2-4:2FTS	120		40-165				4/25/25 11:27			
13C2-6:2FTS	114		40-215				4/25/25 11:27			
13C2-8:2FTS	98.9		40-275				4/25/25 11:27			
13C8-PFOSA	104		40-130				4/25/25 11:27			
D3-NMeFOSA	88.3		10-130				4/25/25 11:27			
D5-NEtFOSA	91.1		10-130				4/25/25 11:27			
D3-NMeFOSAA	104		40-135				4/25/25 11:27			
D5-NEtFOSAA	107		40-150				4/25/25 11:27			
D7-NMeFOSE	107		20-130				4/25/25 11:27			
D9-NEtFOSE	107		15-130				4/25/25 11:27			
13C3-HFPO-DA	99.4		40-130				4/25/25 11:27			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-3 2-12in

Sampled: 4/14/2025 11:35

Sample ID: 25D1389-08

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	90.3		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-3 20-24in

Sampled: 4/14/2025 11:40

Sample ID: 25D1389-09

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.79	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluoropentanoic acid (PFPeA)	0.14	0.40	0.12	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorohexanoic acid (PFHxA)	0.098	0.20	0.081	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluoroheptanoic acid (PFHpA)	0.14	0.20	0.082	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorooctanoic acid (PFOA)	0.19	0.20	0.069	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorononanoic acid (PFNA)	0.55	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorodecanoic acid (PFDA)	0.16	0.20	0.063	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorooctanesulfonic acid (PFOS)	0.83	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	0.28	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.79	0.37	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	0.33	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.79	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
9Cl-PF3ONS (F53B Minor)	ND	0.79	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
11Cl-PF3OUs (F53B Major)	ND	0.79	0.26	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 11:37	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-3 20-24in

Sampled: 4/14/2025 11:40

Sample ID: 25D1389-09

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 11:37	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	81.7		8-130				4/25/25 11:37			
13C5-PFPeA	106		35-130				4/25/25 11:37			
13C5-PFHxA	107		40-130				4/25/25 11:37			
13C4-PFHpA	102		40-130				4/25/25 11:37			
13C8-PFOA	106		40-130				4/25/25 11:37			
13C9-PFNA	107		40-130				4/25/25 11:37			
13C6-PFDA	110		40-130				4/25/25 11:37			
13C7-PFUnA	122		40-130				4/25/25 11:37			
13C2-PFDoA	111		40-130				4/25/25 11:37			
13C2-PFTeDA	119		20-130				4/25/25 11:37			
13C3-PFBS	115		40-135				4/25/25 11:37			
13C3-PFHxS	110		40-130				4/25/25 11:37			
13C8-PFOS	105		40-130				4/25/25 11:37			
13C2-4:2FTS	118		40-165				4/25/25 11:37			
13C2-6:2FTS	111		40-215				4/25/25 11:37			
13C2-8:2FTS	103		40-275				4/25/25 11:37			
13C8-PFOSA	108		40-130				4/25/25 11:37			
D3-NMeFOSA	95.2		10-130				4/25/25 11:37			
D5-NEtFOSA	101		10-130				4/25/25 11:37			
D3-NMeFOSAA	104		40-135				4/25/25 11:37			
D5-NEtFOSAA	106		40-150				4/25/25 11:37			
D7-NMeFOSE	115		20-130				4/25/25 11:37			
D9-NEtFOSE	116		15-130				4/25/25 11:37			
13C3-HFPO-DA	105		40-130				4/25/25 11:37			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-3 20-24in

Sampled: 4/14/2025 11:40

Sample ID: 25D1389-09

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	86.0		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-4 0-2in

Sampled: 4/14/2025 11:45

Sample ID: 25D1389-10

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	0.31	0.80	0.27	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluoropentanoic acid (PFPeA)	0.54	0.40	0.13	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorohexanoic acid (PFHxA)	0.34	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluoroheptanoic acid (PFHpA)	0.69	0.20	0.083	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorooctanoic acid (PFOA)	1.0	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorononanoic acid (PFNA)	1.1	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorodecanoic acid (PFDA)	3.3	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluoroundecanoic acid (PFUnA)	1.9	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorododecanoic acid (PFDoA)	0.41	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorotridecanoic acid (PFTrDA)	0.099	0.20	0.063	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.068	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorooctanesulfonic acid (PFOS)	0.55	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.058	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	0.73	0.80	0.37	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
11Cl-PF3OUs (F53B Major)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 12:14	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-4 0-2in

Sampled: 4/14/2025 11:45

Sample ID: 25D1389-10

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:14	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	80.0		8-130				4/25/25 12:14			
13C5-PFPeA	103		35-130				4/25/25 12:14			
13C5-PFHxA	103		40-130				4/25/25 12:14			
13C4-PFHpA	104		40-130				4/25/25 12:14			
13C8-PFOA	111		40-130				4/25/25 12:14			
13C9-PFNA	102		40-130				4/25/25 12:14			
13C6-PFDA	101		40-130				4/25/25 12:14			
13C7-PFUnA	115		40-130				4/25/25 12:14			
13C2-PFDoA	111		40-130				4/25/25 12:14			
13C2-PFTeDA	115		20-130				4/25/25 12:14			
13C3-PFBS	104		40-135				4/25/25 12:14			
13C3-PFHxS	98.0		40-130				4/25/25 12:14			
13C8-PFOS	103		40-130				4/25/25 12:14			
13C2-4:2FTS	101		40-165				4/25/25 12:14			
13C2-6:2FTS	99.8		40-215				4/25/25 12:14			
13C2-8:2FTS	94.3		40-275				4/25/25 12:14			
13C8-PFOSA	103		40-130				4/25/25 12:14			
D3-NMeFOSA	94.9		10-130				4/25/25 12:14			
D5-NEtFOSA	97.7		10-130				4/25/25 12:14			
D3-NMeFOSAA	105		40-135				4/25/25 12:14			
D5-NEtFOSAA	109		40-150				4/25/25 12:14			
D7-NMeFOSE	109		20-130				4/25/25 12:14			
D9-NEtFOSE	109		15-130				4/25/25 12:14			
13C3-HFPO-DA	101		40-130				4/25/25 12:14			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-4 0-2in

Sampled: 4/14/2025 11:45

Sample ID: 25D1389-10

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	88.2		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-4 2-12n

Sampled: 4/14/2025 11:50

Sample ID: 25D1389-11

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluoropentanoic acid (PFPeA)	0.52	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorohexanoic acid (PFHxA)	0.17	0.20	0.081	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluoroheptanoic acid (PFHpA)	0.37	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorooctanoic acid (PFOA)	0.47	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorononanoic acid (PFNA)	0.69	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorodecanoic acid (PFDA)	2.1	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluoroundecanoic acid (PFUnA)	0.38	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorododecanoic acid (PFDoA)	0.081	0.20	0.074	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorooctanesulfonic acid (PFOS)	0.51	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
11Cl-PF3OUdS (F53B Major)	ND	0.80	0.26	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 12:24	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-4 2-12n

Sampled: 4/14/2025 11:50

Sample ID: 25D1389-11

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:24	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	79.7		8-130				4/25/25 12:24			
13C5-PFPeA	104		35-130				4/25/25 12:24			
13C5-PFHxA	104		40-130				4/25/25 12:24			
13C4-PFHpA	100		40-130				4/25/25 12:24			
13C8-PFOA	108		40-130				4/25/25 12:24			
13C9-PFNA	106		40-130				4/25/25 12:24			
13C6-PFDA	100		40-130				4/25/25 12:24			
13C7-PFUnA	111		40-130				4/25/25 12:24			
13C2-PFDoA	106		40-130				4/25/25 12:24			
13C2-PFTeDA	114		20-130				4/25/25 12:24			
13C3-PFBS	119		40-135				4/25/25 12:24			
13C3-PFHxS	108		40-130				4/25/25 12:24			
13C8-PFOS	106		40-130				4/25/25 12:24			
13C2-4:2FTS	123		40-165				4/25/25 12:24			
13C2-6:2FTS	112		40-215				4/25/25 12:24			
13C2-8:2FTS	97.3		40-275				4/25/25 12:24			
13C8-PFOSA	106		40-130				4/25/25 12:24			
D3-NMeFOSA	94.6		10-130				4/25/25 12:24			
D5-NEtFOSA	95.3		10-130				4/25/25 12:24			
D3-NMeFOSAA	105		40-135				4/25/25 12:24			
D5-NEtFOSAA	107		40-150				4/25/25 12:24			
D7-NMeFOSE	110		20-130				4/25/25 12:24			
D9-NEtFOSE	111		15-130				4/25/25 12:24			
13C3-HFPO-DA	103		40-130				4/25/25 12:24			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-4 2-12n

Sampled: 4/14/2025 11:50

Sample ID: 25D1389-11

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	91.6		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-4 30-36in

Sampled: 4/14/2025 11:55

Sample ID: 25D1389-12

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.79	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluoropentanoic acid (PFPeA)	0.16	0.40	0.12	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorohexanoic acid (PFHxA)	0.10	0.20	0.081	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluoroheptanoic acid (PFHpA)	0.21	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorooctanoic acid (PFOA)	0.34	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorononanoic acid (PFNA)	0.81	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorodecanoic acid (PFDA)	1.4	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluoroundecanoic acid (PFUnA)	0.089	0.20	0.082	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorooctanesulfonic acid (PFOS)	1.2	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	0.28	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.79	0.37	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	0.33	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.79	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
9Cl-PF3ONS (F53B Minor)	ND	0.79	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
11Cl-PF3OUs (F53B Major)	ND	0.79	0.26	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 12:33	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-4 30-36in

Sampled: 4/14/2025 11:55

Sample ID: 25D1389-12

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 12:33	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	77.2		8-130				4/25/25 12:33			
13C5-PFPeA	105		35-130				4/25/25 12:33			
13C5-PFHxA	106		40-130				4/25/25 12:33			
13C4-PFHpA	104		40-130				4/25/25 12:33			
13C8-PFOA	107		40-130				4/25/25 12:33			
13C9-PFNA	106		40-130				4/25/25 12:33			
13C6-PFDA	105		40-130				4/25/25 12:33			
13C7-PFUnA	117		40-130				4/25/25 12:33			
13C2-PFDoA	106		40-130				4/25/25 12:33			
13C2-PFTeDA	104		20-130				4/25/25 12:33			
13C3-PFBS	115		40-135				4/25/25 12:33			
13C3-PFHxS	109		40-130				4/25/25 12:33			
13C8-PFOS	101		40-130				4/25/25 12:33			
13C2-4:2FTS	124		40-165				4/25/25 12:33			
13C2-6:2FTS	126		40-215				4/25/25 12:33			
13C2-8:2FTS	110		40-275				4/25/25 12:33			
13C8-PFOSA	101		40-130				4/25/25 12:33			
D3-NMeFOSA	90.8		10-130				4/25/25 12:33			
D5-NEtFOSA	96.0		10-130				4/25/25 12:33			
D3-NMeFOSAA	102		40-135				4/25/25 12:33			
D5-NEtFOSAA	104		40-150				4/25/25 12:33			
D7-NMeFOSE	108		20-130				4/25/25 12:33			
D9-NEtFOSE	107		15-130				4/25/25 12:33			
13C3-HFPO-DA	105		40-130				4/25/25 12:33			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-4 30-36in

Sampled: 4/14/2025 11:55

Sample ID: 25D1389-12

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	86.5		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-5 0-2in

Sampled: 4/14/2025 12:05

Sample ID: 25D1389-13

Sample Matrix: Soil

Sample Flags: D-01

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	3.7	1.3	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluoropentanoic acid (PFPeA)	1.2	1.9	0.58	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorohexanoic acid (PFHxA)	1.1	0.93	0.38	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluoroheptanoic acid (PFHpA)	1.2	0.93	0.39	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorooctanoic acid (PFOA)	2.3	0.93	0.32	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorononanoic acid (PFNA)	1.9	0.93	0.35	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorodecanoic acid (PFDA)	4.8	0.93	0.29	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluoroundecanoic acid (PFUnA)	6.4	0.93	0.38	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorododecanoic acid (PFDoA)	2.6	0.93	0.35	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorotridecanoic acid (PFTrDA)	0.90	0.93	0.30	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorotetradecanoic acid (PFTeDA)	0.50	0.93	0.32	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.93	0.30	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluoropentanesulfonic acid (PFPeS)	0.70	0.93	0.30	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorohexanesulfonic acid (PFHxS)	7.9	0.93	0.35	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluoroheptanesulfonic acid (PFHpS)	0.77	0.93	0.49	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorooctanesulfonic acid (PFOS)	190	0.93	0.28	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorononanesulfonic acid (PFNS)	2.8	0.93	0.23	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorodecanesulfonic acid (PFDS)	1.5	0.93	0.30	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorododecanesulfonic acid (PFDoS)	0.48	0.93	0.27	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:03	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	3.7	1.4	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	4.7	3.7	1.3	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	7.7	3.7	1.7	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluorooctanesulfonamide (PFOSA)	1.5	0.93	0.38	µg/kg dry	1	PF-22	Draft Method 1633	4/29/25	5/1/25 13:03	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.93	0.26	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.93	0.42	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
N-MeFOSAA (NMeFOSAA)	ND	0.93	0.48	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
N-EtFOSAA (NEtFOSAA)	ND	0.93	0.43	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	9.3	3.0	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	9.3	3.3	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	3.7	1.6	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	3.7	1.5	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
9Cl-PF3ONS (F53B Minor)	ND	3.7	1.1	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
11Cl-PF3OUDs (F53B Major)	ND	3.7	1.2	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	4.7	2.3	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	23	7.2	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	23	7.4	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	1.9	0.68	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	1.9	0.43	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-5 0-2in

Sampled: 4/14/2025 12:05

Sample ID: 25D1389-13

Sample Matrix: Soil

Sample Flags: D-01

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	1.9	0.57	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	1.9	1.1	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:03	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	91.3		8-130				5/1/25 13:03			
13C5-PFPeA	94.2		35-130				5/1/25 13:03			
13C5-PFHxA	95.9		40-130				5/1/25 13:03			
13C4-PFHpA	91.3		40-130				5/1/25 13:03			
13C8-PFOA	108		40-130				5/1/25 13:03			
13C9-PFNA	96.1		40-130				5/1/25 13:03			
13C6-PFDA	98.5		40-130				5/1/25 13:03			
13C7-PFUnA	106		40-130				5/1/25 13:03			
13C2-PFDoA	100		40-130				5/1/25 13:03			
13C2-PFTeDA	111		20-130				5/1/25 13:03			
13C3-PFBS	99.6		40-135				5/1/25 13:03			
13C3-PFHxS	98.8		40-130				5/1/25 13:03			
13C8-PFOS	94.5		40-130				5/1/25 13:03			
13C2-4:2FTS	89.4		40-165				5/1/25 13:03			
13C2-6:2FTS	93.9		40-215				5/1/25 13:03			
13C2-8:2FTS	81.9		40-275				5/1/25 13:03			
13C8-PFOSA	105		40-130				5/1/25 13:03			
D3-NMeFOSA	90.6		10-130				5/1/25 13:03			
D5-NEtFOSA	89.9		10-130				5/1/25 13:03			
D3-NMeFOSAA	93.2		40-135				5/1/25 13:03			
D5-NEtFOSAA	96.8		40-150				5/1/25 13:03			
D7-NMeFOSE	104		20-130				5/1/25 13:03			
D9-NEtFOSE	103		15-130				5/1/25 13:03			
13C3-HFPO-DA	93.4		40-130				5/1/25 13:03			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-5 0-2in

Sampled: 4/14/2025 12:05

Sample ID: 25D1389-13

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	83.6		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-5 2-12in

Sampled: 4/14/2025 12:10

Sample ID: 25D1389-14

Sample Matrix: Soil

Sample Flags: D-01

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	1.6	0.55	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluoropentanoic acid (PFPeA)	0.73	0.80	0.25	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorohexanoic acid (PFHxA)	0.40	0.40	0.16	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluoroheptanoic acid (PFHpA)	0.39	0.40	0.17	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorooctanoic acid (PFOA)	0.71	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorononanoic acid (PFNA)	1.1	0.40	0.15	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorodecanoic acid (PFDA)	4.0	0.40	0.13	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluoroundecanoic acid (PFUnA)	0.72	0.40	0.16	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorododecanoic acid (PFDoA)	0.23	0.40	0.15	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.40	0.13	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.40	0.13	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.40	0.13	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorohexanesulfonic acid (PFHxS)	1.9	0.40	0.15	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluoroheptanesulfonic acid (PFHpS)	0.39	0.40	0.21	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorooctanesulfonic acid (PFOS)	87	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorononanesulfonic acid (PFNS)	0.55	0.40	0.10	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorodecanesulfonic acid (PFDS)	0.17	0.40	0.13	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	1.6	0.59	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	1.6	0.57	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	1.6	0.74	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluorooctanesulfonamide (PFOSA)	0.22	0.40	0.16	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:13	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.40	0.11	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.40	0.18	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
N-MeFOSAA (NMeFOSAA)	ND	0.40	0.20	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
N-EtFOSAA (NEtFOSAA)	ND	0.40	0.18	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	4.0	1.3	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	4.0	1.4	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	1.6	0.67	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	1.6	0.63	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
9Cl-PF3ONS (F53B Minor)	ND	1.6	0.47	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
11Cl-PF3OUDs (F53B Major)	ND	1.6	0.53	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	2.0	0.98	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	10	3.1	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	10	3.2	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.80	0.18	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-5 2-12in

Sampled: 4/14/2025 12:10

Sample ID: 25D1389-14

Sample Matrix: Soil

Sample Flags: D-01

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.80	0.25	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.80	0.49	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:13	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	92.9		8-130				5/1/25 13:13			
13C5-PFPeA	95.1		35-130				5/1/25 13:13			
13C5-PFHxA	98.9		40-130				5/1/25 13:13			
13C4-PFHpA	99.5		40-130				5/1/25 13:13			
13C8-PFOA	104		40-130				5/1/25 13:13			
13C9-PFNA	94.7		40-130				5/1/25 13:13			
13C6-PFDA	101		40-130				5/1/25 13:13			
13C7-PFUnA	115		40-130				5/1/25 13:13			
13C2-PFDoA	103		40-130				5/1/25 13:13			
13C2-PFTeDA	117		20-130				5/1/25 13:13			
13C3-PFBS	92.5		40-135				5/1/25 13:13			
13C3-PFHxS	98.4		40-130				5/1/25 13:13			
13C8-PFOS	98.5		40-130				5/1/25 13:13			
13C2-4:2FTS	143		40-165				5/1/25 13:13			
13C2-6:2FTS	154		40-215				5/1/25 13:13			
13C2-8:2FTS	153		40-275				5/1/25 13:13			
13C8-PFOSA	107		40-130				5/1/25 13:13			
D3-NMeFOSA	70.5		10-130				5/1/25 13:13			
D5-NEtFOSA	69.3		10-130				5/1/25 13:13			
D3-NMeFOSAA	90.7		40-135				5/1/25 13:13			
D5-NEtFOSAA	123		40-150				5/1/25 13:13			
D7-NMeFOSE	58.3		20-130				5/1/25 13:13			
D9-NEtFOSE	78.8		15-130				5/1/25 13:13			
13C3-HFPO-DA	89.2		40-130				5/1/25 13:13			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-5 2-12in

Sampled: 4/14/2025 12:10

Sample ID: 25D1389-14

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	89.2		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-5 30-36in

Sampled: 4/14/2025 12:15

Sample ID: 25D1389-15

Sample Matrix: Soil

Sample Flags: D-01

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	3.8	1.3	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluoropentanoic acid (PFPeA)	ND	1.9	0.60	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorohexanoic acid (PFHxA)	ND	0.96	0.39	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluoroheptanoic acid (PFHpA)	ND	0.96	0.40	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorooctanoic acid (PFOA)	0.49	0.96	0.33	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorononanoic acid (PFNA)	0.72	0.96	0.36	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorodecanoic acid (PFDA)	1.6	0.96	0.30	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.96	0.40	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorododecanoic acid (PFDoA)	ND	0.96	0.36	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.96	0.30	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.96	0.32	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.96	0.31	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.96	0.31	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorohexanesulfonic acid (PFHxS)	1.9	0.96	0.36	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.96	0.50	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorooctanesulfonic acid (PFOS)	160	0.96	0.29	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.96	0.24	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.96	0.31	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.96	0.28	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	3.8	1.4	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	3.8	1.4	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	3.8	1.8	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.96	0.39	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.96	0.27	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.96	0.43	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
N-MeFOSAA (NMeFOSAA)	ND	0.96	0.49	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
N-EtFOSAA (NEtFOSAA)	ND	0.96	0.44	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	9.6	3.1	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	9.6	3.4	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	3.8	1.6	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	3.8	1.5	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
9Cl-PF3ONS (F53B Minor)	ND	3.8	1.1	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
11Cl-PF3OUDs (F53B Major)	ND	3.8	1.3	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	4.8	2.4	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	24	7.4	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	24	7.6	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	1.9	0.70	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	1.9	0.44	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-5 30-36in

Sampled: 4/14/2025 12:15

Sample ID: 25D1389-15

Sample Matrix: Soil

Sample Flags: D-01

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	1.9	0.59	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	1.9	1.2	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:22	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	82.7		8-130				5/1/25 13:22			
13C5-PFPeA	89.0		35-130				5/1/25 13:22			
13C5-PFHxA	90.1		40-130				5/1/25 13:22			
13C4-PFHpA	87.9		40-130				5/1/25 13:22			
13C8-PFOA	91.3		40-130				5/1/25 13:22			
13C9-PFNA	90.9		40-130				5/1/25 13:22			
13C6-PFDA	86.9		40-130				5/1/25 13:22			
13C7-PFUnA	101		40-130				5/1/25 13:22			
13C2-PFDoA	92.7		40-130				5/1/25 13:22			
13C2-PFTeDA	99.4		20-130				5/1/25 13:22			
13C3-PFBS	87.1		40-135				5/1/25 13:22			
13C3-PFHxS	90.3		40-130				5/1/25 13:22			
13C8-PFOS	95.7		40-130				5/1/25 13:22			
13C2-4:2FTS	88.5		40-165				5/1/25 13:22			
13C2-6:2FTS	89.9		40-215				5/1/25 13:22			
13C2-8:2FTS	85.4		40-275				5/1/25 13:22			
13C8-PFOSA	103		40-130				5/1/25 13:22			
D3-NMeFOSA	83.8		10-130				5/1/25 13:22			
D5-NEtFOSA	85.3		10-130				5/1/25 13:22			
D3-NMeFOSAA	90.5		40-135				5/1/25 13:22			
D5-NEtFOSAA	95.3		40-150				5/1/25 13:22			
D7-NMeFOSE	97.2		20-130				5/1/25 13:22			
D9-NEtFOSE	95.3		15-130				5/1/25 13:22			
13C3-HFPO-DA	85.8		40-130				5/1/25 13:22			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-5 30-36in

Sampled: 4/14/2025 12:15

Sample ID: 25D1389-15

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	92.2		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-7 0-2in

Sampled: 4/14/2025 13:20

Sample ID: 25D1389-16

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.13	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.083	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorooctanoic acid (PFOA)	ND	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorononanoic acid (PFNA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorodecanoic acid (PFDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.083	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.068	µg/kg dry	1	PF-17	Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorooctanesulfonic acid (PFOS)	0.15	0.20	0.060	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.065	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.058	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.090	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
11Cl-PF3OUs (F53B Major)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 13:10	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-7 0-2in

Sampled: 4/14/2025 13:20

Sample ID: 25D1389-16

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:10	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	90.9		8-130				4/25/25 13:10			
13C5-PFPeA	101		35-130				4/25/25 13:10			
13C5-PFHxA	101		40-130				4/25/25 13:10			
13C4-PFHpA	101		40-130				4/25/25 13:10			
13C8-PFOA	98.6		40-130				4/25/25 13:10			
13C9-PFNA	101		40-130				4/25/25 13:10			
13C6-PFDA	104		40-130				4/25/25 13:10			
13C7-PFUnA	116		40-130				4/25/25 13:10			
13C2-PFDoA	118		40-130				4/25/25 13:10			
13C2-PFTeDA	131		* 20-130				4/25/25 13:10			
13C3-PFBS	108		40-135				4/25/25 13:10			
13C3-PFHxS	103		40-130				4/25/25 13:10			
13C8-PFOS	102		40-130				4/25/25 13:10			
13C2-4:2FTS	115		40-165				4/25/25 13:10			
13C2-6:2FTS	104		40-215				4/25/25 13:10			
13C2-8:2FTS	110		40-275				4/25/25 13:10			
13C8-PFOSA	104		40-130				4/25/25 13:10			
D3-NMeFOSA	94.8		10-130				4/25/25 13:10			
D5-NEtFOSA	100		10-130				4/25/25 13:10			
D3-NMeFOSAA	107		40-135				4/25/25 13:10			
D5-NEtFOSAA	110		40-150				4/25/25 13:10			
D7-NMeFOSE	104		20-130				4/25/25 13:10			
D9-NEtFOSE	106		15-130				4/25/25 13:10			
13C3-HFPO-DA	100		40-130				4/25/25 13:10			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-7 0-2in

Sampled: 4/14/2025 13:20

Sample ID: 25D1389-16

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	83.9		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-7 2-12in

Sampled: 4/14/2025 13:25

Sample ID: 25D1389-17

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.79	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorooctanoic acid (PFOA)	0.10	0.20	0.069	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorononanoic acid (PFNA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorodecanoic acid (PFDA)	ND	0.20	0.062	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorooctanesulfonic acid (PFOS)	0.14	0.20	0.060	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.049	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	0.28	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.79	0.36	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.70	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	0.33	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.79	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
9Cl-PF3ONS (F53B Minor)	ND	0.79	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
11Cl-PF3OUs (F53B Major)	ND	0.79	0.26	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 13:19	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-7 2-12in

Sampled: 4/14/2025 13:25

Sample ID: 25D1389-17

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:19	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	83.7		8-130				4/25/25 13:19			
13C5-PFPeA	104		35-130				4/25/25 13:19			
13C5-PFHxA	104		40-130				4/25/25 13:19			
13C4-PFHpA	102		40-130				4/25/25 13:19			
13C8-PFOA	107		40-130				4/25/25 13:19			
13C9-PFNA	107		40-130				4/25/25 13:19			
13C6-PFDA	114		40-130				4/25/25 13:19			
13C7-PFUnA	123		40-130				4/25/25 13:19			
13C2-PFDoA	115		40-130				4/25/25 13:19			
13C2-PFTeDA	130		20-130				4/25/25 13:19			
13C3-PFBS	120		40-135				4/25/25 13:19			
13C3-PFHxS	108		40-130				4/25/25 13:19			
13C8-PFOS	103		40-130				4/25/25 13:19			
13C2-4:2FTS	129		40-165				4/25/25 13:19			
13C2-6:2FTS	122		40-215				4/25/25 13:19			
13C2-8:2FTS	118		40-275				4/25/25 13:19			
13C8-PFOSA	108		40-130				4/25/25 13:19			
D3-NMeFOSA	91.8		10-130				4/25/25 13:19			
D5-NEtFOSA	100		10-130				4/25/25 13:19			
D3-NMeFOSAA	109		40-135				4/25/25 13:19			
D5-NEtFOSAA	108		40-150				4/25/25 13:19			
D7-NMeFOSE	110		20-130				4/25/25 13:19			
D9-NEtFOSE	110		15-130				4/25/25 13:19			
13C3-HFPO-DA	104		40-130				4/25/25 13:19			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-7 2-12in

Sampled: 4/14/2025 13:25

Sample ID: 25D1389-17

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	93.1		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-7 60-65in

Sampled: 4/14/2025 14:10

Sample ID: 25D1389-18

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.79	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorooctanoic acid (PFOA)	0.16	0.20	0.068	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorononanoic acid (PFNA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorodecanoic acid (PFDA)	ND	0.20	0.062	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorooctanesulfonic acid (PFOS)	0.088	0.20	0.060	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.049	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	0.28	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.79	0.36	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.70	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	0.33	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.79	0.31	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
9Cl-PF3ONS (F53B Minor)	ND	0.79	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
11Cl-PF3OUs (F53B Major)	ND	0.79	0.26	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.48	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 13:28	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	4.9	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	4.9	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.091	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-7 60-65in

Sampled: 4/14/2025 14:10

Sample ID: 25D1389-18

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:28	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	87.9		8-130				4/25/25 13:28			
13C5-PFPeA	107		35-130				4/25/25 13:28			
13C5-PFHxA	106		40-130				4/25/25 13:28			
13C4-PFHpA	102		40-130				4/25/25 13:28			
13C8-PFOA	105		40-130				4/25/25 13:28			
13C9-PFNA	107		40-130				4/25/25 13:28			
13C6-PFDA	104		40-130				4/25/25 13:28			
13C7-PFUnA	115		40-130				4/25/25 13:28			
13C2-PFDoA	106		40-130				4/25/25 13:28			
13C2-PFTeDA	121		20-130				4/25/25 13:28			
13C3-PFBS	116		40-135				4/25/25 13:28			
13C3-PFHxS	106		40-130				4/25/25 13:28			
13C8-PFOS	105		40-130				4/25/25 13:28			
13C2-4:2FTS	122		40-165				4/25/25 13:28			
13C2-6:2FTS	125		40-215				4/25/25 13:28			
13C2-8:2FTS	105		40-275				4/25/25 13:28			
13C8-PFOSA	111		40-130				4/25/25 13:28			
D3-NMeFOSA	93.3		10-130				4/25/25 13:28			
D5-NEtFOSA	98.7		10-130				4/25/25 13:28			
D3-NMeFOSAA	105		40-135				4/25/25 13:28			
D5-NEtFOSAA	106		40-150				4/25/25 13:28			
D7-NMeFOSE	111		20-130				4/25/25 13:28			
D9-NEtFOSE	113		15-130				4/25/25 13:28			
13C3-HFPO-DA	104		40-130				4/25/25 13:28			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-7 60-65in

Sampled: 4/14/2025 14:10

Sample ID: 25D1389-18

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	87.3		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-8 0-2in

Sampled: 4/14/2025 14:40

Sample ID: 25D1389-19

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.13	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluoroheptanoic acid (PFHpA)	0.11	0.20	0.083	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorooctanoic acid (PFOA)	0.26	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorononanoic acid (PFNA)	0.19	0.20	0.075	µg/kg dry	1	J	Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorodecanoic acid (PFDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.083	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.068	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorooctanesulfonic acid (PFOS)	0.26	0.20	0.061	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.065	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.058	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.056	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.090	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.65	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
11Cl-PF3OUs (F53B Major)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1	L-03	Draft Method 1633	4/23/25	4/25/25 13:37	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.15	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-8 0-2in

Sampled: 4/14/2025 14:40

Sample ID: 25D1389-19

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.25	µg/kg dry	1		Draft Method 1633	4/23/25	4/25/25 13:37	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	94.2		8-130				4/25/25 13:37			
13C5-PFPeA	106		35-130				4/25/25 13:37			
13C5-PFHxA	104		40-130				4/25/25 13:37			
13C4-PFHpA	104		40-130				4/25/25 13:37			
13C8-PFOA	115		40-130				4/25/25 13:37			
13C9-PFNA	108		40-130				4/25/25 13:37			
13C6-PFDA	108		40-130				4/25/25 13:37			
13C7-PFUnA	126		40-130				4/25/25 13:37			
13C2-PFDoA	114		40-130				4/25/25 13:37			
13C2-PFTeDA	119		20-130				4/25/25 13:37			
13C3-PFBS	111		40-135				4/25/25 13:37			
13C3-PFHxS	105		40-130				4/25/25 13:37			
13C8-PFOS	108		40-130				4/25/25 13:37			
13C2-4:2FTS	112		40-165				4/25/25 13:37			
13C2-6:2FTS	105		40-215				4/25/25 13:37			
13C2-8:2FTS	112		40-275				4/25/25 13:37			
13C8-PFOSA	111		40-130				4/25/25 13:37			
D3-NMeFOSA	98.0		10-130				4/25/25 13:37			
D5-NEtFOSA	103		10-130				4/25/25 13:37			
D3-NMeFOSAA	110		40-135				4/25/25 13:37			
D5-NEtFOSAA	119		40-150				4/25/25 13:37			
D7-NMeFOSE	111		20-130				4/25/25 13:37			
D9-NEtFOSE	111		15-130				4/25/25 13:37			
13C3-HFPO-DA	105		40-130				4/25/25 13:37			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-8 0-2in

Sampled: 4/14/2025 14:40

Sample ID: 25D1389-19

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	84.1		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-8 2-12in

Sampled: 4/14/2025 14:45

Sample ID: 25D1389-20

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.13	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.083	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorooctanoic acid (PFOA)	0.084	0.20	0.069	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorononanoic acid (PFNA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorodecanoic acid (PFDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.068	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorooctanesulfonic acid (PFOS)	0.081	0.20	0.060	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.065	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.058	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
11Cl-PF3OUDs (F53B Major)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-8 2-12in

Sampled: 4/14/2025 14:45

Sample ID: 25D1389-20

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:31	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	88.4		8-130				5/1/25 13:31			
13C5-PFPeA	89.9		35-130				5/1/25 13:31			
13C5-PFHxA	92.5		40-130				5/1/25 13:31			
13C4-PFHpA	86.8		40-130				5/1/25 13:31			
13C8-PFOA	96.9		40-130				5/1/25 13:31			
13C9-PFNA	89.6		40-130				5/1/25 13:31			
13C6-PFDA	86.0		40-130				5/1/25 13:31			
13C7-PFUnA	93.3		40-130				5/1/25 13:31			
13C2-PFDoA	87.7		40-130				5/1/25 13:31			
13C2-PFTeDA	97.1		20-130				5/1/25 13:31			
13C3-PFBS	90.6		40-135				5/1/25 13:31			
13C3-PFHxS	91.8		40-130				5/1/25 13:31			
13C8-PFOS	93.1		40-130				5/1/25 13:31			
13C2-4:2FTS	89.8		40-165				5/1/25 13:31			
13C2-6:2FTS	95.7		40-215				5/1/25 13:31			
13C2-8:2FTS	75.3		40-275				5/1/25 13:31			
13C8-PFOSA	97.0		40-130				5/1/25 13:31			
D3-NMeFOSA	82.3		10-130				5/1/25 13:31			
D5-NEtFOSA	87.1		10-130				5/1/25 13:31			
D3-NMeFOSAA	80.2		40-135				5/1/25 13:31			
D5-NEtFOSAA	79.9		40-150				5/1/25 13:31			
D7-NMeFOSE	94.0		20-130				5/1/25 13:31			
D9-NEtFOSE	93.2		15-130				5/1/25 13:31			
13C3-HFPO-DA	84.3		40-130				5/1/25 13:31			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-8 2-12in

Sampled: 4/14/2025 14:45

Sample ID: 25D1389-20

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	82.1		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-8 54-60in

Sampled: 4/14/2025 14:50

Sample ID: 25D1389-21

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorooctanoic acid (PFOA)	ND	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorononanoic acid (PFNA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorodecanoic acid (PFDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorooctanesulfonic acid (PFOS)	ND	0.20	0.060	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
11Cl-PF3OUDs (F53B Major)	ND	0.80	0.26	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML

Project Location: Mohawk, NY 39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332
 Date Received: 4/15/2025 Sample Description: Work Order: 25D1389
 Field Sample #: SB-8 54-60in Sampled: 4/14/2025 14:50
 Sample ID: 25D1389-21
 Sample Matrix: Soil

Semivolatle Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:40	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	93.2		8-130				5/1/25 13:40			
13C5-PFPeA	95.9		35-130				5/1/25 13:40			
13C5-PFHxA	96.0		40-130				5/1/25 13:40			
13C4-PFHpA	91.2		40-130				5/1/25 13:40			
13C8-PFOA	104		40-130				5/1/25 13:40			
13C9-PFNA	94.9		40-130				5/1/25 13:40			
13C6-PFDA	95.1		40-130				5/1/25 13:40			
13C7-PFUnA	100		40-130				5/1/25 13:40			
13C2-PFDoA	90.8		40-130				5/1/25 13:40			
13C2-PFTeDA	103		20-130				5/1/25 13:40			
13C3-PFBS	94.3		40-135				5/1/25 13:40			
13C3-PFHxS	93.8		40-130				5/1/25 13:40			
13C8-PFOS	92.9		40-130				5/1/25 13:40			
13C2-4:2FTS	93.8		40-165				5/1/25 13:40			
13C2-6:2FTS	97.5		40-215				5/1/25 13:40			
13C2-8:2FTS	79.2		40-275				5/1/25 13:40			
13C8-PFOA	99.0		40-130				5/1/25 13:40			
D3-NMeFOSA	84.6		10-130				5/1/25 13:40			
D5-NEtFOSA	85.6		10-130				5/1/25 13:40			
D3-NMeFOSAA	82.9		40-135				5/1/25 13:40			
D5-NEtFOSAA	83.6		40-150				5/1/25 13:40			
D7-NMeFOSE	95.1		20-130				5/1/25 13:40			
D9-NEtFOSE	95.8		15-130				5/1/25 13:40			
13C3-HFPO-DA	94.0		40-130				5/1/25 13:40			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: SB-8 54-60in

Sampled: 4/14/2025 14:50

Sample ID: 25D1389-21

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	75.1		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: Field Dup

Sampled: 4/14/2025 00:00

Sample ID: 25D1389-22

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.79	0.27	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluoropentanoic acid (PFPeA)	0.72	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorohexanoic acid (PFHxA)	0.37	0.20	0.081	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluoroheptanoic acid (PFHpA)	0.39	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorooctanoic acid (PFOA)	0.74	0.20	0.069	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorononanoic acid (PFNA)	1.1	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorodecanoic acid (PFDA)	3.7	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluoroundecanoic acid (PFUnA)	0.66	0.20	0.082	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorododecanoic acid (PFDoA)	0.20	0.20	0.074	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluoropentanesulfonic acid (PFPeS)	0.10	0.20	0.064	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorohexanesulfonic acid (PFHxS)	1.8	0.20	0.075	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluoroheptanesulfonic acid (PFHpS)	0.35	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorooctanesulfonic acid (PFOS)	93	2.0	0.60	µg/kg dry	10	D, MS-12	Draft Method 1633	4/29/25	5/7/25 3:59	CML
Perfluorononanesulfonic acid (PFNS)	0.53	0.20	0.050	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorodecanesulfonic acid (PFDS)	0.15	0.20	0.064	µg/kg dry	1	J	Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	0.29	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	0.28	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.79	0.37	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluorooctanesulfonamide (PFOSA)	0.23	0.20	0.081	µg/kg dry	1	PF-22	Draft Method 1633	4/29/25	5/1/25 13:49	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.091	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	0.33	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.79	0.32	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
9Cl-PF3ONS (F53B Minor)	ND	0.79	0.23	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
11Cl-PF3OUDs (F53B Major)	ND	0.79	0.26	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: Field Dup

Sampled: 4/14/2025 00:00

Sample ID: 25D1389-22

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	4/29/25	5/1/25 13:49	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	89.2		8-130				5/1/25 13:49			
13C5-PFPeA	91.0		35-130				5/1/25 13:49			
13C5-PFHxA	91.0		40-130				5/1/25 13:49			
13C4-PFHpA	95.5		40-130				5/1/25 13:49			
13C8-PFOA	97.2		40-130				5/1/25 13:49			
13C9-PFNA	89.4		40-130				5/1/25 13:49			
13C6-PFDA	92.5		40-130				5/1/25 13:49			
13C7-PFUnA	104		40-130				5/1/25 13:49			
13C2-PFDoA	98.5		40-130				5/1/25 13:49			
13C2-PFTeDA	101		20-130				5/1/25 13:49			
13C3-PFBS	90.3		40-135				5/1/25 13:49			
13C3-PFHxS	93.2		40-130				5/1/25 13:49			
13C8-PFOS	92.3		40-130				5/1/25 13:49			
13C8-PFOS	66.9		40-130				5/7/25 3:59			
13C2-4:2FTS	144		40-165				5/1/25 13:49			
13C2-6:2FTS	149		40-215				5/1/25 13:49			
13C2-8:2FTS	124		40-275				5/1/25 13:49			
13C8-PFOSA	107		40-130				5/1/25 13:49			
D3-NMeFOSA	61.3		10-130				5/1/25 13:49			
D5-NEtFOSA	58.8		10-130				5/1/25 13:49			
D3-NMeFOSAA	85.4		40-135				5/1/25 13:49			
D5-NEtFOSAA	92.1		40-150				5/1/25 13:49			
D7-NMeFOSE	71.7		20-130				5/1/25 13:49			
D9-NEtFOSE	66.3		15-130				5/1/25 13:49			
13C3-HFPO-DA	87.9		40-130				5/1/25 13:49			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Sampled: 4/14/2025 00:00

Field Sample #: Field Dup

Sample ID: 25D1389-22

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	90.2		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: Equipment Blank

Sampled: 4/14/2025 10:10

Sample ID: 25D1389-23

Sample Matrix: Equipment Blank Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	7.0	0.88	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluoropentanoic acid (PFPeA)	ND	3.5	0.49	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorohexanoic acid (PFHxA)	ND	1.7	0.30	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluoroheptanoic acid (PFHpA)	ND	1.7	0.31	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorooctanoic acid (PFOA)	ND	1.7	0.46	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorononanoic acid (PFNA)	ND	1.7	0.71	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorodecanoic acid (PFDA)	ND	1.7	0.42	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluoroundecanoic acid (PFUnA)	ND	1.7	0.56	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorododecanoic acid (PFDoA)	ND	1.7	0.38	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorotridecanoic acid (PFTrDA)	ND	1.7	0.53	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorotetradecanoic acid (PFTeDA)	ND	1.7	0.17	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorobutanesulfonic acid (PFBS)	ND	1.7	0.38	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluoropentanesulfonic acid (PFPeS)	ND	1.7	0.51	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorohexanesulfonic acid (PFHxS)	ND	1.7	0.68	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.7	0.93	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorooctanesulfonic acid (PFOS)	ND	1.7	0.43	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorononanesulfonic acid (PFNS)	ND	1.7	0.51	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorodecanesulfonic acid (PFDS)	ND	1.7	0.55	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorododecanesulfonic acid (PFDoS)	ND	1.7	0.79	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	7.0	1.5	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	7.0	3.3	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	7.0	3.6	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluorooctanesulfonamide (PFOSA)	ND	1.7	0.61	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.7	0.30	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.7	0.36	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
N-MeFOSAA (NMeFOSAA)	ND	1.7	1.7	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
N-EtFOSAA (NEtFOSAA)	ND	1.7	0.71	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	17	1.4	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	17	1.8	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	7.0	1.7	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	7.0	0.93	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
9Cl-PF3ONS (F53B Minor)	ND	7.0	1.0	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
11Cl-PF3OUDs (F53B Major)	ND	7.0	1.8	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	8.7	2.5	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	44	7.7	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	44	9.8	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	3.5	0.62	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	3.5	0.50	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25D1389

Date Received: 4/15/2025

Field Sample #: Equipment Blank

Sampled: 4/14/2025 10:10

Sample ID: 25D1389-23

Sample Matrix: Equipment Blank Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	3.5	0.47	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	3.5	2.3	ng/L	1		Draft Method 1633	5/1/25	5/3/25 0:31	JR2
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	103		5-130				5/3/25 0:31			
13C5-PFPeA	105		40-130				5/3/25 0:31			
13C5-PFHxA	105		40-130				5/3/25 0:31			
13C4-PFHpA	103		40-130				5/3/25 0:31			
13C8-PFOA	111		40-130				5/3/25 0:31			
13C9-PFNA	103		40-130				5/3/25 0:31			
13C6-PFDA	97.7		40-130				5/3/25 0:31			
13C7-PFUnA	90.7		30-130				5/3/25 0:31			
13C2-PFDoA	85.0		10-130				5/3/25 0:31			
13C2-PFTeDA	80.1		10-130				5/3/25 0:31			
13C3-PFBS	111		40-135				5/3/25 0:31			
13C3-PFHxS	104		40-130				5/3/25 0:31			
13C8-PFOS	101		40-130				5/3/25 0:31			
13C2-4:2FTS	106		40-200				5/3/25 0:31			
13C2-6:2FTS	108		40-200				5/3/25 0:31			
13C2-8:2FTS	105		40-300				5/3/25 0:31			
13C8-PFOSA	83.6		40-130				5/3/25 0:31			
D3-NMeFOSA	80.3		10-130				5/3/25 0:31			
D5-NEtFOSA	78.0		10-130				5/3/25 0:31			
D3-NMeFOSAA	98.8		40-170				5/3/25 0:31			
D5-NEtFOSAA	93.4		25-135				5/3/25 0:31			
D7-NMeFOSE	82.1		10-130				5/3/25 0:31			
D9-NEtFOSE	81.0		10-130				5/3/25 0:31			
13C3-HFPO-DA	109		40-130				5/3/25 0:31			

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Sample Extraction Data

Prep Method:EPA 1633 **Analytical Method:**Draft Method 1633

Lab Number [Field ID]	Batch	Initial [g]	Final [mL]	Date
25D1389-01 [SB-1 0-2in]	B403456	6.39	4.00	04/23/25
25D1389-02 [SB-1 2-12in]	B403456	6.02	4.00	04/23/25
25D1389-03 [SB-1 18-24in]	B403456	6.20	4.00	04/23/25
25D1389-04 [SB-2 0-2in]	B403456	5.74	4.00	04/23/25
25D1389-05 [SB-2 2-12in]	B403456	5.67	4.00	04/23/25
25D1389-06 [SB-2 18-24in]	B403456	6.10	4.00	04/23/25
25D1389-07 [SB-3 0-2in]	B403456	5.91	4.00	04/23/25
25D1389-08 [SB-3 2-12in]	B403456	5.55	4.00	04/23/25
25D1389-09 [SB-3 20-24in]	B403456	5.87	4.00	04/23/25
25D1389-10 [SB-4 0-2in]	B403456	5.69	4.00	04/23/25
25D1389-11 [SB-4 2-12n]	B403456	5.49	4.00	04/23/25
25D1389-12 [SB-4 30-36in]	B403456	5.83	4.00	04/23/25
25D1389-16 [SB-7 0-2in]	B403456	5.97	4.00	04/23/25
25D1389-17 [SB-7 2-12in]	B403456	5.42	4.00	04/23/25
25D1389-18 [SB-7 60-65in]	B403456	5.80	4.00	04/23/25
25D1389-19 [SB-8 0-2in]	B403456	5.94	4.00	04/23/25

Prep Method:EPA 1633 **Analytical Method:**Draft Method 1633

Lab Number [Field ID]	Batch	Initial [g]	Final [mL]	Date
25D1389-13RE1 [SB-5 0-2in]	B403618	1.28	4.00	04/29/25
25D1389-14RE1 [SB-5 2-12in]	B403618	2.81	4.00	04/29/25
25D1389-15RE1 [SB-5 30-36in]	B403618	1.13	4.00	04/29/25
25D1389-20 [SB-8 2-12in]	B403618	6.10	4.00	04/29/25
25D1389-21 [SB-8 54-60in]	B403618	6.68	4.00	04/29/25
25D1389-22 [Field Dup]	B403618	5.58	4.00	04/29/25
25D1389-22RE1 [Field Dup]	B403618	5.58	4.00	04/29/25

Prep Method:EPA 1633 **Analytical Method:**Draft Method 1633

Lab Number [Field ID]	Batch	Initial [mL]	Final [mL]	Date
25D1389-23RE1 [Equipment Blank]	B404052	457	4.00	05/01/25

Prep Method:% Solids **Analytical Method:**SM 2540G

Lab Number [Field ID]	Batch	Date
25D1389-01 [SB-1 0-2in]	B403480	04/21/25
25D1389-02 [SB-1 2-12in]	B403480	04/21/25
25D1389-03 [SB-1 18-24in]	B403480	04/21/25
25D1389-04 [SB-2 0-2in]	B403480	04/21/25
25D1389-05 [SB-2 2-12in]	B403480	04/21/25
25D1389-06 [SB-2 18-24in]	B403480	04/21/25
25D1389-07 [SB-3 0-2in]	B403480	04/21/25
25D1389-08 [SB-3 2-12in]	B403480	04/21/25
25D1389-09 [SB-3 20-24in]	B403480	04/21/25
25D1389-10 [SB-4 0-2in]	B403480	04/21/25
25D1389-11 [SB-4 2-12n]	B403480	04/21/25
25D1389-12 [SB-4 30-36in]	B403480	04/21/25
25D1389-13 [SB-5 0-2in]	B403480	04/21/25
25D1389-14 [SB-5 2-12in]	B403480	04/21/25
25D1389-15 [SB-5 30-36in]	B403480	04/21/25

**Sample Extraction Data****Prep Method:**% Solids **Analytical Method:**SM 2540G

Lab Number [Field ID]	Batch	Date
25D1389-16 [SB-7 0-2in]	B403480	04/21/25
25D1389-17 [SB-7 2-12in]	B403480	04/21/25
25D1389-18 [SB-7 60-65in]	B403480	04/21/25
25D1389-19 [SB-8 0-2in]	B403480	04/21/25
25D1389-20 [SB-8 2-12in]	B403480	04/21/25
25D1389-21 [SB-8 54-60in]	B403480	04/21/25
25D1389-22 [Field Dup]	B403480	04/21/25

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403456 - EPA 1633										
Blank (B403456-BLK1)										
Prepared: 04/23/25 Analyzed: 04/25/25										
Perfluorobutanoic acid (PFBA)	ND	0.79	µg/kg wet							
Perfluoropentanoic acid (PFPeA)	ND	0.39	µg/kg wet							
Perfluorohexanoic acid (PFHxA)	ND	0.20	µg/kg wet							
Perfluoroheptanoic acid (PFHpA)	ND	0.20	µg/kg wet							
Perfluorooctanoic acid (PFOA)	ND	0.20	µg/kg wet							
Perfluorononanoic acid (PFNA)	ND	0.20	µg/kg wet							
Perfluorodecanoic acid (PFDA)	ND	0.20	µg/kg wet							
Perfluoroundecanoic acid (PFUnA)	ND	0.20	µg/kg wet							
Perfluorododecanoic acid (PFDoA)	ND	0.20	µg/kg wet							
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	µg/kg wet							
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	µg/kg wet							
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	µg/kg wet							
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	µg/kg wet							
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	µg/kg wet							
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	µg/kg wet							
Perfluorooctanesulfonic acid (PFOS)	ND	0.20	µg/kg wet							
Perfluorononanesulfonic acid (PFNS)	ND	0.20	µg/kg wet							
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	µg/kg wet							
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	µg/kg wet							
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	µg/kg wet							
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	µg/kg wet							
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.79	µg/kg wet							
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	µg/kg wet							
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	µg/kg wet							
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	µg/kg wet							
N-MeFOSAA (NMeFOSAA)	ND	0.20	µg/kg wet							
N-EtFOSAA (NEtFOSAA)	ND	0.20	µg/kg wet							
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	µg/kg wet							
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	µg/kg wet							
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	µg/kg wet							
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	0.79	µg/kg wet							
9Cl-PF3ONS (F53B Minor)	ND	0.79	µg/kg wet							
11Cl-PF3OUs (F53B Major)	ND	0.79	µg/kg wet							
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.98	µg/kg wet							L-03
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	4.9	µg/kg wet							
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	ND	4.9	µg/kg wet							
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.39	µg/kg wet							
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.39	µg/kg wet							
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.39	µg/kg wet							
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.39	µg/kg wet							
Surrogate: 13C4-PFBA	4.86		µg/kg wet	7.852		61.9	8-130			

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403456 - EPA 1633

Blank (B403456-BLK1)

Prepared: 04/23/25 Analyzed: 04/25/25

Surrogate: 13C5-PFPeA	3.52		µg/kg wet	3.926		89.5	35-130			
Surrogate: 13C5-PFHxA	1.80		µg/kg wet	1.963		91.8	40-130			
Surrogate: 13C4-PFHpA	1.75		µg/kg wet	1.963		89.3	40-130			
Surrogate: 13C8-PFOA	1.72		µg/kg wet	1.963		87.6	40-130			
Surrogate: 13C9-PFNA	0.899		µg/kg wet	0.9815		91.6	40-130			
Surrogate: 13C6-PFDA	0.860		µg/kg wet	0.9815		87.6	40-130			
Surrogate: 13C7-PFUnA	0.984		µg/kg wet	0.9815		100	40-130			
Surrogate: 13C2-PFDoA	0.859		µg/kg wet	0.9815		87.6	40-130			
Surrogate: 13C2-PFTeDA	0.873		µg/kg wet	0.9815		88.9	20-130			
Surrogate: 13C3-PFBS	1.87		µg/kg wet	1.963		95.4	40-135			
Surrogate: 13C3-PFHxS	1.68		µg/kg wet	1.963		85.7	40-130			
Surrogate: 13C8-PFOS	1.73		µg/kg wet	1.963		88.1	40-130			
Surrogate: 13C2-4:2FTS	3.91		µg/kg wet	3.926		99.7	40-165			
Surrogate: 13C2-6:2FTS	3.85		µg/kg wet	3.926		98.1	40-215			
Surrogate: 13C2-8:2FTS	3.49		µg/kg wet	3.926		88.8	40-275			
Surrogate: 13C8-PFOA	1.75		µg/kg wet	1.963		89.0	40-130			
Surrogate: D3-NMeFOSA	1.55		µg/kg wet	1.963		79.1	10-130			
Surrogate: D5-NEtFOSA	1.66		µg/kg wet	1.963		84.4	10-130			
Surrogate: D3-NMeFOSAA	3.70		µg/kg wet	3.926		94.3	40-135			
Surrogate: D5-NEtFOSAA	3.51		µg/kg wet	3.926		89.5	40-150			
Surrogate: D7-NMeFOSE	18.6		µg/kg wet	19.63		95.0	20-130			
Surrogate: D9-NEtFOSE	18.1		µg/kg wet	19.63		92.1	15-130			
Surrogate: 13C3-HFPO-DA	7.19		µg/kg wet	7.852		91.5	40-130			

LCS (B403456-BS1)

Prepared: 04/23/25 Analyzed: 04/25/25

Perfluorobutanoic acid (PFBA)	6.56	0.79	µg/kg wet	7.910		82.9	70-140			
Perfluoropentanoic acid (PFPeA)	3.30	0.40	µg/kg wet	3.955		83.4	60-150			
Perfluorohexanoic acid (PFHxA)	1.65	0.20	µg/kg wet	1.977		83.5	65-140			
Perfluoroheptanoic acid (PFHpA)	1.64	0.20	µg/kg wet	1.977		82.9	65-145			
Perfluorooctanoic acid (PFOA)	1.53	0.20	µg/kg wet	1.977		77.2	70-150			
Perfluorononanoic acid (PFNA)	1.61	0.20	µg/kg wet	1.977		81.5	70-155			
Perfluorodecanoic acid (PFDA)	1.68	0.20	µg/kg wet	1.977		85.0	70-155			
Perfluoroundecanoic acid (PFUnA)	1.65	0.20	µg/kg wet	1.977		83.2	70-155			
Perfluorododecanoic acid (PFDoA)	1.72	0.20	µg/kg wet	1.977		87.0	70-150			
Perfluorotridecanoic acid (PFTTrDA)	1.68	0.20	µg/kg wet	1.977		84.8	65-150			
Perfluorotetradecanoic acid (PFTeDA)	1.71	0.20	µg/kg wet	1.977		86.7	65-150			
Perfluorobutanesulfonic acid (PFBS)	1.47	0.20	µg/kg wet	1.756		83.9	65-145			
Perfluoropentanesulfonic acid (PFPeS)	1.60	0.20	µg/kg wet	1.859		86.3	55-160			
Perfluorohexanesulfonic acid (PFHxS)	1.52	0.20	µg/kg wet	1.803		84.1	60-150			
Perfluoroheptanesulfonic acid (PFHpS)	1.49	0.20	µg/kg wet	1.883		79.4	65-155			
Perfluorooctanesulfonic acid (PFOS)	1.47	0.20	µg/kg wet	1.835		80.0	65-160			
Perfluorononanesulfonic acid (PFNS)	1.62	0.20	µg/kg wet	1.898		85.5	55-140			
Perfluorodecanesulfonic acid (PFDS)	1.56	0.20	µg/kg wet	1.906		81.8	40-155			
Perfluorododecanesulfonic acid (PFDoS)	1.52	0.20	µg/kg wet	1.914		79.3	25-160			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	7.00	0.79	µg/kg wet	7.412		94.4	60-150			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	6.89	0.79	µg/kg wet	7.522		91.5	55-200			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	7.61	0.79	µg/kg wet	7.593		100	70-150			
Perfluorooctanesulfonamide (PFOSA)	1.57	0.20	µg/kg wet	1.977		79.3	70-140			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	1.71	0.20	µg/kg wet	1.977		86.3	70-155			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403456 - EPA 1633										
LCS (B403456-BS1)										
Prepared: 04/23/25 Analyzed: 04/25/25										
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	1.59	0.20	µg/kg wet	1.977		80.4	70-140			
N-MeFOSAA (NMeFOSAA)	1.55	0.20	µg/kg wet	1.977		78.2	65-155			
N-EtFOSAA (NEtFOSAA)	1.66	0.20	µg/kg wet	1.977		83.8	65-165			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	16.7	2.0	µg/kg wet	19.77		84.7	70-140			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	17.2	2.0	µg/kg wet	19.77		87.1	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	6.84	0.79	µg/kg wet	7.910		86.5	70-145			
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	6.24	0.79	µg/kg wet	7.475		83.5	70-160			
9Cl-PF3ONS (F53B Minor)	6.47	0.79	µg/kg wet	7.380		87.7	70-150			
11Cl-PF3OUDS (F53B Major)	6.92	0.79	µg/kg wet	7.356		94.1	45-160			
3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTCA)	3.69	0.99	µg/kg wet	9.887		37.3	* 45-130			L-03
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	42.0	4.9	µg/kg wet	49.44		84.9	60-130			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	46.0	4.9	µg/kg wet	49.44		93.0	60-150			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEA)	2.89	0.40	µg/kg wet	3.528		82.0	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	3.39	0.40	µg/kg wet	3.955		85.6	30-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	3.32	0.40	µg/kg wet	3.955		84.1	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	3.19	0.40	µg/kg wet	3.955		80.6	60-155			
Surrogate: 13C4-PFBA	5.90		µg/kg wet	7.910		74.6	8-130			
Surrogate: 13C5-PFPeA	3.97		µg/kg wet	3.955		100	35-130			
Surrogate: 13C5-PFHxA	1.97		µg/kg wet	1.977		99.7	40-130			
Surrogate: 13C4-PFHpA	1.91		µg/kg wet	1.977		96.8	40-130			
Surrogate: 13C8-PFOA	1.98		µg/kg wet	1.977		100	40-130			
Surrogate: 13C9-PFNA	0.996		µg/kg wet	0.9887		101	40-130			
Surrogate: 13C6-PFDA	0.986		µg/kg wet	0.9887		99.7	40-130			
Surrogate: 13C7-PFUnA	1.08		µg/kg wet	0.9887		109	40-130			
Surrogate: 13C2-PFDoA	0.971		µg/kg wet	0.9887		98.2	40-130			
Surrogate: 13C2-PFTeDA	0.944		µg/kg wet	0.9887		95.5	20-130			
Surrogate: 13C3-PFBS	2.09		µg/kg wet	1.977		106	40-135			
Surrogate: 13C3-PFHxS	1.90		µg/kg wet	1.977		96.1	40-130			
Surrogate: 13C8-PFOS	1.97		µg/kg wet	1.977		99.4	40-130			
Surrogate: 13C2-4:2FTS	4.13		µg/kg wet	3.955		104	40-165			
Surrogate: 13C2-6:2FTS	4.20		µg/kg wet	3.955		106	40-215			
Surrogate: 13C2-8:2FTS	3.77		µg/kg wet	3.955		95.4	40-275			
Surrogate: 13C8-PFOSA	2.03		µg/kg wet	1.977		103	40-130			
Surrogate: D3-NMeFOSA	1.72		µg/kg wet	1.977		86.9	10-130			
Surrogate: D5-NEtFOSA	1.80		µg/kg wet	1.977		91.2	10-130			
Surrogate: D3-NMeFOSAA	4.13		µg/kg wet	3.955		104	40-135			
Surrogate: D5-NEtFOSAA	4.00		µg/kg wet	3.955		101	40-150			
Surrogate: D7-NMeFOSE	20.3		µg/kg wet	19.77		103	20-130			
Surrogate: D9-NEtFOSE	19.6		µg/kg wet	19.77		98.9	15-130			
Surrogate: 13C3-HFPO-DA	7.92		µg/kg wet	7.910		100	40-130			
MRL Check (B403456-MRL1)										
Prepared: 04/23/25 Analyzed: 04/25/25										
Perfluorobutanoic acid (PFBA)	1.33	0.79	µg/kg wet	1.580		84.2	70-140			
Perfluoropentanoic acid (PFPeA)	0.646	0.39	µg/kg wet	0.7899		81.8	60-150			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403456 - EPA 1633										
MRL Check (B403456-MRL1)				Prepared: 04/23/25 Analyzed: 04/25/25						
Perfluorohexanoic acid (PFHxA)	0.305	0.20	µg/kg wet	0.3949		77.2	65-140			
Perfluoroheptanoic acid (PFHpA)	0.328	0.20	µg/kg wet	0.3949		83.1	65-145			
Perfluorooctanoic acid (PFOA)	0.355	0.20	µg/kg wet	0.3949		90.0	70-150			
Perfluorononanoic acid (PFNA)	0.305	0.20	µg/kg wet	0.3949		77.3	70-155			
Perfluorodecanoic acid (PFDA)	0.331	0.20	µg/kg wet	0.3949		83.8	70-155			
Perfluoroundecanoic acid (PFUnA)	0.303	0.20	µg/kg wet	0.3949		76.7	70-155			
Perfluorododecanoic acid (PFDoA)	0.340	0.20	µg/kg wet	0.3949		86.1	70-150			
Perfluorotridecanoic acid (PFTrDA)	0.347	0.20	µg/kg wet	0.3949		87.9	65-150			
Perfluorotetradecanoic acid (PFTeDA)	0.311	0.20	µg/kg wet	0.3949		78.8	65-150			
Perfluorobutanesulfonic acid (PFBS)	0.274	0.20	µg/kg wet	0.3507		78.3	65-145			
Perfluoropentanesulfonic acid (PFPeS)	0.284	0.20	µg/kg wet	0.3712		76.6	55-160			
Perfluorohexanesulfonic acid (PFHxS)	0.294	0.20	µg/kg wet	0.3602		81.6	60-150			
Perfluoroheptanesulfonic acid (PFHpS)	0.324	0.20	µg/kg wet	0.3760		86.2	65-155			
Perfluorooctanesulfonic acid (PFOS)	0.315	0.20	µg/kg wet	0.3665		86.1	65-160			
Perfluorononanesulfonic acid (PFNS)	0.326	0.20	µg/kg wet	0.3791		85.9	55-140			
Perfluorodecanesulfonic acid (PFDS)	0.312	0.20	µg/kg wet	0.3807		81.9	40-155			
Perfluorododecanesulfonic acid (PFDoS)	0.339	0.20	µg/kg wet	0.3823		88.6	25-160			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	1.30	0.79	µg/kg wet	1.480		87.5	60-150			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	1.38	0.79	µg/kg wet	1.502		91.8	55-200			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	1.34	0.79	µg/kg wet	1.517		88.3	70-150			
Perfluorooctanesulfonamide (PFOSA)	0.286	0.20	µg/kg wet	0.3949		72.3	70-140			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	0.322	0.20	µg/kg wet	0.3949		81.4	70-155			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	0.334	0.20	µg/kg wet	0.3949		84.7	70-140			
N-MeFOSAA (NMeFOSAA)	0.324	0.20	µg/kg wet	0.3949		82.1	65-155			
N-EtFOSAA (NEtFOSAA)	0.264	0.20	µg/kg wet	0.3949		67.0	65-165			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	3.23	2.0	µg/kg wet	3.949		81.8	70-140			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	3.26	2.0	µg/kg wet	3.949		82.5	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	1.33	0.79	µg/kg wet	1.580		84.2	70-145			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	1.22	0.79	µg/kg wet	1.493		81.7	70-160			
9Cl-PF3ONS (F53B Minor)	1.40	0.79	µg/kg wet	1.474		94.7	70-150			
11Cl-PF3OUDS (F53B Major)	1.49	0.79	µg/kg wet	1.476		101	45-160			
3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTCA)	0.741	0.99	µg/kg wet	1.975		37.5	* 45-130			L-03, J
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	8.07	4.9	µg/kg wet	9.874		81.7	60-130			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	8.99	4.9	µg/kg wet	9.874		91.0	60-150			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	0.567	0.39	µg/kg wet	0.7046		80.4	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	0.672	0.39	µg/kg wet	0.7899		85.1	30-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	0.639	0.39	µg/kg wet	0.7899		80.9	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	0.697	0.39	µg/kg wet	0.7899		88.2	60-155			
Surrogate: 13C4-PFBA	5.51		µg/kg wet	7.899		69.8	8-130			
Surrogate: 13C5-PFPeA	3.80		µg/kg wet	3.949		96.2	35-130			
Surrogate: 13C5-PFHxA	1.93		µg/kg wet	1.975		97.6	40-130			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403456 - EPA 1633
MRL Check (B403456-MRL1)

Prepared: 04/23/25 Analyzed: 04/25/25

Surrogate: 13C4-PFHpA	1.88		µg/kg wet	1.975		95.1	40-130			
Surrogate: 13C8-PFOA	1.96		µg/kg wet	1.975		99.2	40-130			
Surrogate: 13C9-PFNA	0.970		µg/kg wet	0.9874		98.2	40-130			
Surrogate: 13C6-PFDA	0.989		µg/kg wet	0.9874		100	40-130			
Surrogate: 13C7-PFUnA	1.11		µg/kg wet	0.9874		113	40-130			
Surrogate: 13C2-PFDoA	0.972		µg/kg wet	0.9874		98.5	40-130			
Surrogate: 13C2-PFTeDA	0.972		µg/kg wet	0.9874		98.4	20-130			
Surrogate: 13C3-PFBS	2.20		µg/kg wet	1.975		111	40-135			
Surrogate: 13C3-PFHxS	2.00		µg/kg wet	1.975		101	40-130			
Surrogate: 13C8-PFOS	1.87		µg/kg wet	1.975		94.6	40-130			
Surrogate: 13C2-4:2FTS	4.38		µg/kg wet	3.949		111	40-165			
Surrogate: 13C2-6:2FTS	4.36		µg/kg wet	3.949		110	40-215			
Surrogate: 13C2-8:2FTS	4.07		µg/kg wet	3.949		103	40-275			
Surrogate: 13C8-PFOSA	2.02		µg/kg wet	1.975		102	40-130			
Surrogate: D3-NMeFOSA	1.78		µg/kg wet	1.975		89.9	10-130			
Surrogate: D5-NEtFOSA	1.72		µg/kg wet	1.975		87.3	10-130			
Surrogate: D3-NMeFOSAA	4.14		µg/kg wet	3.949		105	40-135			
Surrogate: D5-NEtFOSAA	4.01		µg/kg wet	3.949		101	40-150			
Surrogate: D7-NMeFOSE	20.5		µg/kg wet	19.75		104	20-130			
Surrogate: D9-NEtFOSE	20.3		µg/kg wet	19.75		103	15-130			
Surrogate: 13C3-HFPO-DA	7.62		µg/kg wet	7.899		96.4	40-130			

Matrix Spike (B403456-MS1)

Source: 25D1389-11

Prepared: 04/23/25 Analyzed: 04/25/25

Perfluorobutanoic acid (PFBA)	7.41	0.80	µg/kg dry	7.979	ND	92.9	70-140			
Perfluoropentanoic acid (PFPeA)	4.16	0.40	µg/kg dry	3.990	0.522	91.1	60-150			
Perfluorohexanoic acid (PFHxA)	2.04	0.20	µg/kg dry	1.995	0.165	94.2	65-140			
Perfluoroheptanoic acid (PFHpA)	2.22	0.20	µg/kg dry	1.995	0.370	92.8	65-145			
Perfluorooctanoic acid (PFOA)	2.24	0.20	µg/kg dry	1.995	0.473	88.6	70-150			
Perfluorononanoic acid (PFNA)	2.51	0.20	µg/kg dry	1.995	0.690	91.4	70-155			
Perfluorodecanoic acid (PFDA)	3.84	0.20	µg/kg dry	1.995	2.07	88.7	70-155			
Perfluoroundecanoic acid (PFUnA)	2.24	0.20	µg/kg dry	1.995	0.377	93.2	70-155			
Perfluorododecanoic acid (PFDoA)	1.98	0.20	µg/kg dry	1.995	0.0810	95.3	70-150			
Perfluorotridecanoic acid (PFTrDA)	1.98	0.20	µg/kg dry	1.995	ND	99.2	65-150			
Perfluorotetradecanoic acid (PFTeDA)	1.88	0.20	µg/kg dry	1.995	ND	94.3	65-150			
Perfluorobutanesulfonic acid (PFBS)	1.74	0.20	µg/kg dry	1.771	ND	98.0	65-145			
Perfluoropentanesulfonic acid (PFPeS)	1.74	0.20	µg/kg dry	1.875	ND	92.9	55-160			
Perfluorohexanesulfonic acid (PFHxS)	1.77	0.20	µg/kg dry	1.819	ND	97.1	60-150			
Perfluoroheptanesulfonic acid (PFHpS)	1.71	0.20	µg/kg dry	1.899	ND	90.2	65-155			
Perfluorooctanesulfonic acid (PFOS)	2.13	0.20	µg/kg dry	1.851	0.509	87.5	65-160			
Perfluorononanesulfonic acid (PFNS)	1.80	0.20	µg/kg dry	1.915	ND	94.0	55-140			
Perfluorodecanesulfonic acid (PFDS)	1.83	0.20	µg/kg dry	1.923	ND	95.0	40-155			
Perfluorododecanesulfonic acid (PFDoS)	1.75	0.20	µg/kg dry	1.931	ND	90.5	25-160			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	7.65	0.80	µg/kg dry	7.476	ND	102	60-150			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	7.94	0.80	µg/kg dry	7.588	ND	105	55-200			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	7.77	0.80	µg/kg dry	7.660	ND	101	70-150			
Perfluorooctanesulfonamide (PFOSA)	1.76	0.20	µg/kg dry	1.995	ND	88.1	70-140			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	1.74	0.20	µg/kg dry	1.995	ND	87.2	70-155			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	1.81	0.20	µg/kg dry	1.995	ND	90.9	70-140			
N-MeFOSAA (NMeFOSAA)	1.63	0.20	µg/kg dry	1.995	ND	81.9	65-155			

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403456 - EPA 1633										
Matrix Spike (B403456-MS1)	Source: 25D1389-11			Prepared: 04/23/25 Analyzed: 04/25/25						
N-EtFOSAA (NEtFOSAA)	1.68	0.20	µg/kg dry	1.995	ND	84.1	65-165			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	18.5	2.0	µg/kg dry	19.95	ND	92.9	70-140			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	18.8	2.0	µg/kg dry	19.95	ND	94.1	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	7.43	0.80	µg/kg dry	7.979	ND	93.1	70-145			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	6.85	0.80	µg/kg dry	7.540	ND	90.9	70-160			
9Cl-PF3ONS (F53B Minor)	7.47	0.80	µg/kg dry	7.445	ND	100	70-150			
11Cl-PF3OUdS (F53B Major)	7.96	0.80	µg/kg dry	7.421	ND	107	45-160			
3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTCA)	3.50	1.0	µg/kg dry	9.974	ND	35.1	* 45-130			L-03, MS-07A
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	42.5	5.0	µg/kg dry	49.87	ND	85.3	60-130			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	47.2	5.0	µg/kg dry	49.87	ND	94.7	60-150			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	3.14	0.40	µg/kg dry	3.559	ND	88.4	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	3.71	0.40	µg/kg dry	3.990	ND	92.9	30-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	3.69	0.40	µg/kg dry	3.990	ND	92.6	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	3.81	0.40	µg/kg dry	3.990	ND	95.6	60-155			
Surrogate: 13C4-PFBA	6.34		µg/kg dry	7.979		79.5	8-130			
Surrogate: 13C5-PFPeA	4.07		µg/kg dry	3.990		102	35-130			
Surrogate: 13C5-PFHxA	2.05		µg/kg dry	1.995		103	40-130			
Surrogate: 13C4-PFHpA	1.99		µg/kg dry	1.995		99.7	40-130			
Surrogate: 13C8-PFOA	1.98		µg/kg dry	1.995		99.2	40-130			
Surrogate: 13C9-PFNA	0.989		µg/kg dry	0.9974		99.1	40-130			
Surrogate: 13C6-PFDA	1.04		µg/kg dry	0.9974		104	40-130			
Surrogate: 13C7-PFUnA	1.09		µg/kg dry	0.9974		109	40-130			
Surrogate: 13C2-PFDoA	1.02		µg/kg dry	0.9974		103	40-130			
Surrogate: 13C2-PFTeDA	1.07		µg/kg dry	0.9974		107	20-130			
Surrogate: 13C3-PFBS	2.11		µg/kg dry	1.995		106	40-135			
Surrogate: 13C3-PFHxS	2.01		µg/kg dry	1.995		101	40-130			
Surrogate: 13C8-PFOS	1.92		µg/kg dry	1.995		96.4	40-130			
Surrogate: 13C2-4:2FTS	4.17		µg/kg dry	3.990		104	40-165			
Surrogate: 13C2-6:2FTS	4.00		µg/kg dry	3.990		100	40-215			
Surrogate: 13C2-8:2FTS	3.94		µg/kg dry	3.990		98.7	40-275			
Surrogate: 13C8-PFOSA	1.99		µg/kg dry	1.995		99.6	40-130			
Surrogate: D3-NMeFOSA	1.78		µg/kg dry	1.995		89.3	10-130			
Surrogate: D5-NEtFOSA	1.77		µg/kg dry	1.995		88.9	10-130			
Surrogate: D3-NMeFOSAA	4.02		µg/kg dry	3.990		101	40-135			
Surrogate: D5-NEtFOSAA	4.11		µg/kg dry	3.990		103	40-150			
Surrogate: D7-NMeFOSE	20.6		µg/kg dry	19.95		103	20-130			
Surrogate: D9-NEtFOSE	20.1		µg/kg dry	19.95		101	15-130			
Surrogate: 13C3-HFPO-DA	8.18		µg/kg dry	7.979		103	40-130			
Matrix Spike Dup (B403456-MSD1)	Source: 25D1389-11			Prepared: 04/23/25 Analyzed: 04/25/25						
Perfluorobutanoic acid (PFBA)	7.33	0.80	µg/kg dry	7.975	ND	91.9	70-140	1.15	25	
Perfluoropentanoic acid (PFPeA)	4.16	0.40	µg/kg dry	3.987	0.522	91.2	60-150	0.0996	25	
Perfluorohexanoic acid (PFHxA)	2.02	0.20	µg/kg dry	1.994	0.165	92.9	65-140	1.37	25	
Perfluoroheptanoic acid (PFHpA)	2.19	0.20	µg/kg dry	1.994	0.370	91.5	65-145	1.23	25	
Perfluorooctanoic acid (PFOA)	2.21	0.20	µg/kg dry	1.994	0.473	87.0	70-150	1.51	25	

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403456 - EPA 1633										
Matrix Spike Dup (B403456-MSD1)	Source: 25D1389-11			Prepared: 04/23/25 Analyzed: 04/25/25						
Perfluorononanoic acid (PFNA)	2.59	0.20	µg/kg dry	1.994	0.690	95.5	70-155	3.17	25	
Perfluorodecanoic acid (PFDA)	3.82	0.20	µg/kg dry	1.994	2.07	87.7	70-155	0.543	25	
Perfluoroundecanoic acid (PFUnA)	2.19	0.20	µg/kg dry	1.994	0.377	90.7	70-155	2.23	25	
Perfluorododecanoic acid (PFDoA)	1.99	0.20	µg/kg dry	1.994	0.0810	96.0	70-150	0.630	25	
Perfluorotridecanoic acid (PFTTrDA)	2.06	0.20	µg/kg dry	1.994	ND	103	65-150	3.96	25	
Perfluorotetradecanoic acid (PFTeDA)	1.91	0.20	µg/kg dry	1.994	ND	95.8	65-150	1.53	25	
Perfluorobutanesulfonic acid (PFBS)	1.64	0.20	µg/kg dry	1.770	ND	92.8	65-145	5.53	25	
Perfluoropentanesulfonic acid (PFPeS)	1.76	0.20	µg/kg dry	1.874	ND	93.9	55-160	0.981	25	
Perfluorohexanesulfonic acid (PFHxS)	1.68	0.20	µg/kg dry	1.818	ND	92.4	60-150	5.02	25	
Perfluoroheptanesulfonic acid (PFHpS)	1.72	0.20	µg/kg dry	1.898	ND	90.6	65-155	0.396	25	
Perfluorooctanesulfonic acid (PFOS)	2.17	0.20	µg/kg dry	1.850	0.509	89.9	65-160	2.04	25	
Perfluorononanesulfonic acid (PFNS)	1.84	0.20	µg/kg dry	1.914	ND	96.2	55-140	2.22	25	
Perfluorodecanesulfonic acid (PFDS)	1.83	0.20	µg/kg dry	1.922	ND	95.3	40-155	0.291	25	
Perfluorododecanesulfonic acid (PFDoS)	1.84	0.20	µg/kg dry	1.930	ND	95.3	25-160	5.05	25	
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	7.46	0.80	µg/kg dry	7.472	ND	99.8	60-150	2.48	25	
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	7.29	0.80	µg/kg dry	7.584	ND	96.2	55-200	8.44	25	
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	8.58	0.80	µg/kg dry	7.656	ND	112	70-150	9.87	25	
Perfluorooctanesulfonamide (PFOSA)	1.75	0.20	µg/kg dry	1.994	ND	87.6	70-140	0.610	25	
N-methyl perfluorooctanesulfonamide (NMeFOSA)	1.75	0.20	µg/kg dry	1.994	ND	87.5	70-155	0.395	25	
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	1.75	0.20	µg/kg dry	1.994	ND	87.9	70-140	3.40	25	
N-MeFOSAA (NMeFOSAA)	1.71	0.20	µg/kg dry	1.994	ND	85.8	65-155	4.65	25	
N-EtFOSAA (NEtFOSAA)	1.74	0.20	µg/kg dry	1.994	ND	87.3	65-165	3.62	25	
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	18.4	2.0	µg/kg dry	19.94	ND	92.2	70-140	0.858	25	
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	18.5	2.0	µg/kg dry	19.94	ND	93.0	70-135	1.21	25	
Hexafluoropropylene oxide dimer acid (HFPO-DA)	7.69	0.80	µg/kg dry	7.975	ND	96.4	70-145	3.45	25	
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	6.91	0.80	µg/kg dry	7.536	ND	91.6	70-160	0.759	25	
9Cl-PF3ONS (F53B Minor)	7.43	0.80	µg/kg dry	7.440	ND	99.9	70-150	0.458	25	
11Cl-PF3OUdS (F53B Major)	8.04	0.80	µg/kg dry	7.417	ND	108	45-160	1.01	25	
3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTCA)	3.81	1.0	µg/kg dry	9.969	ND	38.2	* 45-130	8.62	25	L-03, MS-07A
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	42.8	5.0	µg/kg dry	49.84	ND	85.8	60-130	0.578	25	
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	47.8	5.0	µg/kg dry	49.84	ND	95.9	60-150	1.19	25	
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	3.19	0.40	µg/kg dry	3.557	ND	89.6	70-140	1.33	25	
Perfluoro-3-methoxypropanoic acid (PFMPA)	3.70	0.40	µg/kg dry	3.987	ND	92.8	30-140	0.158	25	
Perfluoro-4-methoxybutanoic acid (PFMBA)	3.67	0.40	µg/kg dry	3.987	ND	91.9	60-150	0.757	25	
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	3.53	0.40	µg/kg dry	3.987	ND	88.4	60-155	7.85	25	
Surrogate: 13C4-PFBA	6.60		µg/kg dry	7.975		82.8	8-130			
Surrogate: 13C5-PFPeA	3.88		µg/kg dry	3.987		97.3	35-130			
Surrogate: 13C5-PFHxA	1.94		µg/kg dry	1.994		97.5	40-130			
Surrogate: 13C4-PFHpA	1.91		µg/kg dry	1.994		95.9	40-130			
Surrogate: 13C8-PFOA	1.87		µg/kg dry	1.994		94.0	40-130			
Surrogate: 13C9-PFNA	0.967		µg/kg dry	0.9969		97.0	40-130			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403456 - EPA 1633
Matrix Spike Dup (B403456-MSD1)
Source: 25D1389-11

Prepared: 04/23/25 Analyzed: 04/25/25

Surrogate: 13C6-PFDA	1.01		µg/kg dry	0.9969		101	40-130			
Surrogate: 13C7-PFUnA	1.08		µg/kg dry	0.9969		109	40-130			
Surrogate: 13C2-PFDoA	0.983		µg/kg dry	0.9969		98.6	40-130			
Surrogate: 13C2-PFTeDA	1.02		µg/kg dry	0.9969		103	20-130			
Surrogate: 13C3-PFBS	2.19		µg/kg dry	1.994		110	40-135			
Surrogate: 13C3-PFHxS	2.01		µg/kg dry	1.994		101	40-130			
Surrogate: 13C8-PFOS	1.90		µg/kg dry	1.994		95.1	40-130			
Surrogate: 13C2-4:2FTS	4.12		µg/kg dry	3.987		103	40-165			
Surrogate: 13C2-6:2FTS	4.27		µg/kg dry	3.987		107	40-215			
Surrogate: 13C2-8:2FTS	3.57		µg/kg dry	3.987		89.5	40-275			
Surrogate: 13C8-PFOSA	2.00		µg/kg dry	1.994		101	40-130			
Surrogate: D3-NMeFOSA	1.76		µg/kg dry	1.994		88.1	10-130			
Surrogate: D5-NEtFOSA	1.76		µg/kg dry	1.994		88.3	10-130			
Surrogate: D3-NMeFOSAA	3.91		µg/kg dry	3.987		98.0	40-135			
Surrogate: D5-NEtFOSAA	4.03		µg/kg dry	3.987		101	40-150			
Surrogate: D7-NMeFOSE	20.2		µg/kg dry	19.94		101	20-130			
Surrogate: D9-NEtFOSE	19.7		µg/kg dry	19.94		98.8	15-130			
Surrogate: 13C3-HFPO-DA	7.85		µg/kg dry	7.975		98.4	40-130			

Batch B403615 - EPA 1633
Blank (B403615-BLK1)

Prepared & Analyzed: 04/28/25

Perfluorobutanoic acid (PFBA)	ND	6.3	ng/L	
Perfluoropentanoic acid (PFPeA)	ND	3.1	ng/L	
Perfluorohexanoic acid (PFHxA)	ND	1.6	ng/L	
Perfluoroheptanoic acid (PFHpA)	ND	1.6	ng/L	
Perfluorooctanoic acid (PFOA)	ND	1.6	ng/L	
Perfluorononanoic acid (PFNA)	ND	1.6	ng/L	
Perfluorodecanoic acid (PFDA)	ND	1.6	ng/L	
Perfluoroundecanoic acid (PFUnA)	ND	1.6	ng/L	
Perfluorododecanoic acid (PFDoA)	ND	1.6	ng/L	
Perfluorotridecanoic acid (PFTTrDA)	ND	1.6	ng/L	
Perfluorotetradecanoic acid (PFTeDA)	ND	1.6	ng/L	
Perfluorobutanesulfonic acid (PFBS)	ND	1.6	ng/L	
Perfluoropentanesulfonic acid (PFPeS)	ND	1.6	ng/L	
Perfluorohexanesulfonic acid (PFHxS)	ND	1.6	ng/L	
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.6	ng/L	
Perfluorooctanesulfonic acid (PFOS)	ND	1.6	ng/L	
Perfluorononanesulfonic acid (PFNS)	ND	1.6	ng/L	
Perfluorodecanesulfonic acid (PFDS)	ND	1.6	ng/L	
Perfluorododecanesulfonic acid (PFDoS)	ND	1.6	ng/L	
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	6.3	ng/L	
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	6.3	ng/L	
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	6.3	ng/L	
Perfluorooctanesulfonamide (PFOSA)	ND	1.6	ng/L	
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.6	ng/L	
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.6	ng/L	
N-MeFOSAA (NMeFOSAA)	ND	1.6	ng/L	
N-EtFOSAA (NEtFOSAA)	ND	1.6	ng/L	

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403615 - EPA 1633										
Blank (B403615-BLK1)				Prepared & Analyzed: 04/28/25						
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	16	ng/L							
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	16	ng/L							
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	6.3	ng/L							
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	6.3	ng/L							
9Cl-PF3ONS (F53B Minor)	ND	6.3	ng/L							
11Cl-PF3OUDS (F53B Major)	ND	6.3	ng/L							
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.9	ng/L							
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	39	ng/L							
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	ND	39	ng/L							
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	ND	3.1	ng/L							
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	3.1	ng/L							
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	3.1	ng/L							
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	3.1	ng/L							
Surrogate: 13C4-PFBA	70.0		ng/L	78.72		88.9	5-130			
Surrogate: 13C5-PFPeA	34.8		ng/L	39.36		88.3	40-130			
Surrogate: 13C5-PFHxA	17.5		ng/L	19.68		89.1	40-130			
Surrogate: 13C4-PFHpA	16.5		ng/L	19.68		84.1	40-130			
Surrogate: 13C8-PFOA	20.0		ng/L	19.68		101	40-130			
Surrogate: 13C9-PFNA	8.27		ng/L	9.841		84.0	40-130			
Surrogate: 13C6-PFDA	8.36		ng/L	9.841		85.0	40-130			
Surrogate: 13C7-PFUnA	8.46		ng/L	9.841		86.0	30-130			
Surrogate: 13C2-PFDoA	7.51		ng/L	9.841		76.3	10-130			
Surrogate: 13C2-PFTeDA	7.14		ng/L	9.841		72.5	10-130			
Surrogate: 13C3-PFBS	16.7		ng/L	19.68		85.1	40-135			
Surrogate: 13C3-PFHxS	17.3		ng/L	19.68		88.0	40-130			
Surrogate: 13C8-PFOS	16.7		ng/L	19.68		84.8	40-130			
Surrogate: 13C2-4:2FTS	38.1		ng/L	39.36		96.8	40-200			
Surrogate: 13C2-6:2FTS	36.5		ng/L	39.36		92.9	40-200			
Surrogate: 13C2-8:2FTS	30.4		ng/L	39.36		77.4	40-300			
Surrogate: 13C8-PFOSA	14.1		ng/L	19.68		71.7	40-130			
Surrogate: D3-NMeFOSA	13.0		ng/L	19.68		66.1	10-130			
Surrogate: D5-NEtFOSA	13.4		ng/L	19.68		68.1	10-130			
Surrogate: D3-NMeFOSAA	31.4		ng/L	39.36		79.7	40-170			
Surrogate: D5-NEtFOSAA	33.0		ng/L	39.36		83.8	25-135			
Surrogate: D7-NMeFOSE	142		ng/L	196.8		72.1	10-130			
Surrogate: D9-NEtFOSE	139		ng/L	196.8		70.6	10-130			
Surrogate: 13C3-HFPO-DA	69.9		ng/L	78.72		88.8	40-130			
LCS (B403615-BS1)				Prepared & Analyzed: 04/28/25						
Perfluorobutanoic acid (PFBA)	80.9	6.4	ng/L	79.43		102	70-140			
Perfluoropentanoic acid (PFPeA)	41.9	3.2	ng/L	39.71		106	65-135			
Perfluorohexanoic acid (PFHxA)	20.3	1.6	ng/L	19.86		102	70-145			
Perfluoroheptanoic acid (PFHpA)	20.4	1.6	ng/L	19.86		103	70-150			
Perfluorooctanoic acid (PFOA)	19.2	1.6	ng/L	19.86		96.9	70-150			
Perfluorononanoic acid (PFNA)	21.3	1.6	ng/L	19.86		108	70-150			

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403615 - EPA 1633										
LCS (B403615-BS1)										
Prepared & Analyzed: 04/28/25										
Perfluorodecanoic acid (PFDA)	21.0	1.6	ng/L	19.86		106	70-140			
Perfluoroundecanoic acid (PFUnA)	20.3	1.6	ng/L	19.86		102	70-145			
Perfluorododecanoic acid (PFDoA)	21.2	1.6	ng/L	19.86		107	70-140			
Perfluorotridecanoic acid (PFTrDA)	21.4	1.6	ng/L	19.86		108	65-140			
Perfluorotetradecanoic acid (PFTeDA)	22.1	1.6	ng/L	19.86		111	60-140			
Perfluorobutanesulfonic acid (PFBS)	18.4	1.6	ng/L	17.63		104	60-145			
Perfluoropentanesulfonic acid (PFPeS)	18.8	1.6	ng/L	18.67		101	65-140			
Perfluorohexanesulfonic acid (PFHxS)	18.0	1.6	ng/L	18.11		99.2	65-145			
Perfluoroheptanesulfonic acid (PFHpS)	20.8	1.6	ng/L	18.90		110	70-150			
Perfluorooctanesulfonic acid (PFOS)	19.2	1.6	ng/L	18.43		104	55-150			
Perfluorononanesulfonic acid (PFNS)	20.3	1.6	ng/L	19.06		106	65-145			
Perfluorodecanesulfonic acid (PFDS)	18.9	1.6	ng/L	19.14		98.9	60-145			
Perfluorododecanesulfonic acid (PFDoS)	17.8	1.6	ng/L	19.22		92.5	50-145			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	85.2	6.4	ng/L	74.42		114	70-145			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	83.4	6.4	ng/L	75.53		110	65-155			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	93.1	6.4	ng/L	76.25		122	60-150			
Perfluorooctanesulfonamide (PFOSA)	20.5	1.6	ng/L	19.86		103	70-145			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	21.2	1.6	ng/L	19.86		107	60-150			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	20.9	1.6	ng/L	19.86		105	65-145			
N-MeFOSAA (NMeFOSAA)	18.3	1.6	ng/L	19.86		92.4	50-140			
N-EtFOSAA (NEtFOSAA)	17.6	1.6	ng/L	19.86		88.7	70-145			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	204	16	ng/L	198.6		103	70-145			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	211	16	ng/L	198.6		106	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	90.6	6.4	ng/L	79.43		114	70-140			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	84.9	6.4	ng/L	75.06		113	65-145			
9Cl-PF3ONS (F53B Minor)	81.0	6.4	ng/L	74.10		109	70-155			
11Cl-PF3OUdS (F53B Major)	76.1	6.4	ng/L	73.87		103	55-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	89.9	7.9	ng/L	99.28		90.5	65-130			
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	488	40	ng/L	496.4		98.4	70-135			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	523	40	ng/L	496.4		105	50-145			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	38.0	3.2	ng/L	35.42		107	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	38.6	3.2	ng/L	39.71		97.3	55-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	41.8	3.2	ng/L	39.71		105	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	45.3	3.2	ng/L	39.71		114	50-150			
Surrogate: 13C4-PFBA	59.7		ng/L	79.43		75.1	5-130			
Surrogate: 13C5-PFPeA	29.2		ng/L	39.71		73.6	40-130			
Surrogate: 13C5-PFHxA	14.8		ng/L	19.86		74.7	40-130			
Surrogate: 13C4-PFHpA	13.8		ng/L	19.86		69.3	40-130			
Surrogate: 13C8-PFOA	16.6		ng/L	19.86		83.6	40-130			
Surrogate: 13C9-PFNA	7.12		ng/L	9.928		71.7	40-130			
Surrogate: 13C6-PFDA	7.12		ng/L	9.928		71.7	40-130			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403615 - EPA 1633
LCS (B403615-BS1)

Prepared & Analyzed: 04/28/25

Surrogate: 13C7-PFUnA	7.55		ng/L	9.928		76.0	30-130			
Surrogate: 13C2-PFDoA	6.48		ng/L	9.928		65.3	10-130			
Surrogate: 13C2-PFTeDA	6.10		ng/L	9.928		61.5	10-130			
Surrogate: 13C3-PFBS	13.6		ng/L	19.86		68.6	40-135			
Surrogate: 13C3-PFHxS	14.3		ng/L	19.86		71.8	40-130			
Surrogate: 13C8-PFOS	13.6		ng/L	19.86		68.4	40-130			
Surrogate: 13C2-4:2FTS	28.8		ng/L	39.71		72.6	40-200			
Surrogate: 13C2-6:2FTS	30.3		ng/L	39.71		76.3	40-200			
Surrogate: 13C2-8:2FTS	24.9		ng/L	39.71		62.8	40-300			
Surrogate: 13C8-PFOA	12.3		ng/L	19.86		62.0	40-130			
Surrogate: D3-NMeFOA	11.5		ng/L	19.86		58.2	10-130			
Surrogate: D5-NEtFOA	11.6		ng/L	19.86		58.4	10-130			
Surrogate: D3-NMeFOSAA	26.7		ng/L	39.71		67.3	40-170			
Surrogate: D5-NEtFOSAA	27.0		ng/L	39.71		67.9	25-135			
Surrogate: D7-NMeFOSE	121		ng/L	198.6		61.2	10-130			
Surrogate: D9-NEtFOSE	119		ng/L	198.6		59.8	10-130			
Surrogate: 13C3-HFPO-DA	58.5		ng/L	79.43		73.6	40-130			

MRL Check (B403615-MRL1)

Prepared & Analyzed: 04/28/25

Perfluorobutanoic acid (PFBA)	12.5	6.3	ng/L	12.64		98.8	70-140			
Perfluoropentanoic acid (PFPeA)	6.47	3.2	ng/L	6.321		102	65-135			
Perfluorohexanoic acid (PFHxA)	3.11	1.6	ng/L	3.160		98.5	70-145			
Perfluoroheptanoic acid (PFHpA)	2.88	1.6	ng/L	3.160		91.2	70-150			
Perfluorooctanoic acid (PFOA)	3.07	1.6	ng/L	3.160		97.2	70-150			
Perfluorononanoic acid (PFNA)	3.18	1.6	ng/L	3.160		100	70-150			
Perfluorodecanoic acid (PFDA)	3.00	1.6	ng/L	3.160		95.0	70-140			
Perfluoroundecanoic acid (PFUnA)	2.86	1.6	ng/L	3.160		90.6	70-145			
Perfluorododecanoic acid (PFDoA)	3.26	1.6	ng/L	3.160		103	70-140			
Perfluorotridecanoic acid (PFTTrDA)	3.17	1.6	ng/L	3.160		100	65-140			
Perfluorotetradecanoic acid (PFTeDA)	3.17	1.6	ng/L	3.160		100	60-140			
Perfluorobutanesulfonic acid (PFBS)	2.79	1.6	ng/L	2.806		99.3	60-145			
Perfluoropentanesulfonic acid (PFPeS)	2.99	1.6	ng/L	2.971		101	65-140			
Perfluorohexanesulfonic acid (PFHxS)	2.71	1.6	ng/L	2.882		94.2	65-145			
Perfluoroheptanesulfonic acid (PFHpS)	3.28	1.6	ng/L	3.009		109	70-150			
Perfluorooctanesulfonic acid (PFOS)	3.05	1.6	ng/L	2.933		104	55-150			
Perfluorononanesulfonic acid (PFNS)	3.12	1.6	ng/L	3.034		103	65-145			
Perfluorodecanesulfonic acid (PFDS)	2.92	1.6	ng/L	3.047		95.9	60-145			
Perfluorododecanesulfonic acid (PFDoS)	2.66	1.6	ng/L	3.059		87.0	50-145			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	12.4	6.3	ng/L	11.85		105	70-145			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	13.0	6.3	ng/L	12.02		108	65-155			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	13.7	6.3	ng/L	12.14		113	60-150			
Perfluorooctanesulfonamide (PFOSA)	3.01	1.6	ng/L	3.160		95.2	70-145			
N-methyl perfluorooctanesulfonamide (NMeFOA)	3.34	1.6	ng/L	3.160		106	60-150			
N-ethyl perfluorooctanesulfonamide (NEtFOA)	3.58	1.6	ng/L	3.160		113	65-145			
N-MeFOSAA (NMeFOSAA)	2.55	1.6	ng/L	3.160		80.6	50-140			
N-EtFOSAA (NEtFOSAA)	2.89	1.6	ng/L	3.160		91.3	70-145			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	30.7	16	ng/L	31.60		97.2	70-145			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	32.5	16	ng/L	31.60		103	70-135			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403615 - EPA 1633
MRL Check (B403615-MRL1)

Prepared & Analyzed: 04/28/25

Hexafluoropropylene oxide dimer acid (HFPO-DA)	13.1	6.3	ng/L	12.64		104	70-140			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	12.7	6.3	ng/L	11.95		107	65-145			
9Cl-PF3ONS (F53B Minor)	12.2	6.3	ng/L	11.79		104	70-155			
11Cl-PF3OUdS (F53B Major)	11.3	6.3	ng/L	11.81		95.9	55-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	13.1	7.9	ng/L	15.80		82.9	65-130			
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	70.9	40	ng/L	79.01		89.7	70-135			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	76.5	40	ng/L	79.01		96.8	50-145			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEA)	5.72	3.2	ng/L	5.638		101	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	5.62	3.2	ng/L	6.321		88.9	55-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	6.42	3.2	ng/L	6.321		102	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	6.46	3.2	ng/L	6.321		102	50-150			
Surrogate: 13C4-PFBA	56.4		ng/L	79.01		71.4	5-130			
Surrogate: 13C5-PFPeA	27.5		ng/L	39.50		69.6	40-130			
Surrogate: 13C5-PFHxA	14.1		ng/L	19.75		71.4	40-130			
Surrogate: 13C4-PFHpA	13.4		ng/L	19.75		67.6	40-130			
Surrogate: 13C8-PFOA	14.7		ng/L	19.75		74.6	40-130			
Surrogate: 13C9-PFNA	6.76		ng/L	9.876		68.5	40-130			
Surrogate: 13C6-PFDA	6.68		ng/L	9.876		67.6	40-130			
Surrogate: 13C7-PFUnA	6.99		ng/L	9.876		70.8	30-130			
Surrogate: 13C2-PFDoA	6.16		ng/L	9.876		62.4	10-130			
Surrogate: 13C2-PFTeDA	6.12		ng/L	9.876		62.0	10-130			
Surrogate: 13C3-PFBS	13.0		ng/L	19.75		65.6	40-135			
Surrogate: 13C3-PFHxS	13.7		ng/L	19.75		69.3	40-130			
Surrogate: 13C8-PFOS	13.5		ng/L	19.75		68.6	40-130			
Surrogate: 13C2-4:2FTS	30.6		ng/L	39.50		77.4	40-200			
Surrogate: 13C2-6:2FTS	30.8		ng/L	39.50		78.1	40-200			
Surrogate: 13C2-8:2FTS	26.5		ng/L	39.50		67.0	40-300			
Surrogate: 13C8-PFOSA	11.9		ng/L	19.75		60.1	40-130			
Surrogate: D3-NMeFOSA	10.7		ng/L	19.75		54.2	10-130			
Surrogate: D5-NEtFOSA	10.4		ng/L	19.75		52.7	10-130			
Surrogate: D3-NMeFOSAA	27.0		ng/L	39.50		68.3	40-170			
Surrogate: D5-NEtFOSAA	26.3		ng/L	39.50		66.7	25-135			
Surrogate: D7-NMeFOSE	116		ng/L	197.5		58.5	10-130			
Surrogate: D9-NEtFOSE	113		ng/L	197.5		57.3	10-130			
Surrogate: 13C3-HFPO-DA	55.8		ng/L	79.01		70.6	40-130			

Batch B403618 - EPA 1633
Blank (B403618-BLK1)

Prepared: 04/29/25 Analyzed: 05/01/25

Perfluorobutanoic acid (PFBA)	ND	0.80	µg/kg wet							
Perfluoropentanoic acid (PFPeA)	ND	0.40	µg/kg wet							
Perfluorohexanoic acid (PFHxA)	ND	0.20	µg/kg wet							
Perfluoroheptanoic acid (PFHpA)	ND	0.20	µg/kg wet							
Perfluorooctanoic acid (PFOA)	ND	0.20	µg/kg wet							
Perfluorononanoic acid (PFNA)	ND	0.20	µg/kg wet							
Perfluorodecanoic acid (PFDA)	ND	0.20	µg/kg wet							
Perfluoroundecanoic acid (PFUnA)	ND	0.20	µg/kg wet							

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403618 - EPA 1633
Blank (B403618-BLK1)

Prepared: 04/29/25 Analyzed: 05/01/25

Perfluorododecanoic acid (PFDoA)	ND	0.20	µg/kg wet
Perfluorotridecanoic acid (PFTTrDA)	ND	0.20	µg/kg wet
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	µg/kg wet
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	µg/kg wet
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	µg/kg wet
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	µg/kg wet
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	µg/kg wet
Perfluorooctanesulfonic acid (PFOS)	ND	0.20	µg/kg wet
Perfluorononanesulfonic acid (PFNS)	ND	0.20	µg/kg wet
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	µg/kg wet
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	µg/kg wet
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	µg/kg wet
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	µg/kg wet
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	µg/kg wet
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	µg/kg wet
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	µg/kg wet
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	µg/kg wet
N-MeFOSAA (NMeFOSAA)	ND	0.20	µg/kg wet
N-EtFOSAA (NEtFOSAA)	ND	0.20	µg/kg wet
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	µg/kg wet
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	µg/kg wet
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	µg/kg wet
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	0.80	µg/kg wet
9Cl-PF3ONS (F53B Minor)	ND	0.80	µg/kg wet
11Cl-PF3OUDS (F53B Major)	ND	0.80	µg/kg wet
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	µg/kg wet
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	µg/kg wet
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	ND	5.0	µg/kg wet
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	ND	0.40	µg/kg wet
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	µg/kg wet
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	µg/kg wet
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	µg/kg wet

Surrogate: 13C4-PFBA	6.59	µg/kg wet	7.959	82.8	8-130
Surrogate: 13C5-PFPeA	3.62	µg/kg wet	3.979	91.0	35-130
Surrogate: 13C5-PFHxA	1.81	µg/kg wet	1.990	91.1	40-130
Surrogate: 13C4-PFHpA	1.80	µg/kg wet	1.990	90.3	40-130
Surrogate: 13C8-PFOA	1.91	µg/kg wet	1.990	96.0	40-130
Surrogate: 13C9-PFNA	0.905	µg/kg wet	0.9948	91.0	40-130
Surrogate: 13C6-PFDA	0.917	µg/kg wet	0.9948	92.2	40-130
Surrogate: 13C7-PFUnA	0.895	µg/kg wet	0.9948	90.0	40-130
Surrogate: 13C2-PFDoA	0.850	µg/kg wet	0.9948	85.4	40-130

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403618 - EPA 1633
Blank (B403618-BLK1)

Prepared: 04/29/25 Analyzed: 05/01/25

Surrogate: 13C2-PFTeDA	0.811		µg/kg wet	0.9948		81.5	20-130			
Surrogate: 13C3-PFBS	1.82		µg/kg wet	1.990		91.6	40-135			
Surrogate: 13C3-PFHxS	1.75		µg/kg wet	1.990		87.8	40-130			
Surrogate: 13C8-PFOS	1.75		µg/kg wet	1.990		88.1	40-130			
Surrogate: 13C2-4:2FTS	3.45		µg/kg wet	3.979		86.7	40-165			
Surrogate: 13C2-6:2FTS	3.63		µg/kg wet	3.979		91.3	40-215			
Surrogate: 13C2-8:2FTS	2.81		µg/kg wet	3.979		70.7	40-275			
Surrogate: 13C8-PFOSA	1.81		µg/kg wet	1.990		90.9	40-130			
Surrogate: D3-NMeFOSA	1.61		µg/kg wet	1.990		80.7	10-130			
Surrogate: D5-NEtFOSA	1.60		µg/kg wet	1.990		80.5	10-130			
Surrogate: D3-NMeFOSAA	3.02		µg/kg wet	3.979		75.8	40-135			
Surrogate: D5-NEtFOSAA	3.00		µg/kg wet	3.979		75.4	40-150			
Surrogate: D7-NMeFOSE	17.6		µg/kg wet	19.90		88.5	20-130			
Surrogate: D9-NEtFOSE	17.5		µg/kg wet	19.90		88.0	15-130			
Surrogate: 13C3-HFPO-DA	7.03		µg/kg wet	7.959		88.4	40-130			

LCS (B403618-BS1)

Prepared: 04/29/25 Analyzed: 05/01/25

Perfluorobutanoic acid (PFBA)	7.87	0.79	µg/kg wet	7.904		99.6	70-140			
Perfluoropentanoic acid (PFPeA)	4.08	0.40	µg/kg wet	3.952		103	60-150			
Perfluorohexanoic acid (PFHxA)	2.06	0.20	µg/kg wet	1.976		104	65-140			
Perfluoroheptanoic acid (PFHpA)	1.97	0.20	µg/kg wet	1.976		99.8	65-145			
Perfluorooctanoic acid (PFOA)	1.96	0.20	µg/kg wet	1.976		99.3	70-150			
Perfluorononanoic acid (PFNA)	1.94	0.20	µg/kg wet	1.976		98.0	70-155			
Perfluorodecanoic acid (PFDA)	2.04	0.20	µg/kg wet	1.976		103	70-155			
Perfluoroundecanoic acid (PFUnA)	2.04	0.20	µg/kg wet	1.976		103	70-155			
Perfluorododecanoic acid (PFDoA)	2.18	0.20	µg/kg wet	1.976		110	70-150			
Perfluorotridecanoic acid (PFTrDA)	2.09	0.20	µg/kg wet	1.976		106	65-150			
Perfluorotetradecanoic acid (PFTeDA)	2.20	0.20	µg/kg wet	1.976		111	65-150			
Perfluorobutanesulfonic acid (PFBS)	1.84	0.20	µg/kg wet	1.755		105	65-145			
Perfluoropentanesulfonic acid (PFPeS)	2.00	0.20	µg/kg wet	1.857		107	55-160			
Perfluorohexanesulfonic acid (PFHxS)	1.91	0.20	µg/kg wet	1.802		106	60-150			
Perfluoroheptanesulfonic acid (PFHpS)	1.97	0.20	µg/kg wet	1.881		105	65-155			
Perfluorooctanesulfonic acid (PFOS)	1.87	0.20	µg/kg wet	1.834		102	65-160			
Perfluorononanesulfonic acid (PFNS)	2.01	0.20	µg/kg wet	1.897		106	55-140			
Perfluorodecanesulfonic acid (PFDS)	1.93	0.20	µg/kg wet	1.905		102	40-155			
Perfluorododecanesulfonic acid (PFDoS)	1.88	0.20	µg/kg wet	1.913		98.4	25-160			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	8.13	0.79	µg/kg wet	7.406		110	60-150			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	8.30	0.79	µg/kg wet	7.516		110	55-200			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	8.54	0.79	µg/kg wet	7.587		113	70-150			
Perfluorooctanesulfonamide (PFOSA)	2.10	0.20	µg/kg wet	1.976		107	70-140			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	1.96	0.20	µg/kg wet	1.976		99.4	70-155			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	1.91	0.20	µg/kg wet	1.976		96.8	70-140			
N-MeFOSAA (NMeFOSAA)	2.10	0.20	µg/kg wet	1.976		106	65-155			
N-EtFOSAA (NEtFOSAA)	1.89	0.20	µg/kg wet	1.976		95.7	65-165			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	20.6	2.0	µg/kg wet	19.76		104	70-140			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	20.7	2.0	µg/kg wet	19.76		105	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	8.53	0.79	µg/kg wet	7.904		108	70-145			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403618 - EPA 1633										
LCS (B403618-BS1)										
Prepared: 04/29/25 Analyzed: 05/01/25										
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	8.00	0.79	µg/kg wet	7.469		107	70-160			
9Cl-PF3ONS (F53B Minor)	7.83	0.79	µg/kg wet	7.374		106	70-150			
11Cl-PF3OUdS (F53B Major)	8.02	0.79	µg/kg wet	7.350		109	45-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	8.68	0.99	µg/kg wet	9.879		87.8	45-130			
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	56.7	4.9	µg/kg wet	49.40		115	60-130			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	56.4	4.9	µg/kg wet	49.40		114	60-150			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEA)	3.84	0.40	µg/kg wet	3.525		109	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	4.01	0.40	µg/kg wet	3.952		102	30-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	4.15	0.40	µg/kg wet	3.952		105	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	3.73	0.40	µg/kg wet	3.952		94.5	60-155			
Surrogate: 13C4-PFBA	6.76		µg/kg wet	7.904		85.5	8-130			
Surrogate: 13C5-PFPeA	3.65		µg/kg wet	3.952		92.4	35-130			
Surrogate: 13C5-PFHxA	1.84		µg/kg wet	1.976		92.9	40-130			
Surrogate: 13C4-PFHpA	1.80		µg/kg wet	1.976		91.3	40-130			
Surrogate: 13C8-PFOA	1.88		µg/kg wet	1.976		95.1	40-130			
Surrogate: 13C9-PFNA	0.934		µg/kg wet	0.9879		94.6	40-130			
Surrogate: 13C6-PFDA	0.930		µg/kg wet	0.9879		94.2	40-130			
Surrogate: 13C7-PFUnA	0.964		µg/kg wet	0.9879		97.5	40-130			
Surrogate: 13C2-PFDoA	0.871		µg/kg wet	0.9879		88.2	40-130			
Surrogate: 13C2-PFTeDA	0.805		µg/kg wet	0.9879		81.5	20-130			
Surrogate: 13C3-PFBS	1.81		µg/kg wet	1.976		91.4	40-135			
Surrogate: 13C3-PFHxS	1.75		µg/kg wet	1.976		88.4	40-130			
Surrogate: 13C8-PFOS	1.76		µg/kg wet	1.976		89.0	40-130			
Surrogate: 13C2-4:2FTS	3.59		µg/kg wet	3.952		90.7	40-165			
Surrogate: 13C2-6:2FTS	3.80		µg/kg wet	3.952		96.1	40-215			
Surrogate: 13C2-8:2FTS	2.95		µg/kg wet	3.952		74.7	40-275			
Surrogate: 13C8-PFOSA	1.83		µg/kg wet	1.976		92.8	40-130			
Surrogate: D3-NMeFOSA	1.59		µg/kg wet	1.976		80.6	10-130			
Surrogate: D5-NEtFOSA	1.68		µg/kg wet	1.976		84.8	10-130			
Surrogate: D3-NMeFOSAA	3.18		µg/kg wet	3.952		80.4	40-135			
Surrogate: D5-NEtFOSAA	3.21		µg/kg wet	3.952		81.3	40-150			
Surrogate: D7-NMeFOSE	18.1		µg/kg wet	19.76		91.4	20-130			
Surrogate: D9-NEtFOSE	17.9		µg/kg wet	19.76		90.8	15-130			
Surrogate: 13C3-HFPO-DA	7.21		µg/kg wet	7.904		91.2	40-130			
MRL Check (B403618-MRL1)										
Prepared: 04/29/25 Analyzed: 05/01/25										
Perfluorobutanoic acid (PFBA)	1.41	0.80	µg/kg wet	1.593		88.4	70-140			
Perfluoropentanoic acid (PFPeA)	0.695	0.40	µg/kg wet	0.7963		87.2	60-150			
Perfluorohexanoic acid (PFHxA)	0.355	0.20	µg/kg wet	0.3982		89.3	65-140			
Perfluoroheptanoic acid (PFHpA)	0.347	0.20	µg/kg wet	0.3982		87.0	65-145			
Perfluorooctanoic acid (PFOA)	0.331	0.20	µg/kg wet	0.3982		83.0	70-150			
Perfluorononanoic acid (PFNA)	0.339	0.20	µg/kg wet	0.3982		85.3	70-155			
Perfluorodecanoic acid (PFDA)	0.354	0.20	µg/kg wet	0.3982		88.9	70-155			
Perfluoroundecanoic acid (PFUnA)	0.361	0.20	µg/kg wet	0.3982		90.6	70-155			
Perfluorododecanoic acid (PFDoA)	0.373	0.20	µg/kg wet	0.3982		93.8	70-150			
Perfluorotridecanoic acid (PFTTrDA)	0.355	0.20	µg/kg wet	0.3982		89.3	65-150			
Perfluorotetradecanoic acid (PFTeDA)	0.355	0.20	µg/kg wet	0.3982		89.3	65-150			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403618 - EPA 1633										
MRL Check (B403618-MRL1)										
Prepared: 04/29/25 Analyzed: 05/01/25										
Perfluorobutanesulfonic acid (PFBS)	0.306	0.20	µg/kg wet	0.3536		86.4	65-145			
Perfluoropentanesulfonic acid (PFPeS)	0.322	0.20	µg/kg wet	0.3743		86.1	55-160			
Perfluorohexanesulfonic acid (PFHxS)	0.296	0.20	µg/kg wet	0.3631		81.5	60-150			
Perfluoroheptanesulfonic acid (PFHpS)	0.304	0.20	µg/kg wet	0.3791		80.2	65-155			
Perfluorooctanesulfonic acid (PFOS)	0.344	0.20	µg/kg wet	0.3695		93.2	65-160			
Perfluorononanesulfonic acid (PFNS)	0.332	0.20	µg/kg wet	0.3822		87.0	55-140			
Perfluorodecanesulfonic acid (PFDS)	0.304	0.20	µg/kg wet	0.3838		79.2	40-155			
Perfluorododecanesulfonic acid (PFDoS)	0.333	0.20	µg/kg wet	0.3854		86.3	25-160			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	1.41	0.80	µg/kg wet	1.492		94.4	60-150			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	1.52	0.80	µg/kg wet	1.515		100	55-200			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	1.57	0.80	µg/kg wet	1.529		102	70-150			
Perfluorooctanesulfonamide (PFOSA)	0.356	0.20	µg/kg wet	0.3982		89.5	70-140			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	0.303	0.20	µg/kg wet	0.3982		76.1	70-155			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	0.322	0.20	µg/kg wet	0.3982		80.9	70-140			
N-MeFOSAA (NMeFOSAA)	0.315	0.20	µg/kg wet	0.3982		79.2	65-155			
N-EtFOSAA (NEtFOSAA)	0.273	0.20	µg/kg wet	0.3982		68.5	65-165			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	3.61	2.0	µg/kg wet	3.982		90.7	70-140			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	3.67	2.0	µg/kg wet	3.982		92.3	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	1.44	0.80	µg/kg wet	1.593		90.4	70-145			
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	1.44	0.80	µg/kg wet	1.505		95.7	70-160			
9Cl-PF3ONS (F53B Minor)	1.37	0.80	µg/kg wet	1.486		92.3	70-150			
11Cl-PF3OUdS (F53B Major)	1.40	0.80	µg/kg wet	1.488		94.1	45-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	1.31	1.0	µg/kg wet	1.991		65.6	45-130			
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	9.87	5.0	µg/kg wet	9.954		99.1	60-130			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	10.5	5.0	µg/kg wet	9.954		105	60-150			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESEA)	0.655	0.40	µg/kg wet	0.7103		92.2	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	0.688	0.40	µg/kg wet	0.7963		86.4	30-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	0.711	0.40	µg/kg wet	0.7963		89.2	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	0.661	0.40	µg/kg wet	0.7963		83.0	60-155			
Surrogate: 13C4-PFBA	7.47		µg/kg wet	7.963		93.8	8-130			
Surrogate: 13C5-PFPeA	4.08		µg/kg wet	3.982		103	35-130			
Surrogate: 13C5-PFHxA	2.04		µg/kg wet	1.991		102	40-130			
Surrogate: 13C4-PFHpA	1.93		µg/kg wet	1.991		96.8	40-130			
Surrogate: 13C8-PFOA	2.10		µg/kg wet	1.991		105	40-130			
Surrogate: 13C9-PFNA	1.01		µg/kg wet	0.9954		101	40-130			
Surrogate: 13C6-PFDA	1.01		µg/kg wet	0.9954		102	40-130			
Surrogate: 13C7-PFUnA	1.01		µg/kg wet	0.9954		101	40-130			
Surrogate: 13C2-PFDoA	0.945		µg/kg wet	0.9954		94.9	40-130			
Surrogate: 13C2-PFTeDA	0.881		µg/kg wet	0.9954		88.5	20-130			
Surrogate: 13C3-PFBS	1.97		µg/kg wet	1.991		98.8	40-135			
Surrogate: 13C3-PFHxS	1.98		µg/kg wet	1.991		99.7	40-130			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403618 - EPA 1633
MRL Check (B403618-MRL1)

Prepared: 04/29/25 Analyzed: 05/01/25

Surrogate: 13C8-PFOS	1.98		µg/kg wet	1.991		99.6	40-130			
Surrogate: 13C2-4:2FTS	3.90		µg/kg wet	3.982		97.9	40-165			
Surrogate: 13C2-6:2FTS	4.07		µg/kg wet	3.982		102	40-215			
Surrogate: 13C2-8:2FTS	3.25		µg/kg wet	3.982		81.6	40-275			
Surrogate: 13C8-PFOSA	2.06		µg/kg wet	1.991		104	40-130			
Surrogate: D3-NMeFOSA	1.73		µg/kg wet	1.991		87.0	10-130			
Surrogate: D5-NEtFOSA	1.78		µg/kg wet	1.991		89.4	10-130			
Surrogate: D3-NMeFOSAA	3.53		µg/kg wet	3.982		88.7	40-135			
Surrogate: D5-NEtFOSAA	3.45		µg/kg wet	3.982		86.7	40-150			
Surrogate: D7-NMeFOSE	19.9		µg/kg wet	19.91		100	20-130			
Surrogate: D9-NEtFOSE	19.6		µg/kg wet	19.91		98.4	15-130			
Surrogate: 13C3-HFPO-DA	8.02		µg/kg wet	7.963		101	40-130			

Matrix Spike (B403618-MS1)
Source: 25D1389-22

Prepared: 04/29/25 Analyzed: 05/01/25

Perfluorobutanoic acid (PFBA)	8.13	0.79	µg/kg dry	7.926	ND	103	70-140			
Perfluoropentanoic acid (PFPeA)	4.68	0.40	µg/kg dry	3.963	0.716	100	60-150			
Perfluorohexanoic acid (PFHxA)	2.36	0.20	µg/kg dry	1.981	0.373	100	65-140			
Perfluoroheptanoic acid (PFHpA)	2.41	0.20	µg/kg dry	1.981	0.389	102	65-145			
Perfluorooctanoic acid (PFOA)	2.65	0.20	µg/kg dry	1.981	0.735	96.5	70-150			
Perfluorononanoic acid (PFNA)	3.10	0.20	µg/kg dry	1.981	1.09	102	70-155			
Perfluorodecanoic acid (PFDA)	5.58	0.20	µg/kg dry	1.981	3.66	96.7	70-155			
Perfluoroundecanoic acid (PFUnA)	2.61	0.20	µg/kg dry	1.981	0.663	98.2	70-155			
Perfluorododecanoic acid (PFDoA)	2.28	0.20	µg/kg dry	1.981	0.202	105	70-150			
Perfluorotridecanoic acid (PFTTrDA)	2.24	0.20	µg/kg dry	1.981	ND	113	65-150			
Perfluorotetradecanoic acid (PFTeDA)	2.10	0.20	µg/kg dry	1.981	ND	106	65-150			
Perfluorobutanesulfonic acid (PFBS)	1.96	0.20	µg/kg dry	1.760	ND	111	65-145			
Perfluoropentanesulfonic acid (PFPeS)	1.94	0.20	µg/kg dry	1.863	0.104	98.4	55-160			
Perfluorohexanesulfonic acid (PFHxS)	3.54	0.20	µg/kg dry	1.807	1.82	95.2	60-150			
Perfluoroheptanesulfonic acid (PFHpS)	2.38	0.20	µg/kg dry	1.886	0.349	107	65-155			
Perfluorooctanesulfonic acid (PFOS)	82.2	0.20	µg/kg dry	1.839	89.7	-406 *	65-160			MS-12
Perfluorononanesulfonic acid (PFNS)	2.89	0.20	µg/kg dry	1.902	0.532	124	55-140			
Perfluorodecanesulfonic acid (PFDS)	2.36	0.20	µg/kg dry	1.910	0.149	116	40-155			
Perfluorododecanesulfonic acid (PFDoS)	2.30	0.20	µg/kg dry	1.918	ND	120	25-160			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	8.50	0.79	µg/kg dry	7.426	ND	114	60-150			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	8.67	0.79	µg/kg dry	7.537	ND	115	55-200			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	8.87	0.79	µg/kg dry	7.609	ND	117	70-150			
Perfluorooctanesulfonamide (PFOSA)	2.20	0.20	µg/kg dry	1.981	0.233	99.4	70-140			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	1.78	0.20	µg/kg dry	1.981	ND	89.8	70-155			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	1.78	0.20	µg/kg dry	1.981	ND	89.7	70-140			
N-MeFOSAA (NMeFOSAA)	2.09	0.20	µg/kg dry	1.981	ND	106	65-155			
N-EtFOSAA (NEtFOSAA)	1.91	0.20	µg/kg dry	1.981	ND	96.6	65-165			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	19.8	2.0	µg/kg dry	19.81	ND	100	70-140			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	19.7	2.0	µg/kg dry	19.81	ND	99.5	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	8.63	0.79	µg/kg dry	7.926	ND	109	70-145			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	7.97	0.79	µg/kg dry	7.490	ND	106	70-160			
9Cl-PF3ONS (F53B Minor)	8.71	0.79	µg/kg dry	7.395	ND	118	70-150			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403618 - EPA 1633

Matrix Spike (B403618-MS1)		Source: 25D1389-22		Prepared: 04/29/25 Analyzed: 05/01/25						
11Cl-PF3OUdS (F53B Major)	9.85	0.79	µg/kg dry	7.371	ND	134	45-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	6.21	0.99	µg/kg dry	9.907	ND	62.6	45-130			
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	52.1	5.0	µg/kg dry	49.54	ND	105	60-130			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	59.7	5.0	µg/kg dry	49.54	ND	121	60-150			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	4.05	0.40	µg/kg dry	3.535	ND	115	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	3.98	0.40	µg/kg dry	3.963	ND	100	30-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	4.17	0.40	µg/kg dry	3.963	ND	105	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	3.54	0.40	µg/kg dry	3.963	ND	89.3	60-155			
Surrogate: 13C4-PFBA	7.83		µg/kg dry	7.926		98.8	8-130			
Surrogate: 13C5-PFPeA	4.07		µg/kg dry	3.963		103	35-130			
Surrogate: 13C5-PFHxA	2.09		µg/kg dry	1.981		105	40-130			
Surrogate: 13C4-PFHpA	2.11		µg/kg dry	1.981		106	40-130			
Surrogate: 13C8-PFOA	2.11		µg/kg dry	1.981		106	40-130			
Surrogate: 13C9-PFNA	0.996		µg/kg dry	0.9907		101	40-130			
Surrogate: 13C6-PFDA	1.02		µg/kg dry	0.9907		103	40-130			
Surrogate: 13C7-PFUnA	1.18		µg/kg dry	0.9907		119	40-130			
Surrogate: 13C2-PFDoA	1.12		µg/kg dry	0.9907		113	40-130			
Surrogate: 13C2-PFTeDA	1.18		µg/kg dry	0.9907		119	20-130			
Surrogate: 13C3-PFBS	1.93		µg/kg dry	1.981		97.2	40-135			
Surrogate: 13C3-PFHxS	2.10		µg/kg dry	1.981		106	40-130			
Surrogate: 13C8-PFOS	2.09		µg/kg dry	1.981		106	40-130			
Surrogate: 13C2-4:2FTS	5.75		µg/kg dry	3.963		145	40-165			
Surrogate: 13C2-6:2FTS	6.49		µg/kg dry	3.963		164	40-215			
Surrogate: 13C2-8:2FTS	5.45		µg/kg dry	3.963		138	40-275			
Surrogate: 13C8-PFOSA	2.35		µg/kg dry	1.981		119	40-130			
Surrogate: D3-NMeFOSA	1.51		µg/kg dry	1.981		76.0	10-130			
Surrogate: D5-NEtFOSA	1.41		µg/kg dry	1.981		71.2	10-130			
Surrogate: D3-NMeFOSAA	3.66		µg/kg dry	3.963		92.3	40-135			
Surrogate: D5-NEtFOSAA	4.25		µg/kg dry	3.963		107	40-150			
Surrogate: D7-NMeFOSE	16.6		µg/kg dry	19.81		83.6	20-130			
Surrogate: D9-NEtFOSE	15.4		µg/kg dry	19.81		77.7	15-130			
Surrogate: 13C3-HFPO-DA	8.23		µg/kg dry	7.926		104	40-130			

Matrix Spike Dup (B403618-MSD1)		Source: 25D1389-22		Prepared: 04/29/25 Analyzed: 05/01/25						
Perfluorobutanoic acid (PFBA)	7.90	0.80	µg/kg dry	7.979	ND	99.0	70-140	2.86	25	
Perfluoropentanoic acid (PFPeA)	4.94	0.40	µg/kg dry	3.989	0.716	106	60-150	5.36	25	
Perfluorohexanoic acid (PFHxA)	2.56	0.20	µg/kg dry	1.995	0.373	110	65-140	8.11	25	
Perfluoroheptanoic acid (PFHpA)	2.55	0.20	µg/kg dry	1.995	0.389	108	65-145	5.55	25	
Perfluorooctanoic acid (PFOA)	2.85	0.20	µg/kg dry	1.995	0.735	106	70-150	7.26	25	
Perfluorononanoic acid (PFNA)	3.34	0.20	µg/kg dry	1.995	1.09	113	70-155	7.28	25	
Perfluorodecanoic acid (PFDA)	5.90	0.20	µg/kg dry	1.995	3.66	112	70-155	5.54	25	
Perfluoroundecanoic acid (PFUnA)	2.81	0.20	µg/kg dry	1.995	0.663	107	70-155	7.30	25	
Perfluorododecanoic acid (PFDoA)	2.42	0.20	µg/kg dry	1.995	0.202	111	70-150	5.98	25	
Perfluorotridecanoic acid (PFTTrDA)	2.27	0.20	µg/kg dry	1.995	ND	114	65-150	1.44	25	
Perfluorotetradecanoic acid (PFTeDA)	2.14	0.20	µg/kg dry	1.995	ND	107	65-150	1.71	25	
Perfluorobutanesulfonic acid (PFBS)	1.87	0.20	µg/kg dry	1.771	ND	105	65-145	4.82	25	
Perfluoropentanesulfonic acid (PFPeS)	2.05	0.20	µg/kg dry	1.875	0.104	104	55-160	5.74	25	
Perfluorohexanesulfonic acid (PFHxS)	4.06	0.20	µg/kg dry	1.819	1.82	123	60-150	13.6	25	

QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403618 - EPA 1633										
Matrix Spike Dup (B403618-MSD1)	Source: 25D1389-22			Prepared: 04/29/25 Analyzed: 05/01/25						
Perfluoroheptanesulfonic acid (PFHpS)	2.58	0.20	µg/kg dry	1.899	0.349	118	65-155	8.26	25	MS-12
Perfluorooctanesulfonic acid (PFOS)	101	0.20	µg/kg dry	1.851	89.7	627 *	65-160	20.8	25	
Perfluorononanesulfonic acid (PFNS)	3.03	0.20	µg/kg dry	1.915	0.532	130	55-140	4.84	25	
Perfluorodecanesulfonic acid (PFDS)	2.53	0.20	µg/kg dry	1.923	0.149	124	40-155	6.56	25	
Perfluorododecanesulfonic acid (PFDoS)	2.32	0.20	µg/kg dry	1.931	ND	120	25-160	0.997	25	
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	8.41	0.80	µg/kg dry	7.476	ND	113	60-150	1.04	25	
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	9.04	0.80	µg/kg dry	7.588	ND	119	55-200	4.18	25	
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	8.82	0.80	µg/kg dry	7.659	ND	115	70-150	0.620	25	
Perfluorooctanesulfonamide (PFOSA)	2.26	0.20	µg/kg dry	1.995	0.233	102	70-140	2.50	25	
N-methyl perfluorooctanesulfonamide (NMeFOSA)	2.04	0.20	µg/kg dry	1.995	ND	102	70-155	13.6	25	
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	2.00	0.20	µg/kg dry	1.995	ND	100	70-140	11.9	25	
N-MeFOSAA (NMeFOSAA)	2.06	0.20	µg/kg dry	1.995	ND	103	65-155	1.66	25	
N-EtFOSAA (NEtFOSAA)	2.00	0.20	µg/kg dry	1.995	ND	100	65-165	4.33	25	
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	20.4	2.0	µg/kg dry	19.95	ND	102	70-140	3.07	25	
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	20.0	2.0	µg/kg dry	19.95	ND	100	70-135	1.51	25	
Hexafluoropropylene oxide dimer acid (HFPO-DA)	8.45	0.80	µg/kg dry	7.979	ND	106	70-145	2.11	25	
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	7.91	0.80	µg/kg dry	7.540	ND	105	70-160	0.747	25	
9Cl-PF3ONS (F53B Minor)	9.25	0.80	µg/kg dry	7.444	ND	124	70-150	6.01	25	
11Cl-PF3OUdS (F53B Major)	10.3	0.80	µg/kg dry	7.420	ND	138	45-160	4.20	25	
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	6.44	1.0	µg/kg dry	9.973	ND	64.6	45-130	3.73	25	
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	54.1	5.0	µg/kg dry	49.87	ND	108	60-130	3.65	25	
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	64.6	5.0	µg/kg dry	49.87	ND	129	60-150	7.76	25	
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEA)	4.18	0.40	µg/kg dry	3.558	ND	117	70-140	3.18	25	
Perfluoro-3-methoxypropanoic acid (PFMPA)	3.99	0.40	µg/kg dry	3.989	ND	100	30-140	0.384	25	
Perfluoro-4-methoxybutanoic acid (PFMBA)	4.14	0.40	µg/kg dry	3.989	ND	104	60-150	0.752	25	
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	3.56	0.40	µg/kg dry	3.989	ND	89.3	60-155	0.641	25	
Surrogate: 13C4-PFBA	7.66		µg/kg dry	7.979		96.0	8-130			
Surrogate: 13C5-PFPeA	3.79		µg/kg dry	3.989		95.1	35-130			
Surrogate: 13C5-PFHxA	1.93		µg/kg dry	1.995		96.8	40-130			
Surrogate: 13C4-PFHpA	1.97		µg/kg dry	1.995		98.9	40-130			
Surrogate: 13C8-PFOA	2.07		µg/kg dry	1.995		104	40-130			
Surrogate: 13C9-PFNA	0.963		µg/kg dry	0.9973		96.5	40-130			
Surrogate: 13C6-PFDA	1.02		µg/kg dry	0.9973		103	40-130			
Surrogate: 13C7-PFUnA	1.14		µg/kg dry	0.9973		114	40-130			
Surrogate: 13C2-PFDoA	1.11		µg/kg dry	0.9973		111	40-130			
Surrogate: 13C2-PFTeDA	1.15		µg/kg dry	0.9973		116	20-130			
Surrogate: 13C3-PFBS	1.93		µg/kg dry	1.995		96.8	40-135			
Surrogate: 13C3-PFHxS	2.01		µg/kg dry	1.995		101	40-130			
Surrogate: 13C8-PFOS	1.94		µg/kg dry	1.995		97.5	40-130			
Surrogate: 13C2-4:2FTS	6.12		µg/kg dry	3.989		153	40-165			
Surrogate: 13C2-6:2FTS	6.40		µg/kg dry	3.989		160	40-215			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403618 - EPA 1633
Matrix Spike Dup (B403618-MSD1)
Source: 25D1389-22

Prepared: 04/29/25 Analyzed: 05/01/25

Surrogate: 13C2-8:2FTS	5.56		µg/kg dry	3.989		139	40-275			
Surrogate: 13C8-PFOA	2.31		µg/kg dry	1.995		116	40-130			
Surrogate: D3-NMeFOSA	1.31		µg/kg dry	1.995		65.9	10-130			
Surrogate: D5-NEtFOSA	1.23		µg/kg dry	1.995		61.4	40-130			
Surrogate: D3-NMeFOSAA	3.67		µg/kg dry	3.989		91.9	40-135			
Surrogate: D5-NEtFOSAA	4.09		µg/kg dry	3.989		103	40-150			
Surrogate: D7-NMeFOSE	14.3		µg/kg dry	19.95		71.5	20-130			
Surrogate: D9-NEtFOSE	13.2		µg/kg dry	19.95		65.9	15-130			
Surrogate: 13C3-HFPO-DA	7.35		µg/kg dry	7.979		92.2	40-130			

Batch B404052 - EPA 1633
Blank (B404052-BLK1)

Prepared: 05/01/25 Analyzed: 05/02/25

Perfluorobutanoic acid (PFBA)	ND	6.3	ng/L
Perfluoropentanoic acid (PFPeA)	ND	3.2	ng/L
Perfluorohexanoic acid (PFHxA)	ND	1.6	ng/L
Perfluoroheptanoic acid (PFHpA)	ND	1.6	ng/L
Perfluorooctanoic acid (PFOA)	ND	1.6	ng/L
Perfluorononanoic acid (PFNA)	ND	1.6	ng/L
Perfluorodecanoic acid (PFDA)	ND	1.6	ng/L
Perfluoroundecanoic acid (PFUnA)	ND	1.6	ng/L
Perfluorododecanoic acid (PFDoA)	ND	1.6	ng/L
Perfluorotridecanoic acid (PFTTrDA)	ND	1.6	ng/L
Perfluorotetradecanoic acid (PFTeDA)	ND	1.6	ng/L
Perfluorobutanesulfonic acid (PFBS)	ND	1.6	ng/L
Perfluoropentanesulfonic acid (PFPeS)	ND	1.6	ng/L
Perfluorohexanesulfonic acid (PFHxS)	ND	1.6	ng/L
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.6	ng/L
Perfluorooctanesulfonic acid (PFOS)	ND	1.6	ng/L
Perfluorononanesulfonic acid (PFNS)	ND	1.6	ng/L
Perfluorodecanesulfonic acid (PFDS)	ND	1.6	ng/L
Perfluorododecanesulfonic acid (PFDoS)	ND	1.6	ng/L
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	6.3	ng/L
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	6.3	ng/L
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	6.3	ng/L
Perfluorooctanesulfonamide (PFOSA)	ND	1.6	ng/L
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.6	ng/L
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.6	ng/L
N-MeFOSAA (NMeFOSAA)	ND	1.6	ng/L
N-EtFOSAA (NEtFOSAA)	ND	1.6	ng/L
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	16	ng/L
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	16	ng/L
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	6.3	ng/L
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	6.3	ng/L
9Cl-PF3ONS (F53B Minor)	ND	6.3	ng/L
11Cl-PF3OUDS (F53B Major)	ND	6.3	ng/L

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B404052 - EPA 1633

Blank (B404052-BLK1)

Prepared: 05/01/25 Analyzed: 05/02/25

3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.9	ng/L							
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	40	ng/L							
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	ND	40	ng/L							
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	3.2	ng/L							
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	3.2	ng/L							
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	3.2	ng/L							
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	3.2	ng/L							
Surrogate: 13C4-PFBA	83.0		ng/L	79.25		105	5-130			
Surrogate: 13C5-PFPeA	41.2		ng/L	39.62		104	40-130			
Surrogate: 13C5-PFHxA	20.9		ng/L	19.81		106	40-130			
Surrogate: 13C4-PFHpA	20.4		ng/L	19.81		103	40-130			
Surrogate: 13C8-PFOA	22.6		ng/L	19.81		114	40-130			
Surrogate: 13C9-PFNA	10.1		ng/L	9.906		102	40-130			
Surrogate: 13C6-PFDA	10.8		ng/L	9.906		109	40-130			
Surrogate: 13C7-PFUnA	10.4		ng/L	9.906		105	30-130			
Surrogate: 13C2-PFDoA	9.77		ng/L	9.906		98.6	10-130			
Surrogate: 13C2-PFTeDA	9.47		ng/L	9.906		95.6	10-130			
Surrogate: 13C3-PFBS	20.8		ng/L	19.81		105	40-135			
Surrogate: 13C3-PFHxS	21.0		ng/L	19.81		106	40-130			
Surrogate: 13C8-PFOS	20.8		ng/L	19.81		105	40-130			
Surrogate: 13C2-4:2FTS	43.8		ng/L	39.62		110	40-200			
Surrogate: 13C2-6:2FTS	47.2		ng/L	39.62		119	40-200			
Surrogate: 13C2-8:2FTS	45.4		ng/L	39.62		115	40-300			
Surrogate: 13C8-PFOSA	18.0		ng/L	19.81		91.0	40-130			
Surrogate: D3-NMeFOSA	15.6		ng/L	19.81		79.0	10-130			
Surrogate: D5-NEtFOSA	15.5		ng/L	19.81		78.3	10-130			
Surrogate: D3-NMeFOSAA	40.7		ng/L	39.62		103	40-170			
Surrogate: D5-NEtFOSAA	40.4		ng/L	39.62		102	25-135			
Surrogate: D7-NMeFOSE	166		ng/L	198.1		83.8	10-130			
Surrogate: D9-NEtFOSE	159		ng/L	198.1		80.2	10-130			
Surrogate: 13C3-HFPO-DA	83.2		ng/L	79.25		105	40-130			

LCS (B404052-BS1)

Prepared: 05/01/25 Analyzed: 05/03/25

Perfluorobutanoic acid (PFBA)	65.0	6.3	ng/L	79.13		82.2	70-140			
Perfluoropentanoic acid (PFPeA)	35.9	3.2	ng/L	39.56		90.8	65-135			
Perfluorohexanoic acid (PFHxA)	17.7	1.6	ng/L	19.78		89.7	70-145			
Perfluoroheptanoic acid (PFHpA)	17.8	1.6	ng/L	19.78		89.8	70-150			
Perfluorooctanoic acid (PFOA)	16.5	1.6	ng/L	19.78		83.2	70-150			
Perfluorononanoic acid (PFNA)	17.3	1.6	ng/L	19.78		87.6	70-150			
Perfluorodecanoic acid (PFDA)	17.9	1.6	ng/L	19.78		90.4	70-140			
Perfluoroundecanoic acid (PFUnA)	17.7	1.6	ng/L	19.78		89.6	70-145			
Perfluorododecanoic acid (PFDoA)	17.5	1.6	ng/L	19.78		88.3	70-140			
Perfluorotridecanoic acid (PFTTrDA)	16.7	1.6	ng/L	19.78		84.3	65-140			
Perfluorotetradecanoic acid (PFTeDA)	17.2	1.6	ng/L	19.78		86.7	60-140			
Perfluorobutanesulfonic acid (PFBS)	15.8	1.6	ng/L	17.57		90.0	60-145			
Perfluoropentanesulfonic acid (PFPeS)	17.0	1.6	ng/L	18.59		91.2	65-140			
Perfluorohexanesulfonic acid (PFHxS)	15.4	1.6	ng/L	18.04		85.2	65-145			
Perfluoroheptanesulfonic acid (PFHpS)	17.0	1.6	ng/L	18.83		90.5	70-150			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B404052 - EPA 1633										
LCS (B404052-BS1)										
Prepared: 05/01/25 Analyzed: 05/03/25										
Perfluorooctanesulfonic acid (PFOS)	16.0	1.6	ng/L	18.36		86.9	55-150			
Perfluorononanesulfonic acid (PFNS)	16.4	1.6	ng/L	18.99		86.3	65-145			
Perfluorodecanesulfonic acid (PFDS)	15.1	1.6	ng/L	19.07		79.1	60-145			
Perfluorododecanesulfonic acid (PFDoS)	14.9	1.6	ng/L	19.15		77.6	50-145			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	73.0	6.3	ng/L	74.14		98.5	70-145			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	72.7	6.3	ng/L	75.25		96.6	65-155			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	72.5	6.3	ng/L	75.96		95.4	60-150			
Perfluorooctanesulfonamide (PFOSA)	17.8	1.6	ng/L	19.78		90.1	70-145			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	17.6	1.6	ng/L	19.78		88.9	60-150			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	16.9	1.6	ng/L	19.78		85.5	65-145			
N-MeFOSAA (NMeFOSAA)	14.1	1.6	ng/L	19.78		71.3	50-140			
N-EtFOSAA (NEtFOSAA)	16.3	1.6	ng/L	19.78		82.4	70-145			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	174	16	ng/L	197.8		87.7	70-145			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	176	16	ng/L	197.8		88.8	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	73.2	6.3	ng/L	79.13		92.5	70-140			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	68.9	6.3	ng/L	74.77		92.2	65-145			
9Cl-PF3ONS (F53B Minor)	63.9	6.3	ng/L	73.82		86.5	70-155			
11Cl-PF3OUdS (F53B Major)	63.6	6.3	ng/L	73.59		86.5	55-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	69.9	7.9	ng/L	98.91		70.7	65-130			
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	411	40	ng/L	494.5		83.1	70-135			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	384	40	ng/L	494.5		77.6	50-145			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	30.9	3.2	ng/L	35.29		87.6	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	32.7	3.2	ng/L	39.56		82.6	55-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	35.1	3.2	ng/L	39.56		88.7	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	35.5	3.2	ng/L	39.56		89.8	50-150			
Surrogate: 13C4-PFBA	84.1		ng/L	79.13		106	5-130			
Surrogate: 13C5-PFPeA	41.7		ng/L	39.56		105	40-130			
Surrogate: 13C5-PFHxA	20.9		ng/L	19.78		106	40-130			
Surrogate: 13C4-PFHpA	20.0		ng/L	19.78		101	40-130			
Surrogate: 13C8-PFOA	22.0		ng/L	19.78		111	40-130			
Surrogate: 13C9-PFNA	10.3		ng/L	9.891		105	40-130			
Surrogate: 13C6-PFDA	9.60		ng/L	9.891		97.1	40-130			
Surrogate: 13C7-PFUnA	9.46		ng/L	9.891		95.7	30-130			
Surrogate: 13C2-PFDoA	8.98		ng/L	9.891		90.8	10-130			
Surrogate: 13C2-PFTeDA	8.59		ng/L	9.891		86.8	10-130			
Surrogate: 13C3-PFBS	21.3		ng/L	19.78		108	40-135			
Surrogate: 13C3-PFHxS	20.7		ng/L	19.78		104	40-130			
Surrogate: 13C8-PFOS	20.0		ng/L	19.78		101	40-130			
Surrogate: 13C2-4:2FTS	41.5		ng/L	39.56		105	40-200			
Surrogate: 13C2-6:2FTS	42.9		ng/L	39.56		108	40-200			
Surrogate: 13C2-8:2FTS	44.2		ng/L	39.56		112	40-300			

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B404052 - EPA 1633

LCS (B404052-BS1)

Prepared: 05/01/25 Analyzed: 05/03/25

Surrogate: 13C8-PFOSA	18.3		ng/L	19.78		92.7	40-130			
Surrogate: D3-NMeFOSA	16.3		ng/L	19.78		82.5	10-130			
Surrogate: D5-NEtFOSA	16.4		ng/L	19.78		83.0	10-130			
Surrogate: D3-NMeFOSAA	42.1		ng/L	39.56		107	40-170			
Surrogate: D5-NEtFOSAA	41.2		ng/L	39.56		104	25-135			
Surrogate: D7-NMeFOSE	173		ng/L	197.8		87.5	10-130			
Surrogate: D9-NEtFOSE	170		ng/L	197.8		86.0	10-130			
Surrogate: 13C3-HFPO-DA	84.0		ng/L	79.13		106	40-130			

MRL Check (B404052-MRL1)

Prepared: 05/01/25 Analyzed: 05/03/25

Perfluorobutanoic acid (PFBA)	10.2	6.3	ng/L	12.69		80.3	70-140			
Perfluoropentanoic acid (PFPeA)	4.96	3.2	ng/L	6.344		78.1	65-135			
Perfluorohexanoic acid (PFHxA)	2.56	1.6	ng/L	3.172		80.8	70-145			
Perfluoroheptanoic acid (PFHpA)	2.55	1.6	ng/L	3.172		80.5	70-150			
Perfluorooctanoic acid (PFOA)	2.69	1.6	ng/L	3.172		84.9	70-150			
Perfluorononanoic acid (PFNA)	2.53	1.6	ng/L	3.172		79.6	70-150			
Perfluorodecanoic acid (PFDA)	2.95	1.6	ng/L	3.172		93.0	70-140			
Perfluoroundecanoic acid (PFUnA)	2.38	1.6	ng/L	3.172		75.1	70-145			
Perfluorododecanoic acid (PFDoA)	2.73	1.6	ng/L	3.172		86.0	70-140			
Perfluorotridecanoic acid (PFTrDA)	2.53	1.6	ng/L	3.172		79.6	65-140			
Perfluorotetradecanoic acid (PFTeDA)	2.63	1.6	ng/L	3.172		82.8	60-140			
Perfluorobutanesulfonic acid (PFBS)	2.24	1.6	ng/L	2.817		79.7	60-145			
Perfluoropentanesulfonic acid (PFPeS)	2.44	1.6	ng/L	2.982		81.8	65-140			
Perfluorohexanesulfonic acid (PFHxS)	2.49	1.6	ng/L	2.893		85.9	65-145			
Perfluoroheptanesulfonic acid (PFHpS)	2.47	1.6	ng/L	3.020		81.6	70-150			
Perfluorooctanesulfonic acid (PFOS)	2.21	1.6	ng/L	2.944		75.2	55-150			
Perfluorononanesulfonic acid (PFNS)	2.37	1.6	ng/L	3.045		77.8	65-145			
Perfluorodecanesulfonic acid (PFDS)	2.38	1.6	ng/L	3.058		77.9	60-145			
Perfluorododecanesulfonic acid (PFDoS)	2.20	1.6	ng/L	3.071		71.8	50-145			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	10.6	6.3	ng/L	11.89		89.0	70-145			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	10.8	6.3	ng/L	12.07		89.3	65-155			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	10.9	6.3	ng/L	12.18		89.4	60-150			
Perfluorooctanesulfonamide (PFOSA)	2.79	1.6	ng/L	3.172		87.9	70-145			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	2.83	1.6	ng/L	3.172		89.3	60-150			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	3.03	1.6	ng/L	3.172		95.6	65-145			
N-MeFOSAA (NMeFOSAA)	2.09	1.6	ng/L	3.172		65.9	50-140			
N-EtFOSAA (NEtFOSAA)	2.63	1.6	ng/L	3.172		82.8	70-145			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	26.2	16	ng/L	31.72		82.6	70-145			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	25.6	16	ng/L	31.72		80.9	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	10.1	6.3	ng/L	12.69		79.5	70-140			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	10.4	6.3	ng/L	11.99		86.7	65-145			
9Cl-PF3ONS (F53B Minor)	9.74	6.3	ng/L	11.84		82.2	70-155			
11Cl-PF3OUDS (F53B Major)	9.39	6.3	ng/L	11.85		79.2	55-160			
3-Perfluoropropyl propanoic acid (FPPrPA) (3:3FTCA)	10.6	7.9	ng/L	15.86		66.8	65-130			
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	61.5	40	ng/L	79.31		77.5	70-135			

QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B404052 - EPA 1633

MRL Check (B404052-MRL1)

Prepared: 05/01/25 Analyzed: 05/03/25

3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	59.9	40	ng/L	79.31		75.5	50-145			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	4.64	3.2	ng/L	5.659		82.1	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	4.68	3.2	ng/L	6.344		73.8	55-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	5.20	3.2	ng/L	6.344		82.0	60-150			
Nonafluoro-3,6-dioxahexanoic acid (NFDHA)	6.15	3.2	ng/L	6.344		97.0	50-150			
Surrogate: 13C4-PFBA	84.5		ng/L	79.31		106	5-130			
Surrogate: 13C5-PFPeA	43.4		ng/L	39.65		110	40-130			
Surrogate: 13C5-PFHxA	21.9		ng/L	19.83		110	40-130			
Surrogate: 13C4-PFHpA	21.2		ng/L	19.83		107	40-130			
Surrogate: 13C8-PFOA	21.0		ng/L	19.83		106	40-130			
Surrogate: 13C9-PFNA	10.4		ng/L	9.913		105	40-130			
Surrogate: 13C6-PFDA	9.90		ng/L	9.913		99.9	40-130			
Surrogate: 13C7-PFUnA	10.4		ng/L	9.913		105	30-130			
Surrogate: 13C2-PFDoA	9.37		ng/L	9.913		94.5	10-130			
Surrogate: 13C2-PFTeDA	8.87		ng/L	9.913		89.5	10-130			
Surrogate: 13C3-PFBS	21.3		ng/L	19.83		108	40-135			
Surrogate: 13C3-PFHxS	21.4		ng/L	19.83		108	40-130			
Surrogate: 13C8-PFOS	21.0		ng/L	19.83		106	40-130			
Surrogate: 13C2-4:2FTS	43.9		ng/L	39.65		111	40-200			
Surrogate: 13C2-6:2FTS	45.4		ng/L	39.65		115	40-200			
Surrogate: 13C2-8:2FTS	43.2		ng/L	39.65		109	40-300			
Surrogate: 13C8-PFOSA	19.0		ng/L	19.83		95.9	40-130			
Surrogate: D3-NMeFOSA	16.2		ng/L	19.83		81.6	10-130			
Surrogate: D5-NEtFOSA	17.2		ng/L	19.83		86.7	10-130			
Surrogate: D3-NMeFOSAA	43.9		ng/L	39.65		111	40-170			
Surrogate: D5-NEtFOSAA	40.2		ng/L	39.65		101	25-135			
Surrogate: D7-NMeFOSE	177		ng/L	198.3		89.2	10-130			
Surrogate: D9-NEtFOSE	176		ng/L	198.3		88.6	10-130			
Surrogate: 13C3-HFPO-DA	90.0		ng/L	79.31		114	40-130			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

QUALITY CONTROL

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total) - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403480 - % Solids

Duplicate (B403480-DUP2)

Source: 25D1389-11

Prepared & Analyzed: 04/21/25

% Solids	90.5		% Wt		91.6			1.20	10	
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FLAG/QUALIFIER SUMMARY

*	QC result is outside of established limits.
†	Wide recovery limits established for difficult compound.
‡	Wide RPD limits established for difficult compound.
#	Data exceeded client recommended or regulatory level
ND	Not Detected
RL	Reporting Limit is at the level of quantitation (LOQ)
DL	Detection Limit is the lower limit of detection determined by the MDL study
MCL	Maximum Contaminant Level
	Percent recoveries and relative percent differences (RPDs) are determined by the software using values in the calculation which have not been rounded.
	No results have been blank subtracted unless specified in the case narrative section.
D	Sample analyzed at a dilution.
D-01	Sample extracted/prepared at a dilution due to sample matrix.
J	Detected but below the Reporting Limit (lowest calibration standard); therefore, result is an estimated concentration (CLP J-Flag).
L-03	Laboratory fortified blank/laboratory control sample recovery is outside of control limits. Reported value for this compound is likely to be biased on the low side.
MS-07A	Matrix spike and spike duplicate recovery is outside of control limits. Analysis is in control based on laboratory fortified blank recovery. Possibility of matrix effects that lead to low bias or non-homogeneous sample aliquot cannot be eliminated.
MS-12	Matrix spike recovery and matrix spike duplicate recovery outside of control limits. Possibility of sample matrix effects that lead to a high bias for reported result or non-homogeneous sample aliquots cannot be eliminated.
PF-17	Extracted Internal Standard recovery is outside of control limits. Data is not significantly affected since associated analyte is not detected and bias is on the high side.
PF-22	Qualifier ion ratio >150% of associated calibration. Detection is suspect.

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CERTIFICATIONS

Certified Analyses included in this Report

Analyte	Certifications
<i>Draft Method 1633 in Soil</i>	
Perfluorobutanoic acid (PFBA)	NY
Perfluoropentanoic acid (PFPeA)	NY
Perfluorohexanoic acid (PFHxA)	NY
Perfluoroheptanoic acid (PFHpA)	NY
Perfluorooctanoic acid (PFOA)	NY
Perfluorononanoic acid (PFNA)	NY
Perfluorodecanoic acid (PFDA)	NY
Perfluoroundecanoic acid (PFUnA)	NY
Perfluorododecanoic acid (PFDoA)	NY
Perfluorotridecanoic acid (PFTrDA)	NY
Perfluorooctanesulfonic acid (PFOS)	NY
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	NY
N-MeFOSAA (NMeFOSAA)	NY
<i>Draft Method 1633 in Water</i>	
Perfluorobutanoic acid (PFBA)	NY
Perfluoropentanoic acid (PFPeA)	NY
Perfluorohexanoic acid (PFHxA)	NY
Perfluoroheptanoic acid (PFHpA)	NY
Perfluorooctanoic acid (PFOA)	NY
Perfluorononanoic acid (PFNA)	NY
Perfluorodecanoic acid (PFDA)	NY
Perfluoroundecanoic acid (PFUnA)	NY
Perfluorododecanoic acid (PFDoA)	NY
Perfluorotridecanoic acid (PFTrDA)	NY
Perfluorotetradecanoic acid (PFTeDA)	NY
Perfluorobutanesulfonic acid (PFBS)	NY
Perfluoropentanesulfonic acid (PFPeS)	NY
Perfluorohexanesulfonic acid (PFHxS)	NY
Perfluoroheptanesulfonic acid (PFHpS)	NY
Perfluorooctanesulfonic acid (PFOS)	NY
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	NY
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	NY
N-MeFOSAA (NMeFOSAA)	NY
N-EtFOSAA (NEtFOSAA)	NY
Hexafluoropropylene oxide dimer acid (HFPO-DA)	NY
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	NY
9Cl-PF3ONS (F53B Minor)	NY
11Cl-PF3OUdS (F53B Major)	NY
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEA)	NY
Perfluoro-3-methoxypropanoic acid (PFMPA)	NY

Pace Analytical Services, LLC - East Longmeadow, Ma, operates under the following certifications and accreditations:

Code	Description	Number	Expires
NY	New York State Department of Health	10899 NELAP	04/1/2026

CHAIN OF CUSTODY RECORD (New York)

25D1389

Page ____ of ____

Contact: <https://www.pacelabs.com/contact-us/contact-environmental-sciences/>

Company Name: NYS DEC Consultant: Labella
Consultant Address: 5 McCreia Hill Rd, Baulston Spa, NY
Consultant Phone: 518-885-5383
Out Project Name: NYSDEC Richard L Hanson FTC
Project Location: Mohawk, NY
Out Number: 152879
Spill Number: B00138
Project Manager: S. Vaverchak / E. Koppers (DEC)
Analytical Quote Name/Number:
Ice Recipient: NYSDEC
Ordered By: S. Vaverchak

Requested Turnaround Time
DEC Standard 30-calendar day ☐
Due Date: Standard TAT

Rush (Prior Approval Required)
1-Day ☐ 2-Day ☐ 3-Day ☐
4-Day ☐ 5-Day ☐ 10-Day ☐

Data Delivery
Format: PDF ☒ EXCEL ☒
Other:
CLP Like (Level 4) Data Pkg Required: ☒
Email To: See comments
Fax To #:

ANALYSIS REQUESTED (Circle Requested Analyses/Reporting List)

8260: DER TCL / Oxygenates / CP-51	8270: DER TCL / CP-51	1,4-Dioxane SIM	8082 PCBs	8081 Pesticide	8151 Herbicide	TCLP RCRA 8 Metals	PFAS 537 ID	PFAS 1633
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of Containers

Preservation Code

Container Code

Dissolved Metals Samples
Field Filtered
Lab to Filter

Orthophosphate Samples
Field Filtered
Lab to Filter

Pace Analytical Work Order#	Client Sample ID / Description	Beginning Date/Time	Ending Date/Time	Composite	Grab	Matrix Code	Conc Code	8260: DER TCL / Oxygenates / CP-51	8270: DER TCL / CP-51	1,4-Dioxane SIM	8082 PCBs	8081 Pesticide	8151 Herbicide	TCLP RCRA 8 Metals	PFAS 537 ID	PFAS 1633
1	SB-1 0"-2"	1025	4/14/25		X	S	U									
2	SB-1 2"-12"	1030														
3	SB-1 18"-24"	1035														
4	SB-2 0"-2"	1115														
5	SB-2 2"-12"	1120														
6	SB-2 18"-24"	1125														
7	SB-3 0"-2"	1130														
8	SB-3 2"-12"	1135														
9	SB-3 20"-24"	1140														
10	SB-4 0"-2"	1145														

Matrix Codes:
GW = Ground Water
WW = Waste Water
DW = Drinking Water
A = Air
S = Soil
SL = Sludge
SOL = Solid
O = Other (please define)

Preservation Codes:
I = Iced
H = HCL
M = Methanol
N = Nitric Acid
S = Sulfuric Acid
B = Sodium Bisulfate
X = Sodium Hydroxide
T = Sodium Thiosulfate
O = Other (please define)

Container Codes:
A = Amber Glass
G = Glass
P = Plastic
ST = Sterile
V = Vial
S = Summa Canister
T = Tedlar Bag
O = Other (please define)

Notes: Email results to: svaverchak@labellapc.com ; Edward.Koppers@dec.ny.gov

Please use the following codes to indicate possible sample concentration within the Conc Code column above:
H - High; M - Medium; L - Low; C - Clean; U - Unknown

Issued by: (signature) S. Vaverchak	Date/Time: 4/14/25 16:33	Program & Regulatory Information ☐ AWQ STDS ☐ NY TOGS ☐ NYC Sewer Discharge ☐ NY CP-51 ☐ Part 360 GW (Landfill) ☐ NY Restricted Use ☐ NY Unrestricted Use ☐ NY Part 375		Deliverables ☐ Enhanced Data Package ☐ NYSDEC EQUIS EDD ☐ EQUIS (Standard) EDD ☐ NY Regulatory EDD ☐ NY Regs Hits-Only EDD
Advised by: (signature) S. Vaverchak	Date/Time: 4/14/25 16:33			
By: (signature) S. Vaverchak	Date/Time: 4/14/25 16:33			
By: (signature) S. Vaverchak	Date/Time: 4/14/25 16:33			

4/14 00:30

4/15 00:00

4/15/25 200
2.8

CHAIN OF CUSTODY RECORD (New York)

25B1389

Page ____ of ____

Contact: <https://www.pacelabs.com/contact-us/contact-environmental-sciences/>

Company Name: NYS DEC Consultant: LaBella
Client Address: 5 McCrea Hill Rd Ballston Spa, NY
Client Phone: 518-885-5383
Project Name: NYSDEC Richard L Hanson ETC
Project Location: Mohawk, NY
Project Number: 152819
Spill Number: 800138
Project Manager: S. Vaverchak / E. Koppers (DEC)
Analytical Quote Name/Number:
Sample Recipient: NYSDEC
Prepared By: S. Vaverchak

Requested Turnaround Time
DEC Standard 30-calendar day ☐
Due Date: Standard TAT

Rush (Prior Approval Required)
1-Day ☐ 2-Day ☐ 3-Day ☐
4-Day ☐ 5-Day ☐ 10-Day ☐

Data Delivery
Format: PDF ☒ EXCEL ☒
Other:
CLP Like (Level 4) Data Pkg Required: ☐
Email To: See Comments
Fax To #:

ANALYSIS REQUESTED (Circle Requested Analyses/Reporting List)

8260: DER TCL / Oxygenates / CP-51	8270: DER TCL / CP-51	1,4-Dioxane SIM	8082 PCBs	8081 Pesticide	8151 Herbicide	TCLP RCRA 8 Metals	PFAS 537 ID
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Field Filtered
Lab to Filter

Orthophosphate Samples
Field Filtered
Lab to Filter

Pace Analytical Work Order#	Client Sample ID / Description	Beginning Date/Time	Ending Date/Time	Composite	Grab	Matrix Code	Conc Code
20 21	SB-8 2"-12"	1445	4/14/25		X	S	U
21 22	SB-8 54"-60"	1450					
22 23	Field Dup						
23 24	Equipment Blank	1010				W	U
24 25	Trip Blank						

1 Matrix Codes:
GW = Ground Water
WW = Waste Water
DW = Drinking Water
A = Air
S = Soil
SL = Sludge
SOL = Solid
O = Other (please define)

2 Preservation Codes:
I = Iced
H = HCL
M = Methanol
N = Nitric Acid
S = Sulfuric Acid
B = Sodium Bisulfate
X = Sodium Hydroxide
T = Sodium Thiosulfate
O = Other (please define)

3 Container Codes:
A = Amber Glass
G = Glass
P = Plastic
ST = Sterile
V = Vial
S = Summa Canister
T = Tedlar Bag
O = Other (please define)

Notes: Email results to: svaverchak@labellape.com & Edward.Koppers@dec.ny.gov

Please use the following codes to indicate possible sample concentration within the Conc Code column above:
H - High; M - Medium; L - Low; C - Clean; U - Unknown

Prepared by: (signature) <i>S. Vaverchak</i>	Date/Time: 4/14/25 16:33	Program & Regulatory Information ☐ AWQ STDS ☐ NY TOGS ☐ NYC Sewer Discharge ☐ NY CP-51 ☐ Part 360 GW (Landfill) ☐ NY Restricted Use ☐ NY Unrestricted Use ☐ NY Part 375 Other:		Deliverables ☐ Enhanced Data Package ☐ NYSDEC EQUIS EDD ☐ EQUIS (Standard) EDD ☐ NY Regulatory EDD ☐ NY Regs Hits-Only EDD
Reviewed by: (signature) <i>S. Vaverchak</i>	Date/Time: 4/14/25 16:33			
Analyst by: (signature) <i>S. Vaverchak</i>	Date/Time: 4/14/25 16:33			
Client by: (signature) <i>S. Vaverchak</i>	Date/Time: 4/14/25 16:33			

4/14 23:30
4/15 08:00
4/15/25 200 2.8

	DC#_Title: ENV-FRM-ELON-0001 v08_Sample Receiving Checklist
	Effective Date: 06/11/2024

Log In Back-Sheet

Client Labella
 Project 152879
 MCP/RCP Required na
 Deliverable Package Requirement na
 Location NY
 PWSID# (When Applicable) na
 Arrival Method:
 Courier ☒ Fed Ex ☐ Walk In ☐ Other ☐
 Received By / Date / Time LA 4/15/25 200
 Back-Sheet By / Date / Time gc 4/17/25 1257
 Temperature Method gun # 6
 WV samples: Yes (see note*) / No (follow normal procedure)
 Temp < 6° C Actual Temperature 2.8
 Rush Samples: Yes / No Notify
 Short Hold: Yes / No Notify

Notes regarding Samples/COC outside of SOP:

did not receive trip blank

Login Sample Receipt Checklist - (Rejection Criteria Listing
 - Using Acceptance Policy) Any False statement will be
 brought to the attention of the Client - True or False

	True	False
Received on Ice	☒	☐
Received in Cooler	☐	☐
Custody Seal: DATE TIME	☐	☒
COC Relinquished	☒	☐
COC/Samples Labels Agree	☒	☐
All Samples in Good Condition	☒	☐
Samples Received within Holding Time	☒	☐
Is there enough Volume	☒	☐
Proper Media/Container Used	☒	☐
Splitting Samples Required	☐	☒
MS/MSD	☒	☐
Trip Blanks	☐	☒
Lab to Filters	☐	☒
COC Legible	☒	☐
COC Included: (Check all included)		
Client ☒	Analysis ☒	Sampler Name ☒
Project ☒	IDs ☒	Collection Date/Time ☒
All Samples Proper pH: <u>N/A</u> ☐ ☐		

Additional Container Notes

**Note: West Virginia requires all samples to have their
 temperature taken. Note any outliers.*

Sample	Soils Jars (Circle Amb/Clear)				Ambers						Plastics							VOA Vials					Other / Fill in				
	16oz Amb/Clear	8oz Amb/Clear	4oz Amb/Clear	2oz Amb/Clear	1 Liter			250mL		100mL	500mL			250mL				Unpreserved	HCl	MeOH	D.I. Water	BiSulfate	Col/Bact	Other			
					Unpreserved	HCL	Sulfuric	Sulfuric	Phosphoric	HCl	Unpreserved	Sulfuric	Unpreserved	Sulfuric	Unpreserved	Trizma	Sulfuric								Nitric	NaOH	Ammonium Acetate
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2																											
3																											
4																											
5																											
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	DC#_Title: ENV-FRM-ELON-0001 v08_Sample Receiving Checklist	Effective Date: 06/11/2024

Sample	Soils Jars (Circle Amb/Clear)			Ambers						Plastics							VOA Vials					Other / Fill in						
	16oz Amb/Clear	8oz Amb/Clear	4oz Amb/Clear	1 Liter			250mL			100mL	1 Liter		500mL	250mL					Unpreserved	HCl	MeOH	D.I. Water	BiSulfate	Col/Bact	Other			
				Unpreserved	HCL	Sulfuric	Sulfuric	Phosphoric	HCl	Unpreserved	Sulfuric	Sulfuric	Unpreserved	Trizma	Sulfuric	Nitric	NaOH	Ammonium Acetate								NaOH/Zinc		
12																												
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DC#_Title: ENV-FRM-ELON-0001 v08_Sample Receiving Checklist	Effective Date: 06/11/2024
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Face

May 5, 2025

Sierra Vaverchak
NYDEC_Labelle Associates - Ballston Spa, NY
5 McCrea Hill Road
Ballston Spa, NY 12020

Project Location: Monawk, NY
Client Job Number:
Project Number: B00138
Laboratory Work Order Number: 25D1372

Enclosed are results of analyses for samples as received by the laboratory on April 18, 2025. If you have any questions concerning this report, please feel free to contact me.

Sincerely,



Kyle A. Murray
Project Manager

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Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

NYDEC_Labella Associates - Ballston Spa, NY
5 McCrea Hill Road
Ballston Spa, NY 12020
ATTN: Sierra Vaverchak

REPORT DATE: 5/5/2025

PURCHASE ORDER NUMBER: 152879

PROJECT NUMBER: B00138

ANALYTICAL SUMMARY

WORK ORDER NUMBER: 25D1372

The results of analyses performed on the following samples submitted to Pace Analytical Services, LLC - East Longmeadow, Ma, are found in this report.

PROJECT LOCATION: Monawk, NY

FIELD SAMPLE #	LAB ID:	MATRIX	SAMPLE DESCRIPTION	TEST	SUB LAB
SB-9 0-2	25D1372-01	Soil		Draft Method 1633 SM 2540G	
SB-9 2-12	25D1372-02	Soil		Draft Method 1633 SM 2540G	
SB-9 54-60	25D1372-03	Soil		Draft Method 1633 SM 2540G	
SB-6 0-2	25D1372-04	Soil		Draft Method 1633 SM 2540G	
SB-6 2-12	25D1372-05	Soil		Draft Method 1633 SM 2540G	
SB-6 30-36	25D1372-06	Soil		Draft Method 1633 SM 2540G	
DUP2	25D1372-07	Soil		Draft Method 1633 SM 2540G	
SW-1	25D1372-08	Surface Water		Draft Method 1633	
SED-1	25D1372-09	Sediment		Draft Method 1633 SM 2540G	
DUP1	25D1372-10	Surface Water		Draft Method 1633	
Equipment Blank-2	25D1372-11	Equipment Blank Water		Draft Method 1633	

CASE NARRATIVE SUMMARY

All reported results are within defined laboratory quality control objectives unless listed below or otherwise qualified in this report.

TB not received.

Draft Method 1633

Qualifications:

L-03

Laboratory fortified blank/laboratory control sample recovery is outside of control limits. Reported value for this compound is likely to be biased on the low side.

Analyte & Samples(s) Qualified:

3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTC)^A

25D1372-01[SB-9 0-2], 25D1372-02[SB-9 2-12], 25D1372-03[SB-9 54-60], 25D1372-04[SB-6 0-2], 25D1372-05[SB-6 2-12], 25D1372-06[SB-6 30-36], 25D1372-07[DUP2], 25D1372-09[SED-1], B404148-BLK1, B404148-BS1, B404148-MRL1, B404148-MS1, B404148-MSD1

MS-07A

Matrix spike and spike duplicate recovery is outside of control limits. Analysis is in control based on laboratory fortified blank recovery.

Possibility of matrix effects that lead to low bias or non-homogeneous sample aliquot cannot be eliminated.

Analyte & Samples(s) Qualified:

3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTC)^A

B404148-MS1, B404148-MSD1

PF-17

Extracted Internal Standard recovery is outside of control limits. Data is not significantly affected since associated analyte is not detected and bias is on the high side.

Analyte & Samples(s) Qualified:

13C2-4:2FTS

S121060-CCB4

1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FT)^A

S121060-CCB4

PF-22

Qualifier ion ratio >150% of associated calibration. Detection is suspect.

Analyte & Samples(s) Qualified:

Perfluorooctanesulfonamide (PFOSA)

25D1372-05[SB-6 2-12]

PF-23

Qualifier ion ratio <50% of associated calibration. Detection is suspect.

Analyte & Samples(s) Qualified:

Perfluorododecanoic acid (PFDoA)

25D1372-06[SB-6 30-36]

Perfluorooctanesulfonamide (PFOSA)

25D1372-11[Equipment Blank-2]

The results of analyses reported only relate to samples submitted to Pace Analytical Services, LLC - East Longmeadow, Ma, for testing.

I certify that the analyses listed above, unless specifically listed as subcontracted, if any, were performed under my direction according to the approved methodologies listed in this document, and that based upon my inquiry of those individuals immediately responsible for obtaining the information, the material contained in this report is, to the best of my knowledge and belief, accurate and complete.

A handwritten signature in black ink, appearing to read "Lisa Worthington", on a light pink rectangular background.

Lisa A. Worthington
Technical Representative

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-9 0-2

Sampled: 4/15/2025 09:45

Sample ID: 25D1372-01

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluoroheptanoic acid (PFHpA)	0.11	0.20	0.082	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorooctanoic acid (PFOA)	0.30	0.20	0.069	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorononanoic acid (PFNA)	0.40	0.20	0.075	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorodecanoic acid (PFDA)	0.11	0.20	0.063	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluoroundecanoic acid (PFUnA)	0.12	0.20	0.082	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorooctanesulfonic acid (PFOS)	0.38	0.20	0.060	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.28	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
11Cl-PF3OUs (F53B Major)	ND	0.80	0.26	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1	L-03	Draft Method 1633	5/1/25	5/3/25 9:34	QNW
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW

Project Location: Monawk, NY		39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332		Work Order: 25D1372	
Date Received: 4/18/2025		Sample Description:			
Field Sample #: SB-9 0-2		Sampled: 4/15/2025 09:45			
Sample ID: 25D1372-01					
Sample Matrix: Soil					

Semivolatle Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:34	QNW
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	86.6		8-130				5/3/25 9:34			
13C5-PFPeA	104		35-130				5/3/25 9:34			
13C5-PFHxA	106		40-130				5/3/25 9:34			
13C4-PFHpA	101		40-130				5/3/25 9:34			
13C8-PFOA	110		40-130				5/3/25 9:34			
13C9-PFNA	104		40-130				5/3/25 9:34			
13C6-PFDA	114		40-130				5/3/25 9:34			
13C7-PFUnA	110		40-130				5/3/25 9:34			
13C2-PFDoA	108		40-130				5/3/25 9:34			
13C2-PFTeDA	119		20-130				5/3/25 9:34			
13C3-PFBS	103		40-135				5/3/25 9:34			
13C3-PFHxS	106		40-130				5/3/25 9:34			
13C8-PFOS	99.5		40-130				5/3/25 9:34			
13C2-4:2FTS	103		40-165				5/3/25 9:34			
13C2-6:2FTS	102		40-215				5/3/25 9:34			
13C2-8:2FTS	103		40-275				5/3/25 9:34			
13C8-PFOSA	92.9		40-130				5/3/25 9:34			
D3-NMeFOSA	94.2		10-130				5/3/25 9:34			
D5-NEtFOSA	94.1		10-130				5/3/25 9:34			
D3-NMeFOSAA	108		40-135				5/3/25 9:34			
D5-NEtFOSAA	108		40-150				5/3/25 9:34			
D7-NMeFOSE	93.2		20-130				5/3/25 9:34			
D9-NEtFOSE	94.2		15-130				5/3/25 9:34			
13C3-HFPO-DA	108		40-130				5/3/25 9:34			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-9 0-2

Sampled: 4/15/2025 09:45

Sample ID: 25D1372-01

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	85.6		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-9 2-12

Sampled: 4/15/2025 09:50

Sample ID: 25D1372-02

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.79	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluoropentanoic acid (PFPeA)	ND	0.39	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorohexanoic acid (PFHxA)	0.084	0.20	0.080	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluoroheptanoic acid (PFHpA)	0.090	0.20	0.082	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorooctanoic acid (PFOA)	0.17	0.20	0.068	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorononanoic acid (PFNA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorodecanoic acid (PFDA)	ND	0.20	0.062	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorooctanesulfonic acid (PFOS)	0.094	0.20	0.060	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.049	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	0.29	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	0.28	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.79	0.36	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.080	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.088	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.091	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.70	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	0.33	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.79	0.31	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
9Cl-PF3ONS (F53B Minor)	ND	0.79	0.23	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
11Cl-PF3OUdS (F53B Major)	ND	0.79	0.26	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.98	0.48	µg/kg dry	1	L-03	Draft Method 1633	5/1/25	5/3/25 9:43	QNW
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	4.9	1.5	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	4.9	1.6	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.39	0.14	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.39	0.091	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-9 2-12

Sampled: 4/15/2025 09:50

Sample ID: 25D1372-02

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.39	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.39	0.24	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:43	QNW
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	98.0		8-130				5/3/25 9:43			
13C5-PFPeA	112		35-130				5/3/25 9:43			
13C5-PFHxA	113		40-130				5/3/25 9:43			
13C4-PFHpA	111		40-130				5/3/25 9:43			
13C8-PFOA	120		40-130				5/3/25 9:43			
13C9-PFNA	113		40-130				5/3/25 9:43			
13C6-PFDA	117		40-130				5/3/25 9:43			
13C7-PFUnA	115		40-130				5/3/25 9:43			
13C2-PFDoA	114		40-130				5/3/25 9:43			
13C2-PFTeDA	116		20-130				5/3/25 9:43			
13C3-PFBS	118		40-135				5/3/25 9:43			
13C3-PFHxS	113		40-130				5/3/25 9:43			
13C8-PFOS	119		40-130				5/3/25 9:43			
13C2-4:2FTS	130		40-165				5/3/25 9:43			
13C2-6:2FTS	125		40-215				5/3/25 9:43			
13C2-8:2FTS	120		40-275				5/3/25 9:43			
13C8-PFOSA	106		40-130				5/3/25 9:43			
D3-NMeFOSA	108		10-130				5/3/25 9:43			
D5-NEtFOSA	104		10-130				5/3/25 9:43			
D3-NMeFOSAA	128		40-135				5/3/25 9:43			
D5-NEtFOSAA	122		40-150				5/3/25 9:43			
D7-NMeFOSE	108		20-130				5/3/25 9:43			
D9-NEtFOSE	108		15-130				5/3/25 9:43			
13C3-HFPO-DA	118		40-130				5/3/25 9:43			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-9 2-12

Sampled: 4/15/2025 09:50

Sample ID: 25D1372-02

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	91.3		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-9 54-60

Sampled: 4/15/2025 10:00

Sample ID: 25D1372-03

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.13	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.083	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorooctanoic acid (PFOA)	0.11	0.20	0.069	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorononanoic acid (PFNA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorodecanoic acid (PFDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.083	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.068	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorohexanesulfonic acid (PFHxS)	0.10	0.20	0.075	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorooctanesulfonic acid (PFOS)	0.28	0.20	0.061	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.065	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.058	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.056	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.090	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.65	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
11Cl-PF3OUDs (F53B Major)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1	L-03	Draft Method 1633	5/1/25	5/3/25 9:52	QNW
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.15	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-9 54-60

Sampled: 4/15/2025 10:00

Sample ID: 25D1372-03

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.25	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 9:52	QNW
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	94.4		8-130				5/3/25 9:52			
13C5-PFPeA	106		35-130				5/3/25 9:52			
13C5-PFHxA	109		40-130				5/3/25 9:52			
13C4-PFHpA	106		40-130				5/3/25 9:52			
13C8-PFOA	113		40-130				5/3/25 9:52			
13C9-PFNA	108		40-130				5/3/25 9:52			
13C6-PFDA	114		40-130				5/3/25 9:52			
13C7-PFUnA	116		40-130				5/3/25 9:52			
13C2-PFDoA	112		40-130				5/3/25 9:52			
13C2-PFTeDA	116		20-130				5/3/25 9:52			
13C3-PFBS	113		40-135				5/3/25 9:52			
13C3-PFHxS	113		40-130				5/3/25 9:52			
13C8-PFOS	113		40-130				5/3/25 9:52			
13C2-4:2FTS	120		40-165				5/3/25 9:52			
13C2-6:2FTS	118		40-215				5/3/25 9:52			
13C2-8:2FTS	115		40-275				5/3/25 9:52			
13C8-PFOSA	98.0		40-130				5/3/25 9:52			
D3-NMeFOSA	99.5		10-130				5/3/25 9:52			
D5-NEtFOSA	97.1		10-130				5/3/25 9:52			
D3-NMeFOSAA	116		40-135				5/3/25 9:52			
D5-NEtFOSAA	116		40-150				5/3/25 9:52			
D7-NMeFOSE	102		20-130				5/3/25 9:52			
D9-NEtFOSE	102		15-130				5/3/25 9:52			
13C3-HFPO-DA	114		40-130				5/3/25 9:52			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-9 54-60

Sampled: 4/15/2025 10:00

Sample ID: 25D1372-03

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	89.5		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-6 0-2

Sampled: 4/15/2025 10:25

Sample ID: 25D1372-04

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.13	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorohexanoic acid (PFHxA)	0.094	0.20	0.082	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.083	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorooctanoic acid (PFOA)	0.095	0.20	0.069	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorononanoic acid (PFNA)	0.19	0.20	0.075	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorodecanoic acid (PFDA)	0.35	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluoroundecanoic acid (PFUnA)	0.74	0.20	0.082	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorododecanoic acid (PFDoA)	0.44	0.20	0.075	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorotridecanoic acid (PFTrDA)	0.15	0.20	0.063	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.068	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorohexanesulfonic acid (PFHxS)	0.19	0.20	0.075	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorooctanesulfonic acid (PFOS)	5.7	0.20	0.060	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorononanesulfonic acid (PFNS)	0.26	0.20	0.050	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorodecanesulfonic acid (PFDS)	0.16	0.20	0.065	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.058	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	0.68	0.80	0.29	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:01	QNW
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	9.2	0.80	0.37	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluorooctanesulfonamide (PFOSA)	1.7	0.20	0.081	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
11Cl-PF3OUdS (F53B Major)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1	L-03	Draft Method 1633	5/1/25	5/3/25 10:01	QNW
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-6 0-2

Sampled: 4/15/2025 10:25

Sample ID: 25D1372-04

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:01	QNW
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	79.7		8-130				5/3/25 10:01			
13C5-PFPeA	95.8		35-130				5/3/25 10:01			
13C5-PFHxA	98.2		40-130				5/3/25 10:01			
13C4-PFHpA	94.2		40-130				5/3/25 10:01			
13C8-PFOA	103		40-130				5/3/25 10:01			
13C9-PFNA	102		40-130				5/3/25 10:01			
13C6-PFDA	105		40-130				5/3/25 10:01			
13C7-PFUnA	106		40-130				5/3/25 10:01			
13C2-PFDoA	102		40-130				5/3/25 10:01			
13C2-PFTeDA	103		20-130				5/3/25 10:01			
13C3-PFBS	103		40-135				5/3/25 10:01			
13C3-PFHxS	99.1		40-130				5/3/25 10:01			
13C8-PFOS	101		40-130				5/3/25 10:01			
13C2-4:2FTS	102		40-165				5/3/25 10:01			
13C2-6:2FTS	101		40-215				5/3/25 10:01			
13C2-8:2FTS	95.7		40-275				5/3/25 10:01			
13C8-PFOSA	92.2		40-130				5/3/25 10:01			
D3-NMeFOSA	97.1		10-130				5/3/25 10:01			
D5-NEtFOSA	98.2		10-130				5/3/25 10:01			
D3-NMeFOSAA	70.9		40-135				5/3/25 10:01			
D5-NEtFOSAA	80.7		40-150				5/3/25 10:01			
D7-NMeFOSE	99.0		20-130				5/3/25 10:01			
D9-NEtFOSE	98.3		15-130				5/3/25 10:01			
13C3-HFPO-DA	103		40-130				5/3/25 10:01			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-6 0-2

Sampled: 4/15/2025 10:25

Sample ID: 25D1372-04

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	89.9		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-6 2-12

Sampled: 4/15/2025 10:30

Sample ID: 25D1372-05

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.79	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorooctanoic acid (PFOA)	0.078	0.20	0.069	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorononanoic acid (PFNA)	0.11	0.20	0.075	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorodecanoic acid (PFDA)	0.22	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluoroundecanoic acid (PFUnA)	0.41	0.20	0.082	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorohexanesulfonic acid (PFHxS)	0.23	0.20	0.075	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorooctanesulfonic acid (PFOS)	3.9	0.20	0.060	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorononanesulfonic acid (PFNS)	0.18	0.20	0.050	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.79	0.29	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.79	0.28	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	1.1	0.79	0.37	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluorooctanesulfonamide (PFOSA)	0.20	0.20	0.081	µg/kg dry	1	PF-22	Draft Method 1633	5/1/25	5/3/25 10:10	QNW
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.79	0.34	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.79	0.32	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
9Cl-PF3ONS (F53B Minor)	ND	0.79	0.23	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
11Cl-PF3OUdS (F53B Major)	ND	0.79	0.26	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1	L-03	Draft Method 1633	5/1/25	5/3/25 10:10	QNW
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-6 2-12

Sampled: 4/15/2025 10:30

Sample ID: 25D1372-05

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:10	QNW
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	91.5		8-130				5/3/25 10:10			
13C5-PFPeA	105		35-130				5/3/25 10:10			
13C5-PFHxA	108		40-130				5/3/25 10:10			
13C4-PFHpA	106		40-130				5/3/25 10:10			
13C8-PFOA	115		40-130				5/3/25 10:10			
13C9-PFNA	108		40-130				5/3/25 10:10			
13C6-PFDA	118		40-130				5/3/25 10:10			
13C7-PFUnA	109		40-130				5/3/25 10:10			
13C2-PFDoA	114		40-130				5/3/25 10:10			
13C2-PFTeDA	113		20-130				5/3/25 10:10			
13C3-PFBS	110		40-135				5/3/25 10:10			
13C3-PFHxS	111		40-130				5/3/25 10:10			
13C8-PFOS	110		40-130				5/3/25 10:10			
13C2-4:2FTS	119		40-165				5/3/25 10:10			
13C2-6:2FTS	114		40-215				5/3/25 10:10			
13C2-8:2FTS	105		40-275				5/3/25 10:10			
13C8-PFOSA	99.9		40-130				5/3/25 10:10			
D3-NMeFOSA	96.6		10-130				5/3/25 10:10			
D5-NEtFOSA	99.8		10-130				5/3/25 10:10			
D3-NMeFOSAA	103		40-135				5/3/25 10:10			
D5-NEtFOSAA	106		40-150				5/3/25 10:10			
D7-NMeFOSE	101		20-130				5/3/25 10:10			
D9-NEtFOSE	98.8		15-130				5/3/25 10:10			
13C3-HFPO-DA	110		40-130				5/3/25 10:10			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-6 2-12

Sampled: 4/15/2025 10:30

Sample ID: 25D1372-05

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	88.2		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-6 30-36

Sampled: 4/15/2025 10:35

Sample ID: 25D1372-06

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.13	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluoroheptanoic acid (PFHpA)	0.12	0.20	0.083	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorooctanoic acid (PFOA)	0.11	0.20	0.069	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorononanoic acid (PFNA)	0.082	0.20	0.075	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorodecanoic acid (PFDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluoroundecanoic acid (PFUnA)	0.099	0.20	0.083	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorododecanoic acid (PFDoA)	0.079	0.20	0.075	µg/kg dry	1	PF-23, J	Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.068	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorohexanesulfonic acid (PFHxS)	0.25	0.20	0.075	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorooctanesulfonic acid (PFOS)	2.5	0.20	0.060	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorononanesulfonic acid (PFNS)	0.060	0.20	0.050	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.065	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.058	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluorooctanesulfonamide (PFOSA)	0.096	0.20	0.081	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:19	QNW
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.090	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
11Cl-PF3OUs (F53B Major)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1	L-03	Draft Method 1633	5/1/25	5/3/25 10:19	QNW
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-6 30-36

Sampled: 4/15/2025 10:35

Sample ID: 25D1372-06

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.25	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:19	QNW
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	93.8		8-130				5/3/25 10:19			
13C5-PFPeA	111		35-130				5/3/25 10:19			
13C5-PFHxA	115		40-130				5/3/25 10:19			
13C4-PFHpA	111		40-130				5/3/25 10:19			
13C8-PFOA	121		40-130				5/3/25 10:19			
13C9-PFNA	112		40-130				5/3/25 10:19			
13C6-PFDA	120		40-130				5/3/25 10:19			
13C7-PFUnA	119		40-130				5/3/25 10:19			
13C2-PFDoA	114		40-130				5/3/25 10:19			
13C2-PFTeDA	116		20-130				5/3/25 10:19			
13C3-PFBS	113		40-135				5/3/25 10:19			
13C3-PFHxS	114		40-130				5/3/25 10:19			
13C8-PFOS	107		40-130				5/3/25 10:19			
13C2-4:2FTS	117		40-165				5/3/25 10:19			
13C2-6:2FTS	124		40-215				5/3/25 10:19			
13C2-8:2FTS	103		40-275				5/3/25 10:19			
13C8-PFOSA	102		40-130				5/3/25 10:19			
D3-NMeFOSA	99.3		10-130				5/3/25 10:19			
D5-NEtFOSA	99.6		10-130				5/3/25 10:19			
D3-NMeFOSAA	114		40-135				5/3/25 10:19			
D5-NEtFOSAA	113		40-150				5/3/25 10:19			
D7-NMeFOSE	99.8		20-130				5/3/25 10:19			
D9-NEtFOSE	98.4		15-130				5/3/25 10:19			
13C3-HFPO-DA	114		40-130				5/3/25 10:19			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SB-6 30-36

Sampled: 4/15/2025 10:35

Sample ID: 25D1372-06

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	81.6		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: DUP2

Sampled: 4/15/2025 00:00

Sample ID: 25D1372-07

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.13	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.083	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorooctanoic acid (PFOA)	ND	0.20	0.069	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorononanoic acid (PFNA)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorodecanoic acid (PFDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluoroundecanoic acid (PFUnA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.068	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorohexanesulfonic acid (PFHxS)	0.085	0.20	0.075	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorooctanesulfonic acid (PFOS)	0.066	0.20	0.060	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.065	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.058	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.30	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
11Cl-PF3OUdS (F53B Major)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	0.49	µg/kg dry	1	L-03	Draft Method 1633	5/1/25	5/3/25 10:29	QNW
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: DUP2

Sampled: 4/15/2025 00:00

Sample ID: 25D1372-07

Sample Matrix: Soil

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:29	QNW
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	95.6		8-130				5/3/25 10:29			
13C5-PFPeA	115		35-130				5/3/25 10:29			
13C5-PFHxA	116		40-130				5/3/25 10:29			
13C4-PFHpA	112		40-130				5/3/25 10:29			
13C8-PFOA	119		40-130				5/3/25 10:29			
13C9-PFNA	115		40-130				5/3/25 10:29			
13C6-PFDA	116		40-130				5/3/25 10:29			
13C7-PFUnA	110		40-130				5/3/25 10:29			
13C2-PFDoA	109		40-130				5/3/25 10:29			
13C2-PFTeDA	116		20-130				5/3/25 10:29			
13C3-PFBS	115		40-135				5/3/25 10:29			
13C3-PFHxS	116		40-130				5/3/25 10:29			
13C8-PFOS	110		40-130				5/3/25 10:29			
13C2-4:2FTS	130		40-165				5/3/25 10:29			
13C2-6:2FTS	126		40-215				5/3/25 10:29			
13C2-8:2FTS	123		40-275				5/3/25 10:29			
13C8-PFOSA	100		40-130				5/3/25 10:29			
D3-NMeFOSA	98.9		10-130				5/3/25 10:29			
D5-NEtFOSA	97.7		10-130				5/3/25 10:29			
D3-NMeFOSAA	116		40-135				5/3/25 10:29			
D5-NEtFOSAA	113		40-150				5/3/25 10:29			
D7-NMeFOSE	100		20-130				5/3/25 10:29			
D9-NEtFOSE	99.1		15-130				5/3/25 10:29			
13C3-HFPO-DA	118		40-130				5/3/25 10:29			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: DUP2

Sampled: 4/15/2025 00:00

Sample ID: 25D1372-07

Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	89.5		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SW-1

Sampled: 4/15/2025 14:15

Sample ID: 25D1372-08

Sample Matrix: Surface Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	3.5	6.3	0.79	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluoropentanoic acid (PFPeA)	ND	3.2	0.44	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorohexanoic acid (PFHxA)	1.4	1.6	0.27	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluoroheptanoic acid (PFHpA)	1.5	1.6	0.28	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorooctanoic acid (PFOA)	1.5	1.6	0.41	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorononanoic acid (PFNA)	0.69	1.6	0.64	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorodecanoic acid (PFDA)	ND	1.6	0.38	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluoroundecanoic acid (PFUnA)	ND	1.6	0.50	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorododecanoic acid (PFDoA)	ND	1.6	0.34	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorotridecanoic acid (PFTrDA)	ND	1.6	0.48	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorotetradecanoic acid (PFTeDA)	ND	1.6	0.15	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorobutanesulfonic acid (PFBS)	0.92	1.6	0.34	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluoropentanesulfonic acid (PFPeS)	0.85	1.6	0.46	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorohexanesulfonic acid (PFHxS)	8.8	1.6	0.61	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.6	0.84	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorooctanesulfonic acid (PFOS)	16	1.6	0.39	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorononanesulfonic acid (PFNS)	ND	1.6	0.46	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorodecanesulfonic acid (PFDS)	ND	1.6	0.50	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorododecanesulfonic acid (PFDoS)	ND	1.6	0.71	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	6.3	1.3	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	6.3	2.9	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	6.3	3.2	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluorooctanesulfonamide (PFOSA)	ND	1.6	0.55	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.6	0.27	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.6	0.33	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
N-MeFOSAA (NMeFOSAA)	ND	1.6	1.5	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
N-EtFOSAA (NEtFOSAA)	ND	1.6	0.64	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	16	1.3	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	16	1.6	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	6.3	1.5	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	6.3	0.84	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
9Cl-PF3ONS (F53B Minor)	ND	6.3	0.92	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
11Cl-PF3OUDs (F53B Major)	ND	6.3	1.7	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.9	2.2	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	39	6.9	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	39	8.9	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	3.2	0.56	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	3.2	0.45	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SW-1

Sampled: 4/15/2025 14:15

Sample ID: 25D1372-08

Sample Matrix: Surface Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	3.2	0.42	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	3.2	2.1	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:25	AB
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	60.1		5-130				4/30/25 19:25			
13C5-PFPeA	76.4		40-130				4/30/25 19:25			
13C5-PFHxA	78.3		40-130				4/30/25 19:25			
13C4-PFHpA	82.0		40-130				4/30/25 19:25			
13C8-PFOA	78.7		40-130				4/30/25 19:25			
13C9-PFNA	74.7		40-130				4/30/25 19:25			
13C6-PFDA	81.2		40-130				4/30/25 19:25			
13C7-PFUnA	84.5		30-130				4/30/25 19:25			
13C2-PFDoA	66.2		10-130				4/30/25 19:25			
13C2-PFTeDA	48.9		10-130				4/30/25 19:25			
13C3-PFBS	75.3		40-135				4/30/25 19:25			
13C3-PFHxS	80.2		40-130				4/30/25 19:25			
13C8-PFOS	76.8		40-130				4/30/25 19:25			
13C2-4:2FTS	82.9		40-200				4/30/25 19:25			
13C2-6:2FTS	82.0		40-200				4/30/25 19:25			
13C2-8:2FTS	88.8		40-300				4/30/25 19:25			
13C8-PFOSA	64.9		40-130				4/30/25 19:25			
D3-NMeFOSA	49.2		10-130				4/30/25 19:25			
D5-NEtFOSA	50.5		10-130				4/30/25 19:25			
D3-NMeFOSAA	59.2		40-170				4/30/25 19:25			
D5-NEtFOSAA	74.5		25-135				4/30/25 19:25			
D7-NMeFOSE	50.9		10-130				4/30/25 19:25			
D9-NEtFOSE	47.3		10-130				4/30/25 19:25			
13C3-HFPO-DA	81.7		40-130				4/30/25 19:25			

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SED-1

Sampled: 4/15/2025 14:20

Sample ID: 25D1372-09

Sample Matrix: Sediment

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	0.80	0.27	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluoropentanoic acid (PFPeA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorohexanoic acid (PFHxA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluoroheptanoic acid (PFHpA)	ND	0.20	0.082	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorooctanoic acid (PFOA)	0.13	0.20	0.069	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorononanoic acid (PFNA)	0.19	0.20	0.075	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorodecanoic acid (PFDA)	0.14	0.20	0.063	µg/kg dry	1	J	Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluoroundecanoic acid (PFUnA)	0.21	0.20	0.082	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorododecanoic acid (PFDoA)	ND	0.20	0.074	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorotridecanoic acid (PFTrDA)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	0.067	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	0.063	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	0.075	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorooctanesulfonic acid (PFOS)	0.81	0.20	0.060	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorononanesulfonic acid (PFNS)	ND	0.20	0.050	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	0.064	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	0.057	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	0.29	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	0.37	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	0.081	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	0.055	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	0.089	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
N-MeFOSAA (NMeFOSAA)	ND	0.20	0.10	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
N-EtFOSAA (NEtFOSAA)	ND	0.20	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	0.64	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	0.71	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	0.34	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	0.80	0.32	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
9Cl-PF3ONS (F53B Minor)	ND	0.80	0.23	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
11Cl-PF3OUdS (F53B Major)	ND	0.80	0.26	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	0.99	0.49	µg/kg dry	1	L-03	Draft Method 1633	5/1/25	5/3/25 10:38	QNW
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	5.0	1.5	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	5.0	1.6	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	0.40	0.14	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	0.092	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SED-1

Sampled: 4/15/2025 14:20

Sample ID: 25D1372-09

Sample Matrix: Sediment

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	0.12	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	0.24	µg/kg dry	1		Draft Method 1633	5/1/25	5/3/25 10:38	QNW
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	99.5		8-130				5/3/25 10:38			
13C5-PFPeA	96.9		35-130				5/3/25 10:38			
13C5-PFHxA	101		40-130				5/3/25 10:38			
13C4-PFHpA	102		40-130				5/3/25 10:38			
13C8-PFOA	102		40-130				5/3/25 10:38			
13C9-PFNA	100		40-130				5/3/25 10:38			
13C6-PFDA	103		40-130				5/3/25 10:38			
13C7-PFUnA	113		40-130				5/3/25 10:38			
13C2-PFDoA	121		40-130				5/3/25 10:38			
13C2-PFTeDA	118		20-130				5/3/25 10:38			
13C3-PFBS	96.8		40-135				5/3/25 10:38			
13C3-PFHxS	96.1		40-130				5/3/25 10:38			
13C8-PFOS	106		40-130				5/3/25 10:38			
13C2-4:2FTS	124		40-165				5/3/25 10:38			
13C2-6:2FTS	120		40-215				5/3/25 10:38			
13C2-8:2FTS	139		40-275				5/3/25 10:38			
13C8-PFOSA	104		40-130				5/3/25 10:38			
D3-NMeFOSA	89.9		10-130				5/3/25 10:38			
D5-NEtFOSA	88.2		10-130				5/3/25 10:38			
D3-NMeFOSAA	123		40-135				5/3/25 10:38			
D5-NEtFOSAA	120		40-150				5/3/25 10:38			
D7-NMeFOSE	94.4		20-130				5/3/25 10:38			
D9-NEtFOSE	88.1		15-130				5/3/25 10:38			
13C3-HFPO-DA	105		40-130				5/3/25 10:38			



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: SED-1

Sampled: 4/15/2025 14:20

Sample ID: 25D1372-09

Sample Matrix: Sediment

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
% Solids	65.5		% Wt	1		SM 2540G	4/21/25	4/21/25 19:15	DMB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: DUP1

Sampled: 4/15/2025 00:00

Sample ID: 25D1372-10

Sample Matrix: Surface Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	4.8	6.0	0.75	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluoropentanoic acid (PFPeA)	1.1	3.0	0.42	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorohexanoic acid (PFHxA)	1.3	1.5	0.26	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluoroheptanoic acid (PFHpA)	1.5	1.5	0.26	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorooctanoic acid (PFOA)	1.4	1.5	0.39	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorononanoic acid (PFNA)	ND	1.5	0.61	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorodecanoic acid (PFDA)	ND	1.5	0.36	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluoroundecanoic acid (PFUnA)	ND	1.5	0.48	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorododecanoic acid (PFDoA)	ND	1.5	0.33	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorotridecanoic acid (PFTrDA)	ND	1.5	0.45	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorotetradecanoic acid (PFTeDA)	ND	1.5	0.14	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorobutanesulfonic acid (PFBS)	0.83	1.5	0.32	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluoropentanesulfonic acid (PFPeS)	0.90	1.5	0.44	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorohexanesulfonic acid (PFHxS)	8.7	1.5	0.58	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.5	0.79	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorooctanesulfonic acid (PFOS)	16	1.5	0.37	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorononanesulfonic acid (PFNS)	ND	1.5	0.44	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorodecanesulfonic acid (PFDS)	ND	1.5	0.47	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorododecanesulfonic acid (PFDoS)	ND	1.5	0.68	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	6.0	1.2	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	6.0	2.8	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	6.0	3.1	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluorooctanesulfonamide (PFOSA)	ND	1.5	0.52	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.5	0.26	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.5	0.31	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
N-MeFOSAA (NMeFOSAA)	ND	1.5	1.4	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
N-EtFOSAA (NEtFOSAA)	ND	1.5	0.61	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	15	1.2	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	15	1.5	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	6.0	1.4	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	6.0	0.80	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
9Cl-PF3ONS (F53B Minor)	ND	6.0	0.88	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
11Cl-PF3OUDs (F53B Major)	ND	6.0	1.6	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.5	2.1	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	38	6.6	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	38	8.4	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	3.0	0.53	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	3.0	0.43	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: DUP1

Sampled: 4/15/2025 00:00

Sample ID: 25D1372-10

Sample Matrix: Surface Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	3.0	0.40	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	3.0	2.0	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:35	AB
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	60.8		5-130				4/30/25 19:35			
13C5-PFPeA	77.5		40-130				4/30/25 19:35			
13C5-PFHxA	82.5		40-130				4/30/25 19:35			
13C4-PFHpA	86.3		40-130				4/30/25 19:35			
13C8-PFOA	79.2		40-130				4/30/25 19:35			
13C9-PFNA	80.5		40-130				4/30/25 19:35			
13C6-PFDA	82.0		40-130				4/30/25 19:35			
13C7-PFUnA	75.8		30-130				4/30/25 19:35			
13C2-PFDoA	67.9		10-130				4/30/25 19:35			
13C2-PFTeDA	50.5		10-130				4/30/25 19:35			
13C3-PFBS	77.4		40-135				4/30/25 19:35			
13C3-PFHxS	78.0		40-130				4/30/25 19:35			
13C8-PFOS	78.0		40-130				4/30/25 19:35			
13C2-4:2FTS	84.9		40-200				4/30/25 19:35			
13C2-6:2FTS	80.8		40-200				4/30/25 19:35			
13C2-8:2FTS	92.3		40-300				4/30/25 19:35			
13C8-PFOSA	65.6		40-130				4/30/25 19:35			
D3-NMeFOSA	54.5		10-130				4/30/25 19:35			
D5-NEtFOSA	52.3		10-130				4/30/25 19:35			
D3-NMeFOSAA	63.7		40-170				4/30/25 19:35			
D5-NEtFOSAA	79.7		25-135				4/30/25 19:35			
D7-NMeFOSE	50.6		10-130				4/30/25 19:35			
D9-NEtFOSE	45.6		10-130				4/30/25 19:35			
13C3-HFPO-DA	83.1		40-130				4/30/25 19:35			

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: Equipment Blank-2

Sampled: 4/15/2025 08:50

Sample ID: 25D1372-11

Sample Matrix: Equipment Blank Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	6.0	0.75	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluoropentanoic acid (PFPeA)	ND	3.0	0.42	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorohexanoic acid (PFHxA)	ND	1.5	0.26	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluoroheptanoic acid (PFHpA)	ND	1.5	0.26	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorooctanoic acid (PFOA)	0.46	1.5	0.39	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorononanoic acid (PFNA)	ND	1.5	0.61	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorodecanoic acid (PFDA)	ND	1.5	0.36	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluoroundecanoic acid (PFUnA)	ND	1.5	0.48	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorododecanoic acid (PFDoA)	ND	1.5	0.33	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorotridecanoic acid (PFTrDA)	ND	1.5	0.45	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorotetradecanoic acid (PFTeDA)	ND	1.5	0.14	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorobutanesulfonic acid (PFBS)	ND	1.5	0.32	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluoropentanesulfonic acid (PFPeS)	ND	1.5	0.44	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorohexanesulfonic acid (PFHxS)	ND	1.5	0.58	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.5	0.79	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorooctanesulfonic acid (PFOS)	0.66	1.5	0.37	ng/L	1	J	Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorononanesulfonic acid (PFNS)	ND	1.5	0.44	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorodecanesulfonic acid (PFDS)	ND	1.5	0.47	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorododecanesulfonic acid (PFDoS)	ND	1.5	0.67	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	6.0	1.2	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	6.0	2.8	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	6.0	3.1	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluorooctanesulfonamide (PFOSA)	0.58	1.5	0.52	ng/L	1	PF-23, J	Draft Method 1633	4/28/25	4/30/25 19:44	AB
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.5	0.26	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.5	0.31	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
N-MeFOSAA (NMeFOSAA)	10	1.5	1.4	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
N-EtFOSAA (NEtFOSAA)	ND	1.5	0.60	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	15	1.2	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	15	1.5	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	6.0	1.4	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	6.0	0.79	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
9Cl-PF3ONS (F53B Minor)	ND	6.0	0.88	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
11Cl-PF3OUDS (F53B Major)	ND	6.0	1.6	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.5	2.1	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	37	6.6	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	37	8.4	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	3.0	0.53	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	3.0	0.43	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB

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Project Location: Monawk, NY

Sample Description:

Work Order: 25D1372

Date Received: 4/18/2025

Field Sample #: Equipment Blank-2

Sampled: 4/15/2025 08:50

Sample ID: 25D1372-11

Sample Matrix: Equipment Blank Water

Semivolatle Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	3.0	0.40	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	3.0	2.0	ng/L	1		Draft Method 1633	4/28/25	4/30/25 19:44	AB
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	84.1		5-130				4/30/25 19:44			
13C5-PFPeA	87.7		40-130				4/30/25 19:44			
13C5-PFHxA	88.2		40-130				4/30/25 19:44			
13C4-PFHpA	90.7		40-130				4/30/25 19:44			
13C8-PFOA	86.7		40-130				4/30/25 19:44			
13C9-PFNA	88.1		40-130				4/30/25 19:44			
13C6-PFDA	88.5		40-130				4/30/25 19:44			
13C7-PFUnA	88.7		30-130				4/30/25 19:44			
13C2-PFDoA	72.1		10-130				4/30/25 19:44			
13C2-PFTeDA	65.6		10-130				4/30/25 19:44			
13C3-PFBS	83.3		40-135				4/30/25 19:44			
13C3-PFHxS	83.2		40-130				4/30/25 19:44			
13C8-PFOS	87.3		40-130				4/30/25 19:44			
13C2-4:2FTS	99.6		40-200				4/30/25 19:44			
13C2-6:2FTS	94.4		40-200				4/30/25 19:44			
13C2-8:2FTS	96.3		40-300				4/30/25 19:44			
13C8-PFOSA	67.8		40-130				4/30/25 19:44			
D3-NMeFOSA	50.9		10-130				4/30/25 19:44			
D5-NEtFOSA	52.2		10-130				4/30/25 19:44			
D3-NMeFOSAA	75.1		40-170				4/30/25 19:44			
D5-NEtFOSAA	95.1		25-135				4/30/25 19:44			
D7-NMeFOSE	60.3		10-130				4/30/25 19:44			
D9-NEtFOSE	58.7		10-130				4/30/25 19:44			
13C3-HFPO-DA	88.2		40-130				4/30/25 19:44			

**Sample Extraction Data****Prep Method:**EPA 1633 **Analytical Method:**Draft Method 1633

Lab Number [Field ID]	Batch	Initial [g]	Final [mL]	Date
25D1372-01 [SB-9 0-2]	B404148	5.88	4.00	05/01/25
25D1372-02 [SB-9 2-12]	B404148	5.56	4.00	05/01/25
25D1372-03 [SB-9 54-60]	B404148	5.58	4.00	05/01/25
25D1372-04 [SB-6 0-2]	B404148	5.57	4.00	05/01/25
25D1372-05 [SB-6 2-12]	B404148	5.70	4.00	05/01/25
25D1372-06 [SB-6 30-36]	B404148	6.13	4.00	05/01/25
25D1372-07 [DUP2]	B404148	5.60	4.00	05/01/25
25D1372-09 [SED-1]	B404148	7.68	4.00	05/01/25

Prep Method:EPA 1633 **Analytical Method:**Draft Method 1633

Lab Number [Field ID]	Batch	Initial [mL]	Final [mL]	Date
25D1372-08 [SW-1]	B403737	507	4.00	04/28/25
25D1372-10 [DUP1]	B403737	533	4.00	04/28/25
25D1372-11 [Equipment Blank-2]	B403737	534	4.00	04/28/25

Prep Method:% Solids **Analytical Method:**SM 2540G

Lab Number [Field ID]	Batch	Date
25D1372-01 [SB-9 0-2]	B403480	04/21/25
25D1372-02 [SB-9 2-12]	B403480	04/21/25
25D1372-03 [SB-9 54-60]	B403480	04/21/25
25D1372-04 [SB-6 0-2]	B403480	04/21/25
25D1372-05 [SB-6 2-12]	B403480	04/21/25
25D1372-06 [SB-6 30-36]	B403480	04/21/25
25D1372-07 [DUP2]	B403480	04/21/25
25D1372-09 [SED-1]	B403480	04/21/25

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403737 - EPA 1633										
Blank (B403737-BLK1)				Prepared: 04/28/25 Analyzed: 04/30/25						
Perfluorobutanoic acid (PFBA)	ND	6.3	ng/L							
Perfluoropentanoic acid (PFPeA)	ND	3.2	ng/L							
Perfluorohexanoic acid (PFHxA)	ND	1.6	ng/L							
Perfluoroheptanoic acid (PFHpA)	ND	1.6	ng/L							
Perfluorooctanoic acid (PFOA)	ND	1.6	ng/L							
Perfluorononanoic acid (PFNA)	ND	1.6	ng/L							
Perfluorodecanoic acid (PFDA)	ND	1.6	ng/L							
Perfluoroundecanoic acid (PFUnA)	ND	1.6	ng/L							
Perfluorododecanoic acid (PFDoA)	ND	1.6	ng/L							
Perfluorotridecanoic acid (PFTrDA)	ND	1.6	ng/L							
Perfluorotetradecanoic acid (PFTeDA)	ND	1.6	ng/L							
Perfluorobutanesulfonic acid (PFBS)	ND	1.6	ng/L							
Perfluoropentanesulfonic acid (PFPeS)	ND	1.6	ng/L							
Perfluorohexanesulfonic acid (PFHxS)	ND	1.6	ng/L							
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.6	ng/L							
Perfluorooctanesulfonic acid (PFOS)	ND	1.6	ng/L							
Perfluorononanesulfonic acid (PFNS)	ND	1.6	ng/L							
Perfluorodecanesulfonic acid (PFDS)	ND	1.6	ng/L							
Perfluorododecanesulfonic acid (PFDoS)	ND	1.6	ng/L							
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	6.3	ng/L							
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	6.3	ng/L							
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	6.3	ng/L							
Perfluorooctanesulfonamide (PFOSA)	ND	1.6	ng/L							
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.6	ng/L							
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.6	ng/L							
N-MeFOSAA (NMeFOSAA)	ND	1.6	ng/L							
N-EtFOSAA (NEtFOSAA)	ND	1.6	ng/L							
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	16	ng/L							
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	16	ng/L							
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	6.3	ng/L							
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	6.3	ng/L							
9Cl-PF3ONS (F53B Minor)	ND	6.3	ng/L							
11Cl-PF3OUdS (F53B Major)	ND	6.3	ng/L							
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.9	ng/L							
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	40	ng/L							
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	ND	40	ng/L							
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	ND	3.2	ng/L							
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	3.2	ng/L							
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	3.2	ng/L							
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	3.2	ng/L							
Surrogate: 13C4-PFBA	79.3		ng/L	79.37		99.9	5-130			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403737 - EPA 1633
Blank (B403737-BLK1)

Prepared: 04/28/25 Analyzed: 04/30/25

Surrogate: 13C5-PFPeA	40.9		ng/L	39.69		103	40-130			
Surrogate: 13C5-PFHxA	20.8		ng/L	19.84		105	40-130			
Surrogate: 13C4-PFHpA	20.2		ng/L	19.84		102	40-130			
Surrogate: 13C8-PFOA	21.0		ng/L	19.84		106	40-130			
Surrogate: 13C9-PFNA	9.49		ng/L	9.921		95.7	40-130			
Surrogate: 13C6-PFDA	9.68		ng/L	9.921		97.6	40-130			
Surrogate: 13C7-PFUnA	9.85		ng/L	9.921		99.3	30-130			
Surrogate: 13C2-PFDoA	8.47		ng/L	9.921		85.4	10-130			
Surrogate: 13C2-PFTeDA	8.23		ng/L	9.921		82.9	10-130			
Surrogate: 13C3-PFBS	19.3		ng/L	19.84		97.0	40-135			
Surrogate: 13C3-PFHxS	19.1		ng/L	19.84		96.3	40-130			
Surrogate: 13C8-PFOS	18.8		ng/L	19.84		94.9	40-130			
Surrogate: 13C2-4:2FTS	43.6		ng/L	39.69		110	40-200			
Surrogate: 13C2-6:2FTS	43.0		ng/L	39.69		108	40-200			
Surrogate: 13C2-8:2FTS	37.4		ng/L	39.69		94.2	40-300			
Surrogate: 13C8-PFOA	16.2		ng/L	19.84		81.9	40-130			
Surrogate: D3-NMeFOSA	11.7		ng/L	19.84		59.1	10-130			
Surrogate: D5-NEtFOSA	11.3		ng/L	19.84		57.1	10-130			
Surrogate: D3-NMeFOSAA	33.8		ng/L	39.69		85.3	40-170			
Surrogate: D5-NEtFOSAA	38.2		ng/L	39.69		96.3	25-135			
Surrogate: D7-NMeFOSE	133		ng/L	198.4		67.2	10-130			
Surrogate: D9-NEtFOSE	131		ng/L	198.4		66.0	10-130			
Surrogate: 13C3-HFPO-DA	82.3		ng/L	79.37		104	40-130			

LCS (B403737-BS1)

Prepared: 04/28/25 Analyzed: 04/30/25

Perfluorobutanoic acid (PFBA)	74.0	6.3	ng/L	79.37		93.2	70-140			
Perfluoropentanoic acid (PFPeA)	37.4	3.2	ng/L	39.68		94.3	65-135			
Perfluorohexanoic acid (PFHxA)	18.6	1.6	ng/L	19.84		93.8	70-145			
Perfluoroheptanoic acid (PFHpA)	19.3	1.6	ng/L	19.84		97.1	70-150			
Perfluorooctanoic acid (PFOA)	18.5	1.6	ng/L	19.84		93.1	70-150			
Perfluorononanoic acid (PFNA)	18.8	1.6	ng/L	19.84		94.6	70-150			
Perfluorodecanoic acid (PFDA)	20.1	1.6	ng/L	19.84		101	70-140			
Perfluoroundecanoic acid (PFUnA)	19.7	1.6	ng/L	19.84		99.1	70-145			
Perfluorododecanoic acid (PFDoA)	19.1	1.6	ng/L	19.84		96.5	70-140			
Perfluorotridecanoic acid (PFTTrDA)	18.3	1.6	ng/L	19.84		92.3	65-140			
Perfluorotetradecanoic acid (PFTeDA)	20.4	1.6	ng/L	19.84		103	60-140			
Perfluorobutanesulfonic acid (PFBS)	16.5	1.6	ng/L	17.62		93.5	60-145			
Perfluoropentanesulfonic acid (PFPeS)	16.8	1.6	ng/L	18.65		90.0	65-140			
Perfluorohexanesulfonic acid (PFHxS)	17.0	1.6	ng/L	18.10		93.7	65-145			
Perfluoroheptanesulfonic acid (PFHpS)	19.3	1.6	ng/L	18.89		102	70-150			
Perfluorooctanesulfonic acid (PFOS)	17.6	1.6	ng/L	18.41		95.4	55-150			
Perfluorononanesulfonic acid (PFNS)	17.2	1.6	ng/L	19.05		90.2	65-145			
Perfluorodecanesulfonic acid (PFDS)	16.6	1.6	ng/L	19.13		87.0	60-145			
Perfluorododecanesulfonic acid (PFDoS)	14.2	1.6	ng/L	19.21		73.8	50-145			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	76.6	6.3	ng/L	74.37		103	70-145			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	80.7	6.3	ng/L	75.48		107	65-155			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	82.6	6.3	ng/L	76.19		108	60-150			
Perfluorooctanesulfonamide (PFOSA)	19.6	1.6	ng/L	19.84		99.0	70-145			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	19.9	1.6	ng/L	19.84		100	60-150			

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403737 - EPA 1633										
LCS (B403737-BS1)										
Prepared: 04/28/25 Analyzed: 04/30/25										
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	17.8	1.6	ng/L	19.84		89.9	65-145			
N-MeFOSAA (NMeFOSAA)	18.9	1.6	ng/L	19.84		95.3	50-140			
N-EtFOSAA (NEtFOSAA)	18.0	1.6	ng/L	19.84		90.9	70-145			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	192	16	ng/L	198.4		96.6	70-145			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	190	16	ng/L	198.4		95.5	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	78.5	6.3	ng/L	79.37		99.0	70-140			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	83.1	6.3	ng/L	75.00		111	65-145			
9Cl-PF3ONS (F53B Minor)	68.2	6.3	ng/L	74.05		92.0	70-155			
11Cl-PF3OUdS (F53B Major)	66.2	6.3	ng/L	73.81		89.7	55-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	82.4	7.9	ng/L	99.21		83.1	65-130			
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	457	40	ng/L	496.0		92.1	70-135			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	441	40	ng/L	496.0		88.9	50-145			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEA)	35.2	3.2	ng/L	35.40		99.3	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	38.3	3.2	ng/L	39.68		96.4	55-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	39.4	3.2	ng/L	39.68		99.2	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	40.1	3.2	ng/L	39.68		101	50-150			
Surrogate: 13C4-PFBA	69.1		ng/L	79.37		87.1	5-130			
Surrogate: 13C5-PFPeA	34.6		ng/L	39.68		87.1	40-130			
Surrogate: 13C5-PFHxA	17.7		ng/L	19.84		89.0	40-130			
Surrogate: 13C4-PFHpA	17.2		ng/L	19.84		86.7	40-130			
Surrogate: 13C8-PFOA	17.7		ng/L	19.84		89.3	40-130			
Surrogate: 13C9-PFNA	8.94		ng/L	9.921		90.1	40-130			
Surrogate: 13C6-PFDA	8.44		ng/L	9.921		85.1	40-130			
Surrogate: 13C7-PFUnA	8.53		ng/L	9.921		85.9	30-130			
Surrogate: 13C2-PFDoA	7.83		ng/L	9.921		79.0	10-130			
Surrogate: 13C2-PFTeDA	6.99		ng/L	9.921		70.4	10-130			
Surrogate: 13C3-PFBS	17.0		ng/L	19.84		85.7	40-135			
Surrogate: 13C3-PFHxS	17.8		ng/L	19.84		89.7	40-130			
Surrogate: 13C8-PFOS	16.4		ng/L	19.84		82.6	40-130			
Surrogate: 13C2-4:2FTS	38.3		ng/L	39.68		96.5	40-200			
Surrogate: 13C2-6:2FTS	38.2		ng/L	39.68		96.3	40-200			
Surrogate: 13C2-8:2FTS	35.8		ng/L	39.68		90.1	40-300			
Surrogate: 13C8-PFOSA	13.3		ng/L	19.84		67.3	40-130			
Surrogate: D3-NMeFOSA	9.50		ng/L	19.84		47.9	10-130			
Surrogate: D5-NEtFOSA	9.82		ng/L	19.84		49.5	10-130			
Surrogate: D3-NMeFOSAA	30.4		ng/L	39.68		76.5	40-170			
Surrogate: D5-NEtFOSAA	35.9		ng/L	39.68		90.4	25-135			
Surrogate: D7-NMeFOSE	115		ng/L	198.4		58.2	10-130			
Surrogate: D9-NEtFOSE	116		ng/L	198.4		58.5	10-130			
Surrogate: 13C3-HFPO-DA	74.4		ng/L	79.37		93.7	40-130			
MRL Check (B403737-MRL1)										
Prepared: 04/28/25 Analyzed: 04/30/25										
Perfluorobutanoic acid (PFBA)	11.9	6.3	ng/L	12.56		94.6	70-140			
Perfluoropentanoic acid (PFPeA)	5.96	3.1	ng/L	6.279		94.9	65-135			

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403737 - EPA 1633										
MRL Check (B403737-MRL1)										
Prepared: 04/28/25 Analyzed: 04/30/25										
Perfluorohexanoic acid (PFHxA)	3.01	1.6	ng/L	3.140		95.8	70-145			
Perfluoroheptanoic acid (PFHpA)	2.96	1.6	ng/L	3.140		94.3	70-150			
Perfluorooctanoic acid (PFOA)	2.98	1.6	ng/L	3.140		95.1	70-150			
Perfluorononanoic acid (PFNA)	3.12	1.6	ng/L	3.140		99.4	70-150			
Perfluorodecanoic acid (PFDA)	3.15	1.6	ng/L	3.140		100	70-140			
Perfluoroundecanoic acid (PFUnA)	3.06	1.6	ng/L	3.140		97.6	70-145			
Perfluorododecanoic acid (PFDoA)	3.25	1.6	ng/L	3.140		103	70-140			
Perfluorotridecanoic acid (PFTrDA)	3.06	1.6	ng/L	3.140		97.5	65-140			
Perfluorotetradecanoic acid (PFTeDA)	2.84	1.6	ng/L	3.140		90.4	60-140			
Perfluorobutanesulfonic acid (PFBS)	2.65	1.6	ng/L	2.788		95.1	60-145			
Perfluoropentanesulfonic acid (PFPeS)	2.39	1.6	ng/L	2.951		80.9	65-140			
Perfluorohexanesulfonic acid (PFHxS)	2.66	1.6	ng/L	2.863		93.0	65-145			
Perfluoroheptanesulfonic acid (PFHpS)	2.86	1.6	ng/L	2.989		95.8	70-150			
Perfluorooctanesulfonic acid (PFOS)	2.62	1.6	ng/L	2.914		89.8	55-150			
Perfluorononanesulfonic acid (PFNS)	2.45	1.6	ng/L	3.014		81.3	65-145			
Perfluorodecanesulfonic acid (PFDS)	2.80	1.6	ng/L	3.027		92.5	60-145			
Perfluorododecanesulfonic acid (PFDoS)	2.56	1.6	ng/L	3.039		84.3	50-145			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	11.6	6.3	ng/L	11.77		98.8	70-145			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	12.2	6.3	ng/L	11.94		102	65-155			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	11.5	6.3	ng/L	12.06		95.3	60-150			
Perfluorooctanesulfonamide (PFOSA)	2.92	1.6	ng/L	3.140		92.9	70-145			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	3.09	1.6	ng/L	3.140		98.4	60-150			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	3.31	1.6	ng/L	3.140		105	65-145			
N-MeFOSAA (NMeFOSAA)	2.77	1.6	ng/L	3.140		88.1	50-140			
N-EtFOSAA (NEtFOSAA)	2.86	1.6	ng/L	3.140		91.1	70-145			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	28.9	16	ng/L	31.40		92.1	70-145			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	29.6	16	ng/L	31.40		94.4	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	11.7	6.3	ng/L	12.56		93.1	70-140			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	13.3	6.3	ng/L	11.87		112	65-145			
9Cl-PF3ONS (F53B Minor)	10.7	6.3	ng/L	11.72		91.6	70-155			
11Cl-PF3OUDS (F53B Major)	10.0	6.3	ng/L	11.68		85.8	55-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	13.6	7.8	ng/L	15.70		86.7	65-130			
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	69.3	39	ng/L	78.49		88.3	70-135			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	71.6	39	ng/L	78.49		91.2	50-145			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	5.64	3.1	ng/L	5.601		101	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	5.89	3.1	ng/L	6.279		93.8	55-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	5.92	3.1	ng/L	6.279		94.3	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	5.96	3.1	ng/L	6.279		94.9	50-150			
Surrogate: 13C4-PFBA	64.1		ng/L	78.49		81.7	5-130			
Surrogate: 13C5-PFPeA	32.5		ng/L	39.24		82.8	40-130			
Surrogate: 13C5-PFHxA	16.4		ng/L	19.62		83.4	40-130			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403737 - EPA 1633
MRL Check (B403737-MRL1)

Prepared: 04/28/25 Analyzed: 04/30/25

Surrogate: 13C4-PFHpA	16.6		ng/L	19.62		84.4	40-130			
Surrogate: 13C8-PFOA	16.3		ng/L	19.62		82.9	40-130			
Surrogate: 13C9-PFNA	7.39		ng/L	9.811		75.3	40-130			
Surrogate: 13C6-PFDA	7.67		ng/L	9.811		78.2	40-130			
Surrogate: 13C7-PFUnA	7.86		ng/L	9.811		80.1	30-130			
Surrogate: 13C2-PFDoA	6.33		ng/L	9.811		64.6	10-130			
Surrogate: 13C2-PFTeDA	6.34		ng/L	9.811		64.6	10-130			
Surrogate: 13C3-PFBS	14.3		ng/L	19.62		73.1	40-135			
Surrogate: 13C3-PFHxS	15.6		ng/L	19.62		79.5	40-130			
Surrogate: 13C8-PFOS	14.7		ng/L	19.62		74.8	40-130			
Surrogate: 13C2-4:2FTS	36.3		ng/L	39.24		92.4	40-200			
Surrogate: 13C2-6:2FTS	35.4		ng/L	39.24		90.2	40-200			
Surrogate: 13C2-8:2FTS	38.4		ng/L	39.24		98.0	40-300			
Surrogate: 13C8-PFOSA	11.8		ng/L	19.62		60.1	40-130			
Surrogate: D3-NMeFOSA	8.03		ng/L	19.62		40.9	10-130			
Surrogate: D5-NEtFOSA	7.97		ng/L	19.62		40.6	10-130			
Surrogate: D3-NMeFOSAA	25.2		ng/L	39.24		64.1	40-170			
Surrogate: D5-NEtFOSAA	33.9		ng/L	39.24		86.4	25-135			
Surrogate: D7-NMeFOSE	97.0		ng/L	196.2		49.5	10-130			
Surrogate: D9-NEtFOSE	94.9		ng/L	196.2		48.4	10-130			
Surrogate: 13C3-HFPO-DA	66.3		ng/L	78.49		84.5	40-130			

Matrix Spike (B403737-MS1)

Source: 25D1372-08

Prepared: 04/28/25 Analyzed: 04/30/25

Perfluorobutanoic acid (PFBA)	86.3	6.4	ng/L	80.22	3.50	103	70-140
Perfluoropentanoic acid (PFPeA)	41.4	3.2	ng/L	40.11	ND	103	65-135
Perfluorohexanoic acid (PFHxA)	21.6	1.6	ng/L	20.06	1.35	101	70-145
Perfluoroheptanoic acid (PFHpA)	22.1	1.6	ng/L	20.06	1.54	103	70-150
Perfluorooctanoic acid (PFOA)	21.5	1.6	ng/L	20.06	1.53	99.8	70-150
Perfluorononanoic acid (PFNA)	20.3	1.6	ng/L	20.06	0.691	97.9	70-150
Perfluorodecanoic acid (PFDA)	20.5	1.6	ng/L	20.06	ND	102	70-140
Perfluoroundecanoic acid (PFUnA)	22.9	1.6	ng/L	20.06	ND	114	70-145
Perfluorododecanoic acid (PFDoA)	21.0	1.6	ng/L	20.06	ND	104	70-140
Perfluorotridecanoic acid (PFTrDA)	18.2	1.6	ng/L	20.06	ND	90.5	65-140
Perfluorotetradecanoic acid (PFTeDA)	22.3	1.6	ng/L	20.06	ND	111	60-140
Perfluorobutanesulfonic acid (PFBS)	18.2	1.6	ng/L	17.81	0.925	96.9	60-145
Perfluoropentanesulfonic acid (PFPeS)	18.6	1.6	ng/L	18.85	0.849	94.3	65-140
Perfluorohexanesulfonic acid (PFHxS)	27.8	1.6	ng/L	18.29	8.79	104	65-145
Perfluoroheptanesulfonic acid (PFHpS)	22.1	1.6	ng/L	19.09	ND	116	70-150
Perfluorooctanesulfonic acid (PFOS)	34.6	1.6	ng/L	18.61	16.3	98.6	55-150
Perfluorononanesulfonic acid (PFNS)	18.6	1.6	ng/L	19.25	ND	96.6	65-145
Perfluorodecanesulfonic acid (PFDS)	16.3	1.6	ng/L	19.33	ND	84.3	60-145
Perfluorododecanesulfonic acid (PFDoS)	12.2	1.6	ng/L	19.41	ND	62.9	50-145
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	82.1	6.4	ng/L	75.17	ND	109	70-145
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	87.0	6.4	ng/L	76.29	ND	114	65-155
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	88.0	6.4	ng/L	77.01	ND	114	60-150
Perfluorooctanesulfonamide (PFOSA)	20.4	1.6	ng/L	20.06	ND	102	70-145
N-methyl perfluorooctanesulfonamide (NMeFOSA)	21.8	1.6	ng/L	20.06	ND	109	60-150
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	20.3	1.6	ng/L	20.06	ND	101	65-145
N-MeFOSAA (NMeFOSAA)	21.3	1.6	ng/L	20.06	ND	106	50-140

QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403737 - EPA 1633										
Matrix Spike (B403737-MS1)	Source: 25D1372-08			Prepared: 04/28/25 Analyzed: 04/30/25						
N-EtFOSAA (NEtFOSAA)	20.1	1.6	ng/L	20.06	ND	100	70-145			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	210	16	ng/L	200.6	ND	105	70-145			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	213	16	ng/L	200.6	ND	106	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	82.2	6.4	ng/L	80.22	ND	102	70-140			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	87.4	6.4	ng/L	75.81	ND	115	65-145			
9Cl-PF3ONS (F53B Minor)	72.3	6.4	ng/L	74.85	ND	96.6	70-155			
11Cl-PF3OUdS (F53B Major)	62.5	6.4	ng/L	74.61	ND	83.8	55-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	88.4	8.0	ng/L	100.3	ND	88.2	65-130			
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA) (5:3FTCA)	498	40	ng/L	501.4	ND	99.2	70-135			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	490	40	ng/L	501.4	ND	97.8	50-145			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	39.0	3.2	ng/L	35.78	ND	109	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	49.4	3.2	ng/L	40.11	ND	123	55-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	42.2	3.2	ng/L	40.11	ND	105	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	41.3	3.2	ng/L	40.11	ND	103	50-150			
Surrogate: 13C4-PFBA	49.2		ng/L	80.22		61.3	5-130			
Surrogate: 13C5-PFPeA	30.2		ng/L	40.11		75.4	40-130			
Surrogate: 13C5-PFHxA	16.0		ng/L	20.06		79.6	40-130			
Surrogate: 13C4-PFHpA	16.4		ng/L	20.06		82.0	40-130			
Surrogate: 13C8-PFOA	14.7		ng/L	20.06		73.4	40-130			
Surrogate: 13C9-PFNA	7.71		ng/L	10.03		76.9	40-130			
Surrogate: 13C6-PFDA	7.53		ng/L	10.03		75.1	40-130			
Surrogate: 13C7-PFUnA	7.13		ng/L	10.03		71.1	30-130			
Surrogate: 13C2-PFDoA	6.23		ng/L	10.03		62.1	10-130			
Surrogate: 13C2-PFTeDA	4.39		ng/L	10.03		43.8	10-130			
Surrogate: 13C3-PFBS	15.3		ng/L	20.06		76.5	40-135			
Surrogate: 13C3-PFHxS	16.3		ng/L	20.06		81.3	40-130			
Surrogate: 13C8-PFOS	14.2		ng/L	20.06		70.9	40-130			
Surrogate: 13C2-4:2FTS	35.1		ng/L	40.11		87.4	40-200			
Surrogate: 13C2-6:2FTS	31.0		ng/L	40.11		77.2	40-200			
Surrogate: 13C2-8:2FTS	32.4		ng/L	40.11		80.8	40-300			
Surrogate: 13C8-PFOA	13.3		ng/L	20.06		66.4	40-130			
Surrogate: D3-NMeFOSA	9.22		ng/L	20.06		46.0	10-130			
Surrogate: D5-NEtFOSA	8.82		ng/L	20.06		44.0	10-130			
Surrogate: D3-NMeFOSAA	24.1		ng/L	40.11		60.1	40-170			
Surrogate: D5-NEtFOSAA	30.4		ng/L	40.11		75.8	25-135			
Surrogate: D7-NMeFOSE	91.5		ng/L	200.6		45.6	10-130			
Surrogate: D9-NEtFOSE	82.1		ng/L	200.6		41.0	10-130			
Surrogate: 13C3-HFPO-DA	65.1		ng/L	80.22		81.1	40-130			
Matrix Spike Dup (B403737-MSD1)	Source: 25D1372-08			Prepared: 04/28/25 Analyzed: 04/30/25						
Perfluorobutanoic acid (PFBA)	80.2	6.2	ng/L	77.95	3.50	98.5	70-140	7.23	25	
Perfluoropentanoic acid (PFPeA)	38.4	3.1	ng/L	38.97	ND	98.7	65-135	7.40	25	
Perfluorohexanoic acid (PFHxA)	20.2	1.6	ng/L	19.49	1.35	96.9	70-145	6.72	25	
Perfluoroheptanoic acid (PFHpA)	19.7	1.6	ng/L	19.49	1.54	93.1	70-150	11.8	25	
Perfluorooctanoic acid (PFOA)	19.6	1.6	ng/L	19.49	1.53	92.9	70-150	9.29	25	

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B403737 - EPA 1633										
Matrix Spike Dup (B403737-MSD1)										
Source: 25D1372-08										
Prepared: 04/28/25 Analyzed: 04/30/25										
Perfluorononanoic acid (PFNA)	18.9	1.6	ng/L	19.49	0.691	93.7	70-150	6.99	25	
Perfluorodecanoic acid (PFDA)	19.3	1.6	ng/L	19.49	ND	98.8	70-140	6.20	25	
Perfluoroundecanoic acid (PFUnA)	19.6	1.6	ng/L	19.49	ND	100	70-145	15.7	25	
Perfluorododecanoic acid (PFDoA)	20.7	1.6	ng/L	19.49	ND	106	70-140	1.13	25	
Perfluorotridecanoic acid (PFTTrDA)	18.9	1.6	ng/L	19.49	ND	97.2	65-140	4.26	25	
Perfluorotetradecanoic acid (PFTeDA)	20.8	1.6	ng/L	19.49	ND	107	60-140	6.94	25	
Perfluorobutanesulfonic acid (PFBS)	18.3	1.6	ng/L	17.30	0.925	101	60-145	0.808	25	
Perfluoropentanesulfonic acid (PFPeS)	17.3	1.6	ng/L	18.32	0.849	89.6	65-140	7.59	25	
Perfluorohexanesulfonic acid (PFHxS)	27.3	1.6	ng/L	17.77	8.79	104	65-145	2.09	25	
Perfluoroheptanesulfonic acid (PFHpS)	19.4	1.6	ng/L	18.55	ND	105	70-150	12.9	25	
Perfluorooctanesulfonic acid (PFOS)	34.4	1.6	ng/L	18.08	16.3	100	55-150	0.667	25	
Perfluorononanesulfonic acid (PFNS)	16.6	1.6	ng/L	18.71	ND	88.5	65-145	11.6	25	
Perfluorodecanesulfonic acid (PFDS)	15.2	1.6	ng/L	18.79	ND	81.2	60-145	6.64	25	
Perfluorododecanesulfonic acid (PFDoS)	11.4	1.6	ng/L	18.86	ND	60.2	50-145	7.23	25	
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	79.1	6.2	ng/L	73.04	ND	108	70-145	3.69	25	
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	77.7	6.2	ng/L	74.13	ND	105	65-155	11.4	25	
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	80.2	6.2	ng/L	74.83	ND	107	60-150	9.29	25	
Perfluorooctanesulfonamide (PFOSA)	19.7	1.6	ng/L	19.49	ND	101	70-145	3.45	25	
N-methyl perfluorooctanesulfonamide (NMeFOSA)	19.8	1.6	ng/L	19.49	ND	102	60-150	9.40	25	
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	18.2	1.6	ng/L	19.49	ND	93.6	65-145	10.7	25	
N-MeFOSAA (NMeFOSAA)	20.1	1.6	ng/L	19.49	ND	103	50-140	5.67	25	
N-EtFOSAA (NEtFOSAA)	18.1	1.6	ng/L	19.49	ND	92.7	70-145	10.5	25	
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	194	16	ng/L	194.9	ND	99.4	70-145	8.05	25	
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	196	16	ng/L	194.9	ND	101	70-135	8.05	25	
Hexafluoropropylene oxide dimer acid (HFPO-DA)	81.1	6.2	ng/L	77.95	ND	104	70-140	1.37	25	
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	79.4	6.2	ng/L	73.66	ND	108	65-145	9.61	25	
9Cl-PF3ONS (F53B Minor)	66.0	6.2	ng/L	72.72	ND	90.8	70-155	9.08	25	
11Cl-PF3OUDS (F53B Major)	61.2	6.2	ng/L	72.49	ND	84.4	55-160	2.14	25	
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	88.0	7.8	ng/L	97.43	ND	90.3	65-130	0.539	25	
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	465	39	ng/L	487.2	ND	95.5	70-135	6.70	25	
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	467	39	ng/L	487.2	ND	95.8	50-145	4.91	25	
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	36.0	3.1	ng/L	34.76	ND	104	70-140	7.82	25	
Perfluoro-3-methoxypropanoic acid (PFMPA)	43.2	3.1	ng/L	38.97	ND	111	55-140	13.2	25	
Perfluoro-4-methoxybutanoic acid (PFMBA)	39.5	3.1	ng/L	38.97	ND	101	60-150	6.64	25	
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	38.9	3.1	ng/L	38.97	ND	99.7	50-150	6.14	25	
Surrogate: 13C4-PFBA	54.6		ng/L	77.95		70.1	5-130			
Surrogate: 13C5-PFPeA	30.7		ng/L	38.97		78.8	40-130			
Surrogate: 13C5-PFHxA	15.9		ng/L	19.49		81.4	40-130			
Surrogate: 13C4-PFHpA	16.7		ng/L	19.49		85.7	40-130			
Surrogate: 13C8-PFOA	15.4		ng/L	19.49		78.9	40-130			
Surrogate: 13C9-PFNA	7.80		ng/L	9.743		80.0	40-130			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403737 - EPA 1633
Matrix Spike Dup (B403737-MSD1)
Source: 25D1372-08

Prepared: 04/28/25 Analyzed: 04/30/25

Surrogate: 13C6-PFDA	7.55		ng/L	9.743		77.5	40-130			
Surrogate: 13C7-PFUnA	7.24		ng/L	9.743		74.3	30-130			
Surrogate: 13C2-PFDoA	5.96		ng/L	9.743		61.2	10-130			
Surrogate: 13C2-PFTeDA	4.53		ng/L	9.743		46.5	10-130			
Surrogate: 13C3-PFBS	14.1		ng/L	19.49		72.3	40-135			
Surrogate: 13C3-PFHxS	15.1		ng/L	19.49		77.5	40-130			
Surrogate: 13C8-PFOS	14.7		ng/L	19.49		75.5	40-130			
Surrogate: 13C2-4:2FTS	33.9		ng/L	38.97		87.0	40-200			
Surrogate: 13C2-6:2FTS	32.9		ng/L	38.97		84.4	40-200			
Surrogate: 13C2-8:2FTS	35.0		ng/L	38.97		89.8	40-300			
Surrogate: 13C8-PFOSA	12.9		ng/L	19.49		66.1	40-130			
Surrogate: D3-NMeFOSA	9.92		ng/L	19.49		50.9	10-130			
Surrogate: D5-NEtFOSA	9.56		ng/L	19.49		49.0	10-130			
Surrogate: D3-NMeFOSAA	25.1		ng/L	38.97		64.5	40-170			
Surrogate: D5-NEtFOSAA	32.4		ng/L	38.97		83.2	25-135			
Surrogate: D7-NMeFOSE	101		ng/L	194.9		51.8	10-130			
Surrogate: D9-NEtFOSE	91.3		ng/L	194.9		46.9	10-130			
Surrogate: 13C3-HFPO-DA	62.0		ng/L	77.95		79.5	40-130			

Batch B404148 - EPA 1633
Blank (B404148-BLK1)

Prepared: 05/01/25 Analyzed: 05/03/25

Perfluorobutanoic acid (PFBA)	ND	0.80	µg/kg wet
Perfluoropentanoic acid (PFPeA)	ND	0.40	µg/kg wet
Perfluorohexanoic acid (PFHxA)	ND	0.20	µg/kg wet
Perfluoroheptanoic acid (PFHpA)	ND	0.20	µg/kg wet
Perfluorooctanoic acid (PFOA)	ND	0.20	µg/kg wet
Perfluorononanoic acid (PFNA)	ND	0.20	µg/kg wet
Perfluorodecanoic acid (PFDA)	ND	0.20	µg/kg wet
Perfluoroundecanoic acid (PFUnA)	ND	0.20	µg/kg wet
Perfluorododecanoic acid (PFDoA)	ND	0.20	µg/kg wet
Perfluorotridecanoic acid (PFTTrDA)	ND	0.20	µg/kg wet
Perfluorotetradecanoic acid (PFTeDA)	ND	0.20	µg/kg wet
Perfluorobutanesulfonic acid (PFBS)	ND	0.20	µg/kg wet
Perfluoropentanesulfonic acid (PFPeS)	ND	0.20	µg/kg wet
Perfluorohexanesulfonic acid (PFHxS)	ND	0.20	µg/kg wet
Perfluoroheptanesulfonic acid (PFHpS)	ND	0.20	µg/kg wet
Perfluorooctanesulfonic acid (PFOS)	ND	0.20	µg/kg wet
Perfluorononanesulfonic acid (PFNS)	ND	0.20	µg/kg wet
Perfluorodecanesulfonic acid (PFDS)	ND	0.20	µg/kg wet
Perfluorododecanesulfonic acid (PFDoS)	ND	0.20	µg/kg wet
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	0.80	µg/kg wet
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	0.80	µg/kg wet
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	0.80	µg/kg wet
Perfluorooctanesulfonamide (PFOSA)	ND	0.20	µg/kg wet
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	0.20	µg/kg wet
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	0.20	µg/kg wet
N-MeFOSAA (NMeFOSAA)	ND	0.20	µg/kg wet
N-EtFOSAA (NEtFOSAA)	ND	0.20	µg/kg wet

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B404148 - EPA 1633										
Blank (B404148-BLK1)				Prepared: 05/01/25 Analyzed: 05/03/25						
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	2.0	µg/kg wet							
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	2.0	µg/kg wet							
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	0.80	µg/kg wet							
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	0.80	µg/kg wet							
9Cl-PF3ONS (F53B Minor)	ND	0.80	µg/kg wet							
11Cl-PF3OUdS (F53B Major)	ND	0.80	µg/kg wet							
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	1.0	µg/kg wet							L-03
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA) (5:3FTCA)	ND	5.0	µg/kg wet							
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	ND	5.0	µg/kg wet							
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	ND	0.40	µg/kg wet							
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	0.40	µg/kg wet							
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	0.40	µg/kg wet							
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	0.40	µg/kg wet							
Surrogate: 13C4-PFBA	5.76		µg/kg wet	7.995		72.0	8-130			
Surrogate: 13C5-PFPeA	3.70		µg/kg wet	3.998		92.6	35-130			
Surrogate: 13C5-PFHxA	1.88		µg/kg wet	1.999		94.0	40-130			
Surrogate: 13C4-PFHpA	1.84		µg/kg wet	1.999		92.0	40-130			
Surrogate: 13C8-PFOA	1.99		µg/kg wet	1.999		99.4	40-130			
Surrogate: 13C9-PFNA	0.880		µg/kg wet	0.9994		88.1	40-130			
Surrogate: 13C6-PFDA	0.991		µg/kg wet	0.9994		99.2	40-130			
Surrogate: 13C7-PFUnA	0.877		µg/kg wet	0.9994		87.8	40-130			
Surrogate: 13C2-PFDoA	0.922		µg/kg wet	0.9994		92.3	40-130			
Surrogate: 13C2-PFTeDA	0.855		µg/kg wet	0.9994		85.6	20-130			
Surrogate: 13C3-PFBS	1.89		µg/kg wet	1.999		94.7	40-135			
Surrogate: 13C3-PFHxS	1.95		µg/kg wet	1.999		97.7	40-130			
Surrogate: 13C8-PFOS	1.84		µg/kg wet	1.999		92.1	40-130			
Surrogate: 13C2-4:2FTS	4.27		µg/kg wet	3.998		107	40-165			
Surrogate: 13C2-6:2FTS	4.45		µg/kg wet	3.998		111	40-215			
Surrogate: 13C2-8:2FTS	4.43		µg/kg wet	3.998		111	40-275			
Surrogate: 13C8-PFOSA	1.62		µg/kg wet	1.999		81.1	40-130			
Surrogate: D3-NMeFOSA	1.63		µg/kg wet	1.999		81.8	10-130			
Surrogate: D5-NEtFOSA	1.50		µg/kg wet	1.999		74.9	10-130			
Surrogate: D3-NMeFOSAA	3.92		µg/kg wet	3.998		97.9	40-135			
Surrogate: D5-NEtFOSAA	3.69		µg/kg wet	3.998		92.2	40-150			
Surrogate: D7-NMeFOSE	16.9		µg/kg wet	19.99		84.7	20-130			
Surrogate: D9-NEtFOSE	16.9		µg/kg wet	19.99		84.4	15-130			
Surrogate: 13C3-HFPO-DA	7.67		µg/kg wet	7.995		95.9	40-130			
LCS (B404148-BS1)				Prepared: 05/01/25 Analyzed: 05/03/25						
Perfluorobutanoic acid (PFBA)	6.53	0.80	µg/kg wet	7.954		82.1	70-140			
Perfluoropentanoic acid (PFPeA)	3.48	0.40	µg/kg wet	3.977		87.4	60-150			
Perfluorohexanoic acid (PFHxA)	1.71	0.20	µg/kg wet	1.988		86.1	65-140			
Perfluoroheptanoic acid (PFHpA)	1.71	0.20	µg/kg wet	1.988		86.1	65-145			
Perfluorooctanoic acid (PFOA)	1.72	0.20	µg/kg wet	1.988		86.4	70-150			
Perfluorononanoic acid (PFNA)	1.75	0.20	µg/kg wet	1.988		88.1	70-155			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B404148 - EPA 1633										
LCS (B404148-BS1)										
				Prepared: 05/01/25 Analyzed: 05/03/25						
Perfluorodecanoic acid (PFDA)	1.85	0.20	µg/kg wet	1.988		93.3	70-155			
Perfluoroundecanoic acid (PFUnA)	1.80	0.20	µg/kg wet	1.988		90.5	70-155			
Perfluorododecanoic acid (PFDoA)	1.80	0.20	µg/kg wet	1.988		90.7	70-150			
Perfluorotridecanoic acid (PFTrDA)	1.74	0.20	µg/kg wet	1.988		87.7	65-150			
Perfluorotetradecanoic acid (PFTeDA)	1.70	0.20	µg/kg wet	1.988		85.5	65-150			
Perfluorobutanesulfonic acid (PFBS)	1.52	0.20	µg/kg wet	1.766		86.0	65-145			
Perfluoropentanesulfonic acid (PFPeS)	1.65	0.20	µg/kg wet	1.869		88.1	55-160			
Perfluorohexanesulfonic acid (PFHxS)	1.57	0.20	µg/kg wet	1.813		86.6	60-150			
Perfluoroheptanesulfonic acid (PFHpS)	1.71	0.20	µg/kg wet	1.893		90.5	65-155			
Perfluorooctanesulfonic acid (PFOS)	1.55	0.20	µg/kg wet	1.845		84.2	65-160			
Perfluorononanesulfonic acid (PFNS)	1.69	0.20	µg/kg wet	1.909		88.4	55-140			
Perfluorodecanesulfonic acid (PFDS)	1.60	0.20	µg/kg wet	1.917		83.7	40-155			
Perfluorododecanesulfonic acid (PFDoS)	1.65	0.20	µg/kg wet	1.925		85.5	25-160			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	6.91	0.80	µg/kg wet	7.453		92.7	60-150			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	7.39	0.80	µg/kg wet	7.564		97.7	55-200			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	7.14	0.80	µg/kg wet	7.636		93.5	70-150			
Perfluorooctanesulfonamide (PFOSA)	1.64	0.20	µg/kg wet	1.988		82.5	70-140			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	1.59	0.20	µg/kg wet	1.988		79.7	70-155			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	1.63	0.20	µg/kg wet	1.988		82.0	70-140			
N-MeFOSAA (NMeFOSAA)	1.64	0.20	µg/kg wet	1.988		82.4	65-155			
N-EtFOSAA (NEtFOSAA)	1.64	0.20	µg/kg wet	1.988		82.6	65-165			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	17.3	2.0	µg/kg wet	19.88		87.1	70-140			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	18.0	2.0	µg/kg wet	19.88		90.8	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	7.35	0.80	µg/kg wet	7.954		92.3	70-145			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	6.57	0.80	µg/kg wet	7.516		87.5	70-160			
9CI-PF3ONS (F53B Minor)	6.41	0.80	µg/kg wet	7.421		86.4	70-150			
11CI-PF3OUdS (F53B Major)	6.80	0.80	µg/kg wet	7.397		92.0	45-160			
3-Perfluoropropyl propanoic acid (FPPrPA)(3:3FTCA)	3.53	0.99	µg/kg wet	9.942		35.5	* 45-130			L-03
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	39.5	5.0	µg/kg wet	49.71		79.4	60-130			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	38.1	5.0	µg/kg wet	49.71		76.7	60-150			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEA)	3.03	0.40	µg/kg wet	3.547		85.5	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	3.48	0.40	µg/kg wet	3.977		87.5	30-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	3.57	0.40	µg/kg wet	3.977		89.8	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	3.60	0.40	µg/kg wet	3.977		90.5	60-155			
Surrogate: 13C4-PFBA	6.56		µg/kg wet	7.954		82.5	8-130			
Surrogate: 13C5-PFPeA	4.17		µg/kg wet	3.977		105	35-130			
Surrogate: 13C5-PFHxA	2.12		µg/kg wet	1.988		107	40-130			
Surrogate: 13C4-PFHpA	2.11		µg/kg wet	1.988		106	40-130			
Surrogate: 13C8-PFOA	2.12		µg/kg wet	1.988		107	40-130			
Surrogate: 13C9-PFNA	1.04		µg/kg wet	0.9942		105	40-130			
Surrogate: 13C6-PFDA	1.01		µg/kg wet	0.9942		101	40-130			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B404148 - EPA 1633
LCS (B404148-BS1)

Prepared: 05/01/25 Analyzed: 05/03/25

Surrogate: 13C7-PFUnA	1.01		µg/kg wet	0.9942		101	40-130			
Surrogate: 13C2-PFDoA	0.991		µg/kg wet	0.9942		99.7	40-130			
Surrogate: 13C2-PFTeDA	0.995		µg/kg wet	0.9942		100	20-130			
Surrogate: 13C3-PFBS	2.11		µg/kg wet	1.988		106	40-135			
Surrogate: 13C3-PFHxS	2.03		µg/kg wet	1.988		102	40-130			
Surrogate: 13C8-PFOS	2.07		µg/kg wet	1.988		104	40-130			
Surrogate: 13C2-4:2FTS	4.49		µg/kg wet	3.977		113	40-165			
Surrogate: 13C2-6:2FTS	4.48		µg/kg wet	3.977		113	40-215			
Surrogate: 13C2-8:2FTS	4.50		µg/kg wet	3.977		113	40-275			
Surrogate: 13C8-PFOA	1.97		µg/kg wet	1.988		99.0	40-130			
Surrogate: D3-NMeFOA	1.90		µg/kg wet	1.988		95.7	10-130			
Surrogate: D5-NEtFOA	1.84		µg/kg wet	1.988		92.6	10-130			
Surrogate: D3-NMeFOSAA	4.32		µg/kg wet	3.977		109	40-135			
Surrogate: D5-NEtFOSAA	4.29		µg/kg wet	3.977		108	40-150			
Surrogate: D7-NMeFOSE	19.4		µg/kg wet	19.88		97.5	20-130			
Surrogate: D9-NEtFOSE	19.0		µg/kg wet	19.88		95.6	15-130			
Surrogate: 13C3-HFPO-DA	8.55		µg/kg wet	7.954		108	40-130			

MRL Check (B404148-MRL1)

Prepared: 05/01/25 Analyzed: 05/03/25

Perfluorobutanoic acid (PFBA)	1.33	0.80	µg/kg wet	1.596		83.5	70-140			
Perfluoropentanoic acid (PFPeA)	0.710	0.40	µg/kg wet	0.7982		89.0	60-150			
Perfluorohexanoic acid (PFHxA)	0.345	0.20	µg/kg wet	0.3991		86.5	65-140			
Perfluoroheptanoic acid (PFHpA)	0.339	0.20	µg/kg wet	0.3991		85.0	65-145			
Perfluorooctanoic acid (PFOA)	0.341	0.20	µg/kg wet	0.3991		85.5	70-150			
Perfluorononanoic acid (PFNA)	0.318	0.20	µg/kg wet	0.3991		79.6	70-155			
Perfluorodecanoic acid (PFDA)	0.337	0.20	µg/kg wet	0.3991		84.5	70-155			
Perfluoroundecanoic acid (PFUnA)	0.308	0.20	µg/kg wet	0.3991		77.3	70-155			
Perfluorododecanoic acid (PFDoA)	0.341	0.20	µg/kg wet	0.3991		85.4	70-150			
Perfluorotridecanoic acid (PFTTrDA)	0.338	0.20	µg/kg wet	0.3991		84.6	65-150			
Perfluorotetradecanoic acid (PFTeDA)	0.316	0.20	µg/kg wet	0.3991		79.3	65-150			
Perfluorobutanesulfonic acid (PFBS)	0.298	0.20	µg/kg wet	0.3544		84.0	65-145			
Perfluoropentanesulfonic acid (PFPeS)	0.302	0.20	µg/kg wet	0.3752		80.4	55-160			
Perfluorohexanesulfonic acid (PFHxS)	0.330	0.20	µg/kg wet	0.3640		90.6	60-150			
Perfluoroheptanesulfonic acid (PFHpS)	0.307	0.20	µg/kg wet	0.3800		80.7	65-155			
Perfluorooctanesulfonic acid (PFOS)	0.298	0.20	µg/kg wet	0.3704		80.4	65-160			
Perfluorononanesulfonic acid (PFNS)	0.309	0.20	µg/kg wet	0.3832		80.6	55-140			
Perfluorodecanesulfonic acid (PFDS)	0.300	0.20	µg/kg wet	0.3848		78.1	40-155			
Perfluorodecanesulfonic acid (PFDoS)	0.308	0.20	µg/kg wet	0.3864		79.6	25-160			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	1.33	0.80	µg/kg wet	1.496		89.0	60-150			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	1.41	0.80	µg/kg wet	1.518		93.1	55-200			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	1.44	0.80	µg/kg wet	1.533		93.9	70-150			
Perfluorooctanesulfonamide (PFOSA)	0.340	0.20	µg/kg wet	0.3991		85.1	70-140			
N-methyl perfluorooctanesulfonamide (NMeFOA)	0.342	0.20	µg/kg wet	0.3991		85.8	70-155			
N-ethyl perfluorooctanesulfonamide (NEtFOA)	0.350	0.20	µg/kg wet	0.3991		87.6	70-140			
N-MeFOSAA (NMeFOSAA)	0.271	0.20	µg/kg wet	0.3991		67.9	65-155			
N-EtFOSAA (NEtFOSAA)	0.353	0.20	µg/kg wet	0.3991		88.5	65-165			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	3.33	2.0	µg/kg wet	3.991		83.4	70-140			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	3.41	2.0	µg/kg wet	3.991		85.4	70-135			

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B404148 - EPA 1633

MRL Check (B404148-MRL1)

Prepared: 05/01/25 Analyzed: 05/03/25

Hexafluoropropylene oxide dimer acid (HFPO-DA)	1.27	0.80	µg/kg wet	1.596		79.8	70-145			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	1.39	0.80	µg/kg wet	1.509		92.3	70-160			
9Cl-PF3ONS (F53B Minor)	1.29	0.80	µg/kg wet	1.490		86.5	70-150			
11Cl-PF3OUdS (F53B Major)	1.34	0.80	µg/kg wet	1.491		89.6	45-160			
3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTCA)	0.733	1.0	µg/kg wet	1.996		36.7	* 45-130			L-03, J
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	7.88	5.0	µg/kg wet	9.978		79.0	60-130			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	7.91	5.0	µg/kg wet	9.978		79.3	60-150			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	0.651	0.40	µg/kg wet	0.7120		91.4	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	0.705	0.40	µg/kg wet	0.7982		88.4	30-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	0.713	0.40	µg/kg wet	0.7982		89.3	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	0.739	0.40	µg/kg wet	0.7982		92.6	60-155			
Surrogate: 13C4-PFBA	6.56		µg/kg wet	7.982		82.2	8-130			
Surrogate: 13C5-PFPeA	4.34		µg/kg wet	3.991		109	35-130			
Surrogate: 13C5-PFHxA	2.16		µg/kg wet	1.996		108	40-130			
Surrogate: 13C4-PFHpA	2.13		µg/kg wet	1.996		107	40-130			
Surrogate: 13C8-PFOA	2.20		µg/kg wet	1.996		110	40-130			
Surrogate: 13C9-PFNA	1.04		µg/kg wet	0.9978		104	40-130			
Surrogate: 13C6-PFDA	1.12		µg/kg wet	0.9978		112	40-130			
Surrogate: 13C7-PFUnA	1.12		µg/kg wet	0.9978		112	40-130			
Surrogate: 13C2-PFDoA	1.08		µg/kg wet	0.9978		108	40-130			
Surrogate: 13C2-PFTeDA	1.06		µg/kg wet	0.9978		106	20-130			
Surrogate: 13C3-PFBS	2.22		µg/kg wet	1.996		111	40-135			
Surrogate: 13C3-PFHxS	2.14		µg/kg wet	1.996		107	40-130			
Surrogate: 13C8-PFOS	2.18		µg/kg wet	1.996		109	40-130			
Surrogate: 13C2-4:2FTS	4.97		µg/kg wet	3.991		124	40-165			
Surrogate: 13C2-6:2FTS	4.78		µg/kg wet	3.991		120	40-215			
Surrogate: 13C2-8:2FTS	5.04		µg/kg wet	3.991		126	40-275			
Surrogate: 13C8-PFOSA	1.92		µg/kg wet	1.996		96.4	40-130			
Surrogate: D3-NMeFOSA	1.86		µg/kg wet	1.996		93.0	10-130			
Surrogate: D5-NEtFOSA	1.87		µg/kg wet	1.996		93.6	10-130			
Surrogate: D3-NMeFOSAA	4.63		µg/kg wet	3.991		116	40-135			
Surrogate: D5-NEtFOSAA	4.33		µg/kg wet	3.991		109	40-150			
Surrogate: D7-NMeFOSE	20.0		µg/kg wet	19.96		100	20-130			
Surrogate: D9-NEtFOSE	19.9		µg/kg wet	19.96		99.6	15-130			
Surrogate: 13C3-HFPO-DA	9.50		µg/kg wet	7.982		119	40-130			

Matrix Spike (B404148-MS1)

Source: 25D1372-02

Prepared: 05/01/25 Analyzed: 05/03/25

Perfluorobutanoic acid (PFBA)	6.49	0.79	µg/kg dry	7.929	ND	81.9	70-140			
Perfluoropentanoic acid (PFPeA)	3.58	0.40	µg/kg dry	3.965	ND	90.4	60-150			
Perfluorohexanoic acid (PFHxA)	1.85	0.20	µg/kg dry	1.982	0.0839	89.0	65-140			
Perfluoroheptanoic acid (PFHpA)	1.75	0.20	µg/kg dry	1.982	0.0900	83.6	65-145			
Perfluorooctanoic acid (PFOA)	1.76	0.20	µg/kg dry	1.982	0.167	80.4	70-150			
Perfluorononanoic acid (PFNA)	1.73	0.20	µg/kg dry	1.982	ND	87.1	70-155			
Perfluorodecanoic acid (PFDA)	1.79	0.20	µg/kg dry	1.982	ND	90.2	70-155			
Perfluoroundecanoic acid (PFUnA)	1.74	0.20	µg/kg dry	1.982	ND	87.6	70-155			
Perfluorododecanoic acid (PFDoA)	1.68	0.20	µg/kg dry	1.982	ND	84.5	70-150			
Perfluorotridecanoic acid (PFTTrDA)	1.71	0.20	µg/kg dry	1.982	ND	86.1	65-150			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B404148 - EPA 1633										
Matrix Spike (B404148-MS1)	Source: 25D1372-02			Prepared: 05/01/25 Analyzed: 05/03/25						
Perfluorotetradecanoic acid (PFTeDA)	1.70	0.20	µg/kg dry	1.982	ND	85.6	65-150			
Perfluorobutanesulfonic acid (PFBS)	1.50	0.20	µg/kg dry	1.760	ND	85.0	65-145			
Perfluoropentanesulfonic acid (PFPeS)	1.63	0.20	µg/kg dry	1.863	ND	87.7	55-160			
Perfluorohexanesulfonic acid (PFHxS)	1.55	0.20	µg/kg dry	1.808	ND	85.7	60-150			
Perfluoroheptanesulfonic acid (PFHpS)	1.63	0.20	µg/kg dry	1.887	ND	86.5	65-155			
Perfluorooctanesulfonic acid (PFOS)	1.58	0.20	µg/kg dry	1.840	0.0942	80.9	65-160			
Perfluorononanesulfonic acid (PFNS)	1.58	0.20	µg/kg dry	1.903	ND	83.0	55-140			
Perfluorodecanesulfonic acid (PFDS)	1.66	0.20	µg/kg dry	1.911	ND	87.0	40-155			
Perfluorododecanesulfonic acid (PFDoS)	1.61	0.20	µg/kg dry	1.919	ND	84.1	25-160			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	7.09	0.79	µg/kg dry	7.430	ND	95.5	60-150			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	7.20	0.79	µg/kg dry	7.541	ND	95.4	55-200			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	7.23	0.79	µg/kg dry	7.612	ND	95.0	70-150			
Perfluorooctanesulfonamide (PFOSA)	1.62	0.20	µg/kg dry	1.982	ND	81.6	70-140			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	1.75	0.20	µg/kg dry	1.982	ND	88.1	70-155			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	1.77	0.20	µg/kg dry	1.982	ND	89.3	70-140			
N-MeFOSAA (NMeFOSAA)	1.54	0.20	µg/kg dry	1.982	ND	77.6	65-155			
N-EtFOSAA (NEtFOSAA)	1.66	0.20	µg/kg dry	1.982	ND	84.0	65-165			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	17.4	2.0	µg/kg dry	19.82	ND	87.8	70-140			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	17.6	2.0	µg/kg dry	19.82	ND	88.7	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	7.02	0.79	µg/kg dry	7.929	ND	88.5	70-145			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	6.51	0.79	µg/kg dry	7.493	ND	86.9	70-160			
9Cl-PF3ONS (F53B Minor)	6.21	0.79	µg/kg dry	7.398	ND	83.9	70-150			
11Cl-PF3OUdS (F53B Major)	6.61	0.79	µg/kg dry	7.374	ND	89.6	45-160			
3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTCA)	3.25	0.99	µg/kg dry	9.911	ND	32.8 *	45-130			L-03, MS-07A
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	38.0	5.0	µg/kg dry	49.56	ND	76.6	60-130			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	39.4	5.0	µg/kg dry	49.56	ND	79.4	60-150			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	3.04	0.40	µg/kg dry	3.536	ND	86.0	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	3.53	0.40	µg/kg dry	3.965	ND	88.9	30-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	3.49	0.40	µg/kg dry	3.965	ND	88.0	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	3.42	0.40	µg/kg dry	3.965	ND	86.3	60-155			
Surrogate: 13C4-PFBA	7.57		µg/kg dry	7.929		95.5	8-130			
Surrogate: 13C5-PFPeA	4.50		µg/kg dry	3.965		114	35-130			
Surrogate: 13C5-PFHxA	2.22		µg/kg dry	1.982		112	40-130			
Surrogate: 13C4-PFHpA	2.19		µg/kg dry	1.982		111	40-130			
Surrogate: 13C8-PFOA	2.48		µg/kg dry	1.982		125	40-130			
Surrogate: 13C9-PFNA	1.11		µg/kg dry	0.9911		112	40-130			
Surrogate: 13C6-PFDA	1.16		µg/kg dry	0.9911		117	40-130			
Surrogate: 13C7-PFUnA	1.18		µg/kg dry	0.9911		119	40-130			
Surrogate: 13C2-PFDoA	1.15		µg/kg dry	0.9911		116	40-130			
Surrogate: 13C2-PFTeDA	1.17		µg/kg dry	0.9911		118	20-130			
Surrogate: 13C3-PFBS	2.29		µg/kg dry	1.982		115	40-135			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B404148 - EPA 1633
Matrix Spike (B404148-MS1)
Source: 25D1372-02

Prepared: 05/01/25 Analyzed: 05/03/25

Surrogate: 13C3-PFHxS	2.22		µg/kg dry	1.982		112	40-130			
Surrogate: 13C8-PFOS	2.21		µg/kg dry	1.982		112	40-130			
Surrogate: 13C2-4:2FTS	4.48		µg/kg dry	3.965		113	40-165			
Surrogate: 13C2-6:2FTS	4.44		µg/kg dry	3.965		112	40-215			
Surrogate: 13C2-8:2FTS	4.50		µg/kg dry	3.965		113	40-275			
Surrogate: 13C8-PFOSA	2.11		µg/kg dry	1.982		106	40-130			
Surrogate: D3-NMeFOSA	1.98		µg/kg dry	1.982		99.9	10-130			
Surrogate: D5-NEtFOSA	1.94		µg/kg dry	1.982		98.0	10-130			
Surrogate: D3-NMeFOSAA	4.63		µg/kg dry	3.965		117	40-135			
Surrogate: D5-NEtFOSAA	4.43		µg/kg dry	3.965		112	40-150			
Surrogate: D7-NMeFOSE	20.6		µg/kg dry	19.82		104	20-130			
Surrogate: D9-NEtFOSE	20.6		µg/kg dry	19.82		104	15-130			
Surrogate: 13C3-HFPO-DA	9.13		µg/kg dry	7.929		115	40-130			

Matrix Spike Dup (B404148-MSD1)
Source: 25D1372-02

Prepared: 05/01/25 Analyzed: 05/03/25

Perfluorobutanoic acid (PFBA)	6.79	0.80	µg/kg dry	7.986	ND	85.1	70-140	4.55	25	
Perfluoropentanoic acid (PFPeA)	3.77	0.40	µg/kg dry	3.993	ND	94.5	60-150	5.17	25	
Perfluorohexanoic acid (PFHxA)	1.91	0.20	µg/kg dry	1.996	0.0839	91.6	65-140	3.42	25	
Perfluoroheptanoic acid (PFHpA)	1.88	0.20	µg/kg dry	1.996	0.0900	89.6	65-145	7.26	25	
Perfluorooctanoic acid (PFOA)	1.88	0.20	µg/kg dry	1.996	0.167	85.7	70-150	6.47	25	
Perfluorononanoic acid (PFNA)	1.85	0.20	µg/kg dry	1.996	ND	92.6	70-155	6.86	25	
Perfluorodecanoic acid (PFDA)	1.82	0.20	µg/kg dry	1.996	ND	91.0	70-155	1.59	25	
Perfluoroundecanoic acid (PFUnA)	1.77	0.20	µg/kg dry	1.996	ND	88.9	70-155	2.15	25	
Perfluorododecanoic acid (PFDoA)	1.80	0.20	µg/kg dry	1.996	ND	90.2	70-150	7.15	25	
Perfluorotridecanoic acid (PFTTrDA)	1.78	0.20	µg/kg dry	1.996	ND	89.3	65-150	4.30	25	
Perfluorotetradecanoic acid (PFTeDA)	1.82	0.20	µg/kg dry	1.996	ND	91.3	65-150	7.21	25	
Perfluorobutanesulfonic acid (PFBS)	1.66	0.20	µg/kg dry	1.773	ND	93.9	65-145	10.6	25	
Perfluoropentanesulfonic acid (PFPeS)	1.64	0.20	µg/kg dry	1.877	ND	87.4	55-160	0.408	25	
Perfluorohexanesulfonic acid (PFHxS)	1.60	0.20	µg/kg dry	1.821	ND	88.0	60-150	3.43	25	
Perfluoroheptanesulfonic acid (PFHpS)	1.71	0.20	µg/kg dry	1.901	ND	89.8	65-155	4.47	25	
Perfluorooctanesulfonic acid (PFOS)	1.71	0.20	µg/kg dry	1.853	0.0942	87.0	65-160	7.53	25	
Perfluorononanesulfonic acid (PFNS)	1.65	0.20	µg/kg dry	1.917	ND	86.0	55-140	4.18	25	
Perfluorodecanesulfonic acid (PFDS)	1.71	0.20	µg/kg dry	1.925	ND	88.6	40-155	2.49	25	
Perfluorododecanesulfonic acid (PFDoS)	1.62	0.20	µg/kg dry	1.932	ND	83.8	25-160	0.321	25	
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	7.40	0.80	µg/kg dry	7.482	ND	98.8	60-150	4.19	25	
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	7.37	0.80	µg/kg dry	7.594	ND	97.0	55-200	2.36	25	
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	7.58	0.80	µg/kg dry	7.666	ND	98.9	70-150	4.71	25	
Perfluorooctanesulfonamide (PFOSA)	1.76	0.20	µg/kg dry	1.996	ND	87.9	70-140	8.17	25	
N-methyl perfluorooctanesulfonamide (NMeFOSA)	1.71	0.20	µg/kg dry	1.996	ND	85.4	70-155	2.35	25	
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	1.77	0.20	µg/kg dry	1.996	ND	88.6	70-140	0.0499	25	
N-MeFOSAA (NMeFOSAA)	1.60	0.20	µg/kg dry	1.996	ND	80.2	65-155	3.95	25	
N-EtFOSAA (NEtFOSAA)	1.75	0.20	µg/kg dry	1.996	ND	87.8	65-165	5.18	25	
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	17.8	2.0	µg/kg dry	19.96	ND	89.2	70-140	2.31	25	
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	18.3	2.0	µg/kg dry	19.96	ND	91.7	70-135	4.03	25	
Hexafluoropropylene oxide dimer acid (HFPO-DA)	7.40	0.80	µg/kg dry	7.986	ND	92.6	70-145	5.28	25	
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	6.92	0.80	µg/kg dry	7.546	ND	91.7	70-160	6.10	25	

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B404148 - EPA 1633										
Matrix Spike Dup (B404148-MSD1)		Source: 25D1372-02		Prepared: 05/01/25 Analyzed: 05/03/25						
9Cl-PF3ONS (F53B Minor)	6.60	0.80	µg/kg dry	7.450	ND	88.6	70-150	6.19	25	
11Cl-PF3OUdS (F53B Major)	7.20	0.80	µg/kg dry	7.427	ND	97.0	45-160	8.65	25	
3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTCA)	3.11	1.0	µg/kg dry	9.982	ND	31.2 *	45-130	4.26	25	L-03, MS-07A
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	36.1	5.0	µg/kg dry	49.91	ND	72.2	60-130	5.18	25	
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	38.1	5.0	µg/kg dry	49.91	ND	76.3	60-150	3.32	25	
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	3.20	0.40	µg/kg dry	3.562	ND	89.9	70-140	5.09	25	
Perfluoro-3-methoxypropanoic acid (PFMPA)	3.58	0.40	µg/kg dry	3.993	ND	89.6	30-140	1.49	25	
Perfluoro-4-methoxybutanoic acid (PFMBA)	3.68	0.40	µg/kg dry	3.993	ND	92.1	60-150	5.25	25	
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	3.62	0.40	µg/kg dry	3.993	ND	90.6	60-155	5.58	25	
Surrogate: 13C4-PFBA	7.61		µg/kg dry	7.986		95.3	8-130			
Surrogate: 13C5-PFPeA	4.37		µg/kg dry	3.993		109	35-130			
Surrogate: 13C5-PFHxA	2.17		µg/kg dry	1.996		109	40-130			
Surrogate: 13C4-PFHpA	2.14		µg/kg dry	1.996		107	40-130			
Surrogate: 13C8-PFOA	2.40		µg/kg dry	1.996		120	40-130			
Surrogate: 13C9-PFNA	1.11		µg/kg dry	0.9982		111	40-130			
Surrogate: 13C6-PFDA	1.15		µg/kg dry	0.9982		115	40-130			
Surrogate: 13C7-PFUnA	1.20		µg/kg dry	0.9982		120	40-130			
Surrogate: 13C2-PFDoA	1.13		µg/kg dry	0.9982		114	40-130			
Surrogate: 13C2-PFTeDA	1.10		µg/kg dry	0.9982		111	20-130			
Surrogate: 13C3-PFBS	2.20		µg/kg dry	1.996		110	40-135			
Surrogate: 13C3-PFHxS	2.24		µg/kg dry	1.996		112	40-130			
Surrogate: 13C8-PFOS	2.19		µg/kg dry	1.996		109	40-130			
Surrogate: 13C2-4:2FTS	4.43		µg/kg dry	3.993		111	40-165			
Surrogate: 13C2-6:2FTS	4.49		µg/kg dry	3.993		112	40-215			
Surrogate: 13C2-8:2FTS	4.55		µg/kg dry	3.993		114	40-275			
Surrogate: 13C8-PFOSA	2.04		µg/kg dry	1.996		102	40-130			
Surrogate: D3-NMeFOSA	1.99		µg/kg dry	1.996		99.7	10-130			
Surrogate: D5-NEtFOSA	2.02		µg/kg dry	1.996		101	10-130			
Surrogate: D3-NMeFOSAA	4.63		µg/kg dry	3.993		116	40-135			
Surrogate: D5-NEtFOSAA	4.27		µg/kg dry	3.993		107	40-150			
Surrogate: D7-NMeFOSE	20.1		µg/kg dry	19.96		101	20-130			
Surrogate: D9-NEtFOSE	20.2		µg/kg dry	19.96		101	15-130			
Surrogate: 13C3-HFPO-DA	9.01		µg/kg dry	7.986		113	40-130			



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QUALITY CONTROL

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total) - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B403480 - % Solids

Duplicate (B403480-DUP1)

Source: 25D1372-02

Prepared & Analyzed: 04/21/25

% Solids	92.1		% Wt		91.3			0.894	10	
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FLAG/QUALIFIER SUMMARY

*	QC result is outside of established limits.
†	Wide recovery limits established for difficult compound.
‡	Wide RPD limits established for difficult compound.
#	Data exceeded client recommended or regulatory level
ND	Not Detected
RL	Reporting Limit is at the level of quantitation (LOQ)
DL	Detection Limit is the lower limit of detection determined by the MDL study
MCL	Maximum Contaminant Level
	Percent recoveries and relative percent differences (RPDs) are determined by the software using values in the calculation which have not been rounded.
	No results have been blank subtracted unless specified in the case narrative section.
J	Detected but below the Reporting Limit (lowest calibration standard); therefore, result is an estimated concentration (CLP J-Flag).
L-03	Laboratory fortified blank/laboratory control sample recovery is outside of control limits. Reported value for this compound is likely to be biased on the low side.
MS-07A	Matrix spike and spike duplicate recovery is outside of control limits. Analysis is in control based on laboratory fortified blank recovery. Possibility of matrix effects that lead to low bias or non-homogeneous sample aliquot cannot be eliminated.
PF-17	Extracted Internal Standard recovery is outside of control limits. Data is not significantly affected since associated analyte is not detected and bias is on the high side.
PF-22	Qualifier ion ratio >150% of associated calibration. Detection is suspect.
PF-23	Qualifier ion ratio <50% of associated calibration. Detection is suspect.

CERTIFICATIONS

Certified Analyses included in this Report

Analyte	Certifications
<i>Draft Method 1633 in Soil</i>	
Perfluorobutanoic acid (PFBA)	NY
Perfluoropentanoic acid (PFPeA)	NY
Perfluorohexanoic acid (PFHxA)	NY
Perfluoroheptanoic acid (PFHpA)	NY
Perfluorooctanoic acid (PFOA)	NY
Perfluorononanoic acid (PFNA)	NY
Perfluorodecanoic acid (PFDA)	NY
Perfluoroundecanoic acid (PFUnA)	NY
Perfluorododecanoic acid (PFDoA)	NY
Perfluorotridecanoic acid (PFTrDA)	NY
Perfluorooctanesulfonic acid (PFOS)	NY
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	NY
N-MeFOSAA (NMeFOSAA)	NY
<i>Draft Method 1633 in Water</i>	
Perfluorobutanoic acid (PFBA)	NY
Perfluoropentanoic acid (PFPeA)	NY
Perfluorohexanoic acid (PFHxA)	NY
Perfluoroheptanoic acid (PFHpA)	NY
Perfluorooctanoic acid (PFOA)	NY
Perfluorononanoic acid (PFNA)	NY
Perfluorodecanoic acid (PFDA)	NY
Perfluoroundecanoic acid (PFUnA)	NY
Perfluorododecanoic acid (PFDoA)	NY
Perfluorotridecanoic acid (PFTrDA)	NY
Perfluorotetradecanoic acid (PFTeDA)	NY
Perfluorobutanesulfonic acid (PFBS)	NY
Perfluoropentanesulfonic acid (PFPeS)	NY
Perfluorohexanesulfonic acid (PFHxS)	NY
Perfluoroheptanesulfonic acid (PFHpS)	NY
Perfluorooctanesulfonic acid (PFOS)	NY
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	NY
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	NY
N-MeFOSAA (NMeFOSAA)	NY
N-EtFOSAA (NEtFOSAA)	NY
Hexafluoropropylene oxide dimer acid (HFPO-DA)	NY
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	NY
9Cl-PF3ONS (F53B Minor)	NY
11Cl-PF3OUdS (F53B Major)	NY
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	NY
Perfluoro-3-methoxypropanoic acid (PFMPA)	NY

Pace Analytical Services, LLC - East Longmeadow, Ma, operates under the following certifications and accreditations:

Code	Description	Number	Expires
NY	New York State Department of Health	10899 NELAP	04/1/2026



PHONE: 413-243-4334
39 Spruce St
East Longmeadow, MA 01028

250137a KM
<https://www.pacelabs.com/>

Doc # J8U Rev 1_03242017

CHAIN OF CUSTODY RECORD (New York)

Page ____ of ____

Contact: <https://www.pacelabs.com/contact-us/contact-environmental-sciences/>

Company Name: NYS DEC Consultant: Labella Associates

Consultant Address: 5 McCrea Hill Rd. Bairston Spa, NY 12020

Consultant Phone: 518-885-5383

Out Project Name: NYSDEC Richard L. Hanson FTC

Project Location: Mohawk, NY

Out Number: 152879

Spill Number: B00138

Project Manager: S. Vaverchak / E. Koppers (DEC)

Analytical Quote Name/Number:

Service Recipient: NYSDEC

Ordered By: S. Vaverchak

Requested Turnaround Time	
DEC Standard 30-calendar day	☐
Due Date: Standard TAT	
Rush (Prior Approval Required)	
1-Day ☐	2-Day ☐
3-Day ☐	4-Day ☐
5-Day ☐	10-Day ☐
Data Delivery	
Format: PDF ☒	EXCEL ☒
Other:	
CLP Like (Level 4) Data Pkg Required: ☐	
Email To: See comments	
Fax To #:	

ANALYSIS REQUESTED (Circle Requested Analyses/Reporting List)	
8260: DER TCL / Oxygenates / CP-51	8270: DER TCL / CP-51
1,4-Dioxane SIM	8082 PCBs
8081 Pesticide	8151 Herbicide
TAL Total Metals	TCLP RCRA 8 Metals
PFAS 1633	PFAS 537 ID

of Containers
Preservation Code
Container Code
Dissolved Metals Samples
Field Filtered
Lab to Filter
Orthophosphate Samples
Field Filtered
Lab to Filter

1 Matrix Codes:
GW = Ground Water
WW = Waste Water
DW = Drinking Water
A = Air
S = Soil
SL = Sludge
SOL = Solid
O = Other (please define)

2 Preservation Codes:
I = Iced
H = HCL
M = Methanol
N = Nitric Acid
S = Sulfuric Acid
B = Sodium Bisulfate
X = Sodium Hydroxide
T = Sodium Thiosulfate
O = Other (please define)

3 Container Codes:
A = Amber Glass
G = Glass
P = Plastic
ST = Sterile
V = Vial
S = Summa Canister
T = Tedlar Bag
O = Other (please define)

Pace Analytical Work Order#	Client Sample ID / Description	Beginning Date/Time	Ending Date/Time	Composite	Grab	Matrix Code	Conc Code
1	SB-9 0"-2"	4/15/25	0945		X	S	U
2	SB-9 2"-12"		0950				
3	SB-9 24"-60"		0950				
4	SB-6 0"-2"		1025				
5	SB-6 2"-12"		1030				
6	SB-6 30"-36"		1035				
7	SB-9 2"-12" MS/MSD		0950				
8	DUP 2						
9	SW-1		1415			SW	
10	SED-1		1420			S	

Notes: Email results to SVaverchak@labellapac.com & Edward.Koppers@dec.ny.gov
★ CAT B Deliverables ★

Please use the following codes to indicate possible sample concentration within the Conc Code column above:
H - High; M - Medium; L - Low; C - Clean; U - Unknown

Shipped by: (signature)	Date/Time: 4/17/25 8:30
Received by: (signature)	Date/Time: 4/17/25 8:30
Received by: (signature)	Date/Time: 4/17/25 9:45
Received by: (signature)	Date/Time: 4/17/25 3:30
Received by: (signature)	Date/Time: 4/18/25 10:00

Program & Regulatory Information	
☐ AWQ STDS	☐ NY TOGS
☐ NYC Sewer Discharge	☐ NY CP-51
☐ Part 360 GW (Landfill)	
☐ NY Restricted Use	
☐ NY Unrestricted Use	
☐ NY Part 375	
Other:	



Deliverables
☐ Enhanced Data Package
☐ NYSDEC EQUIS EDD
☐ EQUIS (Standard) EDD
☐ NY Regulatory EDD
☐ NY Regs Hits-Only EDD
Other:

WADA 1.7 4/18/25 600 #200

led By: S. Vavarchak

										# of Containers
										² Preservation Code
										³ Container Code
ANALYSIS REQUESTED								(Circle Requested Analyses/Reporting List)		
8260: DER TCL / Oxygenates / CP-51		8270: DER TCL / CP-51		1,4-Dioxane SIM 8082 PCBs		8081 Pesticide 8151 Herbicide		TAL Total Metals TCPL RCRA 8 Metal	(PFAS 1633) PFAS 537 ID	Dissolved Metals Samples Field Filtered Lab to Filter
								X		Orthophosphate Samples Field Filtered Lab to Filter
										¹ Matrix Codes: GW = Ground Water WW = Waste Water DW = Drinking Water A = Air S = Soil SL = Sludge SOL = Solid O = Other (please define) ² Preservation Codes: I = Iced H = HCL M = Methanol N = Nitric Acid S = Sulfuric Acid B = Sodium Bisulfate X = Sodium Hydroxide T = Sodium

1 Matrix Codes:
GW = Ground Water
WW = Waste Water
DW = Drinking Water
A = Air
S = Soil
SL = Sludge
SOL = Solid
O = Other (please
 define)

2 Preservation Codes:
I = Iced
H = HCL
M = Methanol
N = Nitric Acid
S = Sulfuric Acid
B = Sodium Bisulfate
X = Sodium Hydroxide
T = Sodium
 Thiosulfate
O = Other (please
 define)

3 Container Codes:
A = Amber Glass
G = Glass
P = Plastic
ST = Sterile
V = Vial
S = Summa Canister
T = Tedlar Bag
O = Other (please define)

ents: Email results to Staverchara@labellapc.com ?
Edward. Koppers@ec.ny.gov
* CAT B Deliverables *

Please use the following codes to indicate possible sample concentration within the Conc Code column above:
H - High; M - Medium; L - Low; C - Clean; U - Unknown

ished by: (signature)	Date/Time:
<i>[Signature]</i>	4/17/25 8 ³⁰
ed by: (signature)	Date/Time:
<i>[Signature]</i> PACE	4/17/25 8 ³⁰
d by: (signature)	Date/Time:
<i>[Signature]</i> PACE	4/17/25 9 ¹⁵
r: (signature)	Date/Time:
<i>[Signature]</i>	4/17 20:00
by: (signature)	

Program & Regulatory Information

☐ AWQ STDS	☐ NY TOGS
☐ NYC Sewer Discharge	☐ NY CP-51
☐ Part 360 GW (Landfill)	
☐ NY Restricted Use	
☐ NY Unrestricted Use	
☐ NY Part 375	



Deliverables

Enhanced Data Package
NYSDEC EQUIS EDD
EQUIS (Standard) EDD
NY Regulatory EDD
NY Regs Hits-Only EDD

Others

NEI AC and AINHA LAB, LLC 4-11-11

4/18 08:00 gm 1.7 4/18/25 ~~800~~₉₁ ZOC

	DC#_Title: ENV-FRM-ELON-0001 v08_Sample Receiving Checklist
	Effective Date: 06/11/2024

Log In Back-Sheet

Client LaBella (DEC)
 Project Richard L. Hanson FTC
 MCP/RCP Required no
 Deliverable Package Requirement NY Gt-B
 Location Mohawk, NY
 PWSID# (When Applicable) n/a
 Arrival Method:
 Courier ☒ Fed Ex ☐ Walk In ☐ Other ☐
 Received By / Date / Time ER 4/18/25 1200
 Back-Sheet By / Date / Time Mem 4/20/25 1107
 Temperature Method Gun # 6
 WV samples: Yes (see note*) / No (follow normal procedure)
 Temp < 6° C Actual Temperature 17
 Rush Samples: Yes / No Notify no
 Short Hold: Yes / No Notify no

Notes regarding Samples/COC outside of SOP:

* Did not receive trip blank (listed on COC)

Login Sample Receipt Checklist – (Rejection Criteria Listing
 – Using Acceptance Policy) Any False statement will be
 brought to the attention of the Client – True or False

	True	False
Received on Ice	☒	☐
Received in Cooler	☒	☐
Custody Seal: DATE TIME	☐	☒
COC Relinquished	☒	☐
COC/Samples Labels Agree	☒	☐
All Samples in Good Condition	☒	☐
Samples Received within Holding Time	☒	☐
Is there enough Volume	☒	☐
Proper Media/Container Used	☒	☐
Splitting Samples Required	☐	☒
MS/MSD	☒	☐
Trip Blanks	☐ <i>note</i>	☒
Lab to Filters	☐	☒
COC Legible	☒	☐
COC Included: (Check all included)		
Client ☒	Analysis ☒	Sampler Name ☒
Project ☒	IDs ☒	Collection Date/Time ☒

All Samples Proper pH:

N/A

☐
☐

Additional Container Notes

*Note: West Virginia requires all samples to have their
 temperature taken. Note any outliers.

Sample	Soils Jars (Circle Amb/Clear)			Ambers						Plastics							VOA Vials					Other / Fill in																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			
	16oz Amb/Clear	8oz Amb/Clear	4oz Amb/Clear	2oz Amb/Clear	1 Liter		250mL		100mL	1 Liter		500mL	250mL					Unpreserved	HCl	MeOH	D.I. Water	BiSulfate	Col/Bact	Other																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																	
					Unpreserved	HCL	Sulfuric	Sulfuric	Phosphoric	HCl	Unpreserved	Sulfuric	Sulfuric	Unpreserved	Trizma	Sulfuric	Nitric								NaOH	Ammonium Acetate	NaOH/Zinc																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																														
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DC#_Title: ENV-FRM-ELON-0001 v08_Sample Receiving Checklist

Effective Date: 06/11/2024

Page

QUALTRAX SERVICES

May 21, 2025

Sierra Vaverchak
NYDEC_Labelle Associates - Ballston Spa, NY
5 McCrea Hill Road
Ballston Spa, NY 12020

Project Location: Mohawk, NY
Client Job Number:
Project Number: B00138
Laboratory Work Order Number: 25E0264

Enclosed are results of analyses for samples as received by the laboratory on April 30, 2025. If you have any questions concerning this report, please feel free to contact me.

Sincerely,



Kyle A. Murray
Project Manager

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Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

NYDEC_Labella Associates - Ballston Spa, NY
5 McCrea Hill Road
Ballston Spa, NY 12020
ATTN: Sierra Vaverchak

REPORT DATE: 5/21/2025

PURCHASE ORDER NUMBER: 152879

PROJECT NUMBER: B00138

ANALYTICAL SUMMARY

WORK ORDER NUMBER: 25E0264

The results of analyses performed on the following samples submitted to Pace Analytical Services, LLC - East Longmeadow, Ma, are found in this report.

PROJECT LOCATION: Mohawk, NY

FIELD SAMPLE #	LAB ID:	MATRIX	SAMPLE DESCRIPTION	TEST	SUB LAB
MW-1	25E0264-01	Ground Water		Draft Method 1633	
MW-2	25E0264-02	Ground Water		Draft Method 1633	
MW-3	25E0264-03	Ground Water		Draft Method 1633	
MW-4	25E0264-04	Ground Water		Draft Method 1633	
MW-5	25E0264-05	Ground Water		Draft Method 1633	
DUP	25E0264-06	Ground Water		Draft Method 1633	
Equipment Blank 1	25E0264-07	Equipment Blank Water		Draft Method 1633	

CASE NARRATIVE SUMMARY

All reported results are within defined laboratory quality control objectives unless listed below or otherwise qualified in this report.



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Draft Method 1633

Qualifications:

D-01

Sample extracted/prepared at a dilution due to sample matrix.

Analyte & Samples(s) Qualified:

11Cl-PF3OUdS (F53B Major)

25E0264-02RE1[MW-2]

13C2-4:2FTS

25E0264-02RE1[MW-2]

13C2-6:2FTS

25E0264-02RE1[MW-2]

13C2-8:2FTS

25E0264-02RE1[MW-2]

13C2-PFDA

25E0264-02RE1[MW-2]

13C2-PFDoA

25E0264-02RE1[MW-2]

13C2-PFHxA

25E0264-02RE1[MW-2]

13C2-PFTeDA

25E0264-02RE1[MW-2]

13C3-HFPO-DA

25E0264-02RE1[MW-2]

13C3-PFBA

25E0264-02RE1[MW-2]

13C3-PFBS

25E0264-02RE1[MW-2]

13C3-PFHxS

25E0264-02RE1[MW-2]

13C4-PFBA

25E0264-02RE1[MW-2]

13C4-PFHpA

25E0264-02RE1[MW-2]

13C4-PFOA

25E0264-02RE1[MW-2]

13C4-PFOS

25E0264-02RE1[MW-2]

13C5-PFHxA

25E0264-02RE1[MW-2]

13C5-PFNA

25E0264-02RE1[MW-2]

13C5-PFPeA

25E0264-02RE1[MW-2]

13C6-PFDA

25E0264-02RE1[MW-2]

13C7-PFUnA

25E0264-02RE1[MW-2]

13C8-PFOA

25E0264-02RE1[MW-2]

13C8-PFOS

25E0264-02RE1[MW-2]

13C8-PFOSA

25E0264-02RE1[MW-2]

13C9-PFNA

25E0264-02RE1[MW-2]

18O2-PFHxS

25E0264-02RE1[MW-2]

1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)

25E0264-02RE1[MW-2]

1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)

25E0264-02RE1[MW-2]

D-01

Sample extracted/prepared at a dilution due to sample matrix.

Analyte & Samples(s) Qualified:**1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)**

25E0264-02RE1[MW-2]

2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTI)

25E0264-02RE1[MW-2]

3-Perfluoroheptyl propanoic acid (FHpPA)(7:3FTC)

25E0264-02RE1[MW-2]

3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTC)

25E0264-02RE1[MW-2]

4,8-Dioxa-3H-perfluorononanoic acid (ADONA)

25E0264-02RE1[MW-2]

9Cl-PF3ONS (F53B Minor)

25E0264-02RE1[MW-2]

D3-NMeFOSA

25E0264-02RE1[MW-2]

D3-NMeFOSAA

25E0264-02RE1[MW-2]

D5-NEtFOSA

25E0264-02RE1[MW-2]

D5-NEtFOSAA

25E0264-02RE1[MW-2]

D7-NMeFOSE

25E0264-02RE1[MW-2]

D9-NEtFOSE

25E0264-02RE1[MW-2]

Hexafluoropropylene oxide dimer acid (HFPO-DA)

25E0264-02RE1[MW-2]

N-EtFOSAA (NEtFOSAA)

25E0264-02RE1[MW-2]

N-ethyl perfluorooctanesulfonamide (NEtFOSA)

25E0264-02RE1[MW-2]

N-ethylperfluorooctanesulfonamidoethanol (NEtFOE)

25E0264-02RE1[MW-2]

N-MeFOSAA (NMeFOSAA)

25E0264-02RE1[MW-2]

N-methyl perfluorooctanesulfonamide (NMeFOSA)

25E0264-02RE1[MW-2]

N-methylperfluorooctanesulfonamidoethanol(NMeF)

25E0264-02RE1[MW-2]

Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)

25E0264-02RE1[MW-2]

Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)

25E0264-02RE1[MW-2]

Perfluoro-3-methoxypropanoic acid (PFMPA)

25E0264-02RE1[MW-2]

Perfluoro-4-methoxybutanoic acid (PFMBA)

25E0264-02RE1[MW-2]

Perfluorobutanesulfonic acid (PFBS)

25E0264-02RE1[MW-2]

Perfluorobutanoic acid (PFBA)

25E0264-02RE1[MW-2]

Perfluorodecanesulfonic acid (PFDS)

25E0264-02RE1[MW-2]

Perfluorodecanoic acid (PFDA)

25E0264-02RE1[MW-2]

Perfluorododecanesulfonic acid (PFDoS)

25E0264-02RE1[MW-2]

Perfluorododecanoic acid (PFDoA)

25E0264-02RE1[MW-2]

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

D-01

Sample extracted/prepared at a dilution due to sample matrix.

Analyte & Samples(s) Qualified:**Perfluoroheptanesulfonic acid (PFHpS)**

25E0264-02RE1[MW-2]

Perfluoroheptanoic acid (PFHpA)

25E0264-02RE1[MW-2]

Perfluorohexanesulfonic acid (PFHxS)

25E0264-02RE1[MW-2]

Perfluorohexanoic acid (PFHxA)

25E0264-02RE1[MW-2]

Perfluorononanesulfonic acid (PFNS)

25E0264-02RE1[MW-2]

Perfluorononanoic acid (PFNA)

25E0264-02RE1[MW-2]

Perfluorooctanesulfonamide (PFOSA)

25E0264-02RE1[MW-2]

Perfluorooctanesulfonic acid (PFOS)

25E0264-02RE1[MW-2]

Perfluorooctanoic acid (PFOA)

25E0264-02RE1[MW-2]

Perfluoropentanesulfonic acid (PFPeS)

25E0264-02RE1[MW-2]

Perfluoropentanoic acid (PFPeA)

25E0264-02RE1[MW-2]

Perfluorotetradecanoic acid (PFTeDA)

25E0264-02RE1[MW-2]

Perfluorotridecanoic acid (PFTrDA)

25E0264-02RE1[MW-2]

Perfluoroundecanoic acid (PFUnA)

25E0264-02RE1[MW-2]

L-03

Laboratory fortified blank/laboratory control sample recovery is outside of control limits. Reported value for this compound is likely to be biased on the low side.

Analyte & Samples(s) Qualified:**11Cl-PF3OUdS (F53B Major)**

B404701-BLK1

2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3F1

B404701-BLK1

3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTC^A

B404701-BLK1

9Cl-PF3ONS (F53B Minor)

B404701-BLK1

N-EtFOSAA (NEtFOSAA)

B404701-BLK1

Perfluorodecanesulfonic acid (PFDS)

B404701-BLK1

Perfluorododecanesulfonic acid (PFDoS)

B404701-BLK1

Perfluorononanesulfonic acid (PFNS)

B404701-BLK1

Perfluorotridecanoic acid (PFTrDA)

B404701-BLK1

PF-18

Re-analysis confirmed Extracted Internal Standard failure due to matrix effects.

Analyte & Samples(s) Qualified:**D3-NMeFOSAA**

25E0264-03RE1[MW-3], 25E0264-05RE1[MW-5]

D5-NEtFOSAA

25E0264-05RE1[MW-5]

N-EtFOSAA (NEtFOSAA)

25E0264-05RE1[MW-5]

N-MeFOSAA (NMeFOSAA)

25E0264-03RE1[MW-3], 25E0264-05RE1[MW-5]

PF-23

Qualifier ion ratio <50% of associated calibration. Detection is suspect.

Analyte & Samples(s) Qualified:**Perfluorooctanesulfonamide (PFOSA)**

25E0264-02RE1[MW-2]

Perfluorooctanesulfonic acid (PFOS)

25E0264-01RE1[MW-1]

PF-24

Non-extracted internal standard compound recovery <50%. Re-extracted sample exhibited similar results. Possible high bias present on associated extracted internal standard recoveries

Analyte & Samples(s) Qualified:**13C3-PFBA**

25E0264-01RE1[MW-1]

13C4-PFBA

25E0264-01RE1[MW-1]

S-29

Extracted Internal Standard is outside of control limits.

Analyte & Samples(s) Qualified:**11Cl-PF3OUdS (F53B Major)**

25E0264-05RE1[MW-5]

13C2-4:2FTS

25E0264-05RE1[MW-5]

13C2-6:2FTS

25E0264-05RE1[MW-5]

13C2-8:2FTS

25E0264-05RE1[MW-5]

13C2-PFDoA

25E0264-05RE1[MW-5]

13C2-PFTeDA

25E0264-05RE1[MW-5]

13C3-HFPO-DA

25E0264-05RE1[MW-5]

13C3-PFBS

25E0264-05RE1[MW-5]

13C3-PFHxS

25E0264-05RE1[MW-5]

13C4-PFHpA

25E0264-05RE1[MW-5]

13C5-PFHxA

25E0264-05RE1[MW-5]

13C5-PFPeA

25E0264-05RE1[MW-5]

13C6-PFDA

25E0264-05RE1[MW-5]

13C7-PFUnA

25E0264-05RE1[MW-5]

13C8-PFOA

25E0264-05RE1[MW-5]

13C8-PFOS

25E0264-05RE1[MW-5]

13C8-PFOSA

25E0264-05RE1[MW-5]

13C9-PFNA

25E0264-05RE1[MW-5]

1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)

25E0264-05RE1[MW-5]

1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)

25E0264-05RE1[MW-5]

1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)

25E0264-05RE1[MW-5]

2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTS)

25E0264-05RE1[MW-5]

3-Perfluoroheptyl propanoic acid (FHpPA)(7:3FTS)

25E0264-05RE1[MW-5]

3-Perfluoropropyl propanoic acid (FPrPA)(3:3FTS)

25E0264-05RE1[MW-5]

4,8-Dioxa-3H-perfluorononanoic acid (ADONA)

25E0264-05RE1[MW-5]

9Cl-PF3ONS (F53B Minor)

25E0264-05RE1[MW-5]

D3-NMeFOSA

25E0264-05RE1[MW-5]

D5-NEtFOSA

25E0264-05RE1[MW-5]

D7-NMeFOSE

25E0264-05RE1[MW-5]

S-29

Extracted Internal Standard is outside of control limits.

Analyte & Samples(s) Qualified:**D9-NEtFOSE**

25E0264-05RE1[MW-5]

Hexafluoropropylene oxide dimer acid (HFPO-DA)

25E0264-05RE1[MW-5]

N-ethyl perfluorooctanesulfonamide (NEtFOSA)

25E0264-05RE1[MW-5]

N-ethylperfluorooctanesulfonamidoethanol (NEtFOE)

25E0264-05RE1[MW-5]

N-methyl perfluorooctanesulfonamide (NMeFOSA)

25E0264-05RE1[MW-5]

N-methylperfluorooctanesulfonamidoethanol(NMeF)

25E0264-05RE1[MW-5]

Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)

25E0264-05RE1[MW-5]

Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)

25E0264-05RE1[MW-5]

Perfluoro-4-methoxybutanoic acid (PFMBA)

25E0264-05RE1[MW-5]

Perfluorobutanesulfonic acid (PFBS)

25E0264-05RE1[MW-5]

Perfluorodecanesulfonic acid (PFDS)

25E0264-05RE1[MW-5]

Perfluorodecanoic acid (PFDA)

25E0264-05RE1[MW-5]

Perfluorododecanesulfonic acid (PFDoS)

25E0264-05RE1[MW-5]

Perfluorododecanoic acid (PFDoA)

25E0264-05RE1[MW-5]

Perfluoroheptanesulfonic acid (PFHpS)

25E0264-05RE1[MW-5]

Perfluoroheptanoic acid (PFHpA)

25E0264-05RE1[MW-5]

Perfluorohexanesulfonic acid (PFHxS)

25E0264-05RE1[MW-5]

Perfluorohexanoic acid (PFHxA)

25E0264-05RE1[MW-5]

Perfluorononanesulfonic acid (PFNS)

25E0264-05RE1[MW-5]

Perfluorononanoic acid (PFNA)

25E0264-05RE1[MW-5]

Perfluorooctanesulfonamide (PFOSA)

25E0264-05RE1[MW-5]

Perfluorooctanesulfonic acid (PFOS)

25E0264-05RE1[MW-5]

Perfluorooctanoic acid (PFOA)

25E0264-05RE1[MW-5]

Perfluoropentanesulfonic acid (PFPeS)

25E0264-05RE1[MW-5]

Perfluoropentanoic acid (PFPeA)

25E0264-05RE1[MW-5]

Perfluorotetradecanoic acid (PFTeDA)

25E0264-05RE1[MW-5]

Perfluorotridecanoic acid (PFTTrDA)

25E0264-05RE1[MW-5]

Perfluoroundecanoic acid (PFUnA)

25E0264-05RE1[MW-5]

**V-06**

Continuing calibration verification (CCV) did not meet method specifications and was biased on the high side for this compound.

Analyte & Samples(s) Qualified:

1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)

25E0264-02RE1[MW-2], S121655-CCV2

V-20

Continuing calibration verification (CCV) did not meet method specifications and was biased on the high side. Data validation is not affected since sample result was "not detected" for this compound.

Analyte & Samples(s) Qualified:

1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)

25E0264-01RE1[MW-1], 25E0264-03RE1[MW-3], 25E0264-04RE1[MW-4], 25E0264-05RE1[MW-5], 25E0264-06RE1[DUP], 25E0264-07RE1[Equipment Blank 1], S121496-CCV2

Z-01

Non-extracted internal standard compound recovery <50%. Possible high bias present on associated extracted internal standard recoveries.

Analyte & Samples(s) Qualified:**13C2-4:2FTS**

B404971-BLK1, B404971-MRL1, B404971-MS1

13C2-6:2FTS

B404971-BLK1, B404971-MRL1, B404971-MS1

13C2-8:2FTS

B404971-BLK1, B404971-MRL1, B404971-MS1

13C2-PFDA

25E0264-05RE1[MW-5], B404971-BLK1, B404971-MRL1, B404971-MS1

13C2-PFD_oA

25E0264-05RE1[MW-5], B404971-BLK1, B404971-MRL1, B404971-MS1

13C2-PFH_xA

B404971-BLK1, B404971-MRL1, B404971-MS1

13C2-PFT_eDA

25E0264-05RE1[MW-5], B404971-BLK1, B404971-MRL1, B404971-MS1

13C3-HFPO-DA

B404971-BLK1, B404971-MRL1, B404971-MS1

13C3-PFBA

B404971-BLK1, B404971-MRL1, B404971-MS1

13C3-PFBS

B404971-BLK1, B404971-MRL1, B404971-MS1

13C3-PFH_xS

B404971-BLK1, B404971-MRL1, B404971-MS1

13C4-PFBA

B404971-BLK1, B404971-MRL1, B404971-MS1

13C4-PFH_pA

B404971-BLK1, B404971-MRL1, B404971-MS1

13C4-PFOA

B404971-BLK1, B404971-MRL1, B404971-MS1

13C4-PFOS

B404971-MRL1, B404971-MS1

13C5-PFH_xA

B404971-BLK1, B404971-MRL1, B404971-MS1

13C5-PFNA

B404971-BLK1, B404971-MRL1, B404971-MS1

13C5-PFP_eA

B404971-BLK1, B404971-MRL1, B404971-MS1

13C6-PFDA

25E0264-05RE1[MW-5], B404971-BLK1, B404971-MRL1, B404971-MS1

13C7-PFUnA

25E0264-05RE1[MW-5], B404971-BLK1, B404971-MRL1, B404971-MS1

13C8-PFOA

B404971-BLK1, B404971-MRL1, B404971-MS1

13C8-PFOS

B404971-MRL1, B404971-MS1

13C8-PFOSA

B404971-MRL1, B404971-MS1

13C9-PFNA

B404971-BLK1, B404971-MRL1, B404971-MS1

18O2-PFH_xS

B404971-BLK1, B404971-MRL1, B404971-MS1

D3-NMeFOSA

B404971-MRL1, B404971-MS1

D3-NMeFOSAA

B404971-MRL1, B404971-MS1

D5-NEtFOSA

B404971-MRL1, B404971-MS1

D5-NEtFOSAA

B404971-MRL1, B404971-MS1

Z-01

Non-extracted internal standard compound recovery <50%. Possible high bias present on associated extracted internal standard recoveries.

Analyte & Samples(s) Qualified:

D7-NMeFOSE

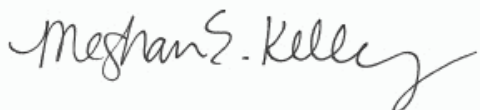
B404971-MRL1, B404971-MS1

D9-NEtFOSE

B404971-MRL1, B404971-MS1

The results of analyses reported only relate to samples submitted to Pace Analytical Services, LLC - East Longmeadow, Ma, for testing.

I certify that the analyses listed above, unless specifically listed as subcontracted, if any, were performed under my direction according to the approved methodologies listed in this document, and that based upon my inquiry of those individuals immediately responsible for obtaining the information, the material contained in this report is, to the best of my knowledge and belief, accurate and complete.



Meghan E. Kelley
Reporting Specialist

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: MW-1

Sampled: 4/28/2025 11:50

Sample ID: 25E0264-01

Sample Matrix: Ground Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	5.8	0.73	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluoropentanoic acid (PFPeA)	120	2.9	0.40	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorohexanoic acid (PFHxA)	41	1.5	0.25	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluoroheptanoic acid (PFHpA)	21	1.5	0.26	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorooctanoic acid (PFOA)	18	1.5	0.38	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorononanoic acid (PFNA)	0.89	1.5	0.59	ng/L	1	J	Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorodecanoic acid (PFDA)	ND	1.5	0.35	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluoroundecanoic acid (PFUnA)	ND	1.5	0.46	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorododecanoic acid (PFDoA)	ND	1.5	0.32	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorotridecanoic acid (PFTrDA)	ND	1.5	0.44	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	1.5	0.14	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorobutanesulfonic acid (PFBS)	2.4	1.5	0.31	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	1.5	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorohexanesulfonic acid (PFHxS)	2.2	1.5	0.56	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.5	0.77	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorooctanesulfonic acid (PFOS)	1.1	1.5	0.36	ng/L	1	J, PF-23	Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorononanesulfonic acid (PFNS)	ND	1.5	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorodecanesulfonic acid (PFDS)	ND	1.5	0.46	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	1.5	0.65	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	5.8	1.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	4.6	5.8	2.7	ng/L	1	J	Draft Method 1633	5/13/25	5/14/25 11:27	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	5.8	3.0	ng/L	1	V-20	Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluorooctanesulfonamide (PFOSA)	ND	1.5	0.51	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.5	0.25	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.5	0.30	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
N-MeFOSAA (NMeFOSAA)	ND	1.5	1.4	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
N-EtFOSAA (NEtFOSAA)	ND	1.5	0.59	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	15	1.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	15	1.5	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	5.8	1.4	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	5.8	0.77	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
9Cl-PF3ONS (F53B Minor)	ND	5.8	0.85	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
11Cl-PF3OUDS (F53B Major)	ND	5.8	1.5	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.3	2.0	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	36	6.4	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	36	8.1	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	2.9	0.52	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	2.9	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: MW-1

Sampled: 4/28/2025 11:50

Sample ID: 25E0264-01

Sample Matrix: Ground Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	2.9	0.39	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	2.9	1.9	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:27	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	5.10		5-130		PF-24		5/14/25 11:27			
13C5-PFPeA	56.0		40-130				5/14/25 11:27			
13C5-PFHxA	72.3		40-130				5/14/25 11:27			
13C4-PFHpA	66.1		40-130				5/14/25 11:27			
13C8-PFOA	61.2		40-130				5/14/25 11:27			
13C9-PFNA	57.1		40-130				5/14/25 11:27			
13C6-PFDA	58.8		40-130				5/14/25 11:27			
13C7-PFUnA	54.7		30-130				5/14/25 11:27			
13C2-PFDoA	45.2		10-130				5/14/25 11:27			
13C2-PFTeDA	33.8		10-130				5/14/25 11:27			
13C3-PFBS	64.9		40-135				5/14/25 11:27			
13C3-PFHxS	58.3		40-130				5/14/25 11:27			
13C8-PFOS	62.3		40-130				5/14/25 11:27			
13C2-4:2FTS	166		40-200				5/14/25 11:27			
13C2-6:2FTS	91.2		40-200				5/14/25 11:27			
13C2-8:2FTS	55.4		40-300				5/14/25 11:27			
13C8-PFOSA	63.6		40-130				5/14/25 11:27			
D3-NMeFOSA	52.6		10-130				5/14/25 11:27			
D5-NEtFOSA	48.7		10-130				5/14/25 11:27			
D3-NMeFOSAA	49.5		40-170				5/14/25 11:27			
D5-NEtFOSAA	47.6		25-135				5/14/25 11:27			
D7-NMeFOSE	53.5		10-130				5/14/25 11:27			
D9-NEtFOSE	39.8		10-130				5/14/25 11:27			
13C3-HFPO-DA	62.1		40-130				5/14/25 11:27			

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: MW-2

Sampled: 4/28/2025 13:15

Sample ID: 25E0264-02

Sample Matrix: Ground Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	66	22	2.8	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluoropentanoic acid (PFPeA)	200	11	1.6	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorohexanoic acid (PFHxA)	140	5.6	0.98	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluoroheptanoic acid (PFHpA)	160	5.6	0.99	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorooctanoic acid (PFOA)	140	5.6	1.5	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorononanoic acid (PFNA)	53	5.6	2.3	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorodecanoic acid (PFDA)	10	5.6	1.4	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluoroundecanoic acid (PFUnA)	ND	5.6	1.8	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorododecanoic acid (PFDoA)	ND	5.6	1.2	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorotridecanoic acid (PFTrDA)	ND	5.6	1.7	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	5.6	0.54	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorobutanesulfonic acid (PFBS)	16	5.6	1.2	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluoropentanesulfonic acid (PFPeS)	28	5.6	1.6	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorohexanesulfonic acid (PFHxS)	240	5.6	2.2	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluoroheptanesulfonic acid (PFHpS)	6.8	5.6	3.0	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorooctanesulfonic acid (PFOS)	1100	5.6	1.4	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorononanesulfonic acid (PFNS)	ND	5.6	1.6	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorodecanesulfonic acid (PFDS)	ND	5.6	1.8	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	5.6	2.5	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	22	4.7	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	66	22	11	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	73	22	12	ng/L	1	D-01, V-06	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluorooctanesulfonamide (PFOSA)	4.8	5.6	2.0	ng/L	1	J, D-01, PF-23	Draft Method 1633	5/13/25	5/14/25 11:36	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	5.6	0.96	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	5.6	1.2	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
N-MeFOSAA (NMeFOSAA)	ND	5.6	5.3	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
N-EtFOSAA (NEtFOSAA)	ND	5.6	2.3	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	56	4.6	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	56	5.7	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	22	5.3	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	22	3.0	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
9Cl-PF3ONS (F53B Minor)	ND	22	3.3	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
11Cl-PF3OUs (F53B Major)	ND	22	5.9	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	28	7.9	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	140	25	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	140	32	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	11	2.0	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	11	1.6	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: MW-2

Sampled: 4/28/2025 13:15

Sample ID: 25E0264-02

Sample Matrix: Ground Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	11	1.5	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	11	7.5	ng/L	1	D-01	Draft Method 1633	5/13/25	5/14/25 11:36	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	86.6		5-130		D-01		5/14/25 11:36			
13C5-PFPeA	83.9		40-130		D-01		5/14/25 11:36			
13C5-PFHxA	86.6		40-130		D-01		5/14/25 11:36			
13C4-PFHpA	86.8		40-130		D-01		5/14/25 11:36			
13C8-PFOA	86.6		40-130		D-01		5/14/25 11:36			
13C9-PFNA	85.9		40-130		D-01		5/14/25 11:36			
13C6-PFDA	82.7		40-130		D-01		5/14/25 11:36			
13C7-PFUnA	75.8		30-130		D-01		5/14/25 11:36			
13C2-PFDoA	60.8		10-130		D-01		5/14/25 11:36			
13C2-PFTeDA	59.0		10-130		D-01		5/14/25 11:36			
13C3-PFBS	89.4		40-135		D-01		5/14/25 11:36			
13C3-PFHxS	84.4		40-130		D-01		5/14/25 11:36			
13C8-PFOS	92.7		40-130		D-01		5/14/25 11:36			
13C2-4:2FTS	76.7		40-200		D-01		5/14/25 11:36			
13C2-6:2FTS	88.2		40-200		D-01		5/14/25 11:36			
13C2-8:2FTS	86.8		40-300		D-01		5/14/25 11:36			
13C8-PFOSA	86.4		40-130		D-01		5/14/25 11:36			
D3-NMeFOSA	62.6		10-130		D-01		5/14/25 11:36			
D5-NEtFOSA	63.0		10-130		D-01		5/14/25 11:36			
D3-NMeFOSAA	72.2		40-170		D-01		5/14/25 11:36			
D5-NEtFOSAA	59.9		25-135		D-01		5/14/25 11:36			
D7-NMeFOSE	66.5		10-130		D-01		5/14/25 11:36			
D9-NEtFOSE	63.1		10-130		D-01		5/14/25 11:36			
13C3-HFPO-DA	87.9		40-130		D-01		5/14/25 11:36			

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: MW-3

Sample ID: 25E0264-03

Start Date/Time: 4/28/2025 2:15:00PM

Sample Matrix: Ground Water

Stop Date/Time: 4/28/2025 2:25:00PM

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	5.8	0.73	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluoropentanoic acid (PFPeA)	ND	2.9	0.40	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorohexanoic acid (PFHxA)	ND	1.5	0.25	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluoroheptanoic acid (PFHpA)	ND	1.5	0.26	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorooctanoic acid (PFOA)	ND	1.5	0.38	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorononanoic acid (PFNA)	ND	1.5	0.59	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorodecanoic acid (PFDA)	ND	1.5	0.35	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluoroundecanoic acid (PFUnA)	ND	1.5	0.46	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorododecanoic acid (PFDoA)	ND	1.5	0.32	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorotridecanoic acid (PFTrDA)	ND	1.5	0.44	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	1.5	0.14	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorobutanesulfonic acid (PFBS)	ND	1.5	0.31	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	1.5	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	1.5	0.56	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.5	0.77	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorooctanesulfonic acid (PFOS)	1.2	1.5	0.36	ng/L	1	J	Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorononanesulfonic acid (PFNS)	ND	1.5	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorodecanesulfonic acid (PFDS)	ND	1.5	0.46	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	1.5	0.65	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	5.8	1.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	5.8	2.7	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	5.8	3.0	ng/L	1	V-20	Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluorooctanesulfonamide (PFOSA)	ND	1.5	0.51	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.5	0.25	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.5	0.30	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
N-MeFOSAA (NMeFOSAA)	ND	1.5	1.4	ng/L	1	PF-18	Draft Method 1633	5/13/25	5/14/25 11:46	CML
N-EtFOSAA (NEtFOSAA)	ND	1.5	0.59	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	15	1.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	15	1.5	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	5.8	1.4	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	5.8	0.77	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
9Cl-PF3ONS (F53B Minor)	ND	5.8	0.85	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
11Cl-PF3OUDS (F53B Major)	ND	5.8	1.5	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.3	2.0	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	36	6.4	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	36	8.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	2.9	0.52	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	2.9	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: MW-3

Sample ID: 25E0264-03

Start Date/Time: 4/28/2025 2:15:00PM

Sample Matrix: Ground Water

Stop Date/Time: 4/28/2025 2:25:00PM

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	2.9	0.39	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	2.9	1.9	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:46	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	65.1		5-130				5/14/25 11:46			
13C5-PFPeA	58.6		40-130				5/14/25 11:46			
13C5-PFHxA	56.0		40-130				5/14/25 11:46			
13C4-PFHpA	54.2		40-130				5/14/25 11:46			
13C8-PFOA	52.4		40-130				5/14/25 11:46			
13C9-PFNA	46.6		40-130				5/14/25 11:46			
13C6-PFDA	46.3		40-130				5/14/25 11:46			
13C7-PFUnA	42.0		30-130				5/14/25 11:46			
13C2-PFDoA	34.3		10-130				5/14/25 11:46			
13C2-PFTeDA	23.2		10-130				5/14/25 11:46			
13C3-PFBS	54.6		40-135				5/14/25 11:46			
13C3-PFHxS	47.9		40-130				5/14/25 11:46			
13C8-PFOS	43.4		40-130				5/14/25 11:46			
13C2-4:2FTS	43.9		40-200				5/14/25 11:46			
13C2-6:2FTS	49.5		40-200				5/14/25 11:46			
13C2-8:2FTS	46.6		40-300				5/14/25 11:46			
13C8-PFOSA	45.3		40-130				5/14/25 11:46			
D3-NMeFOSA	38.7		10-130				5/14/25 11:46			
D5-NEtFOSA	32.7		10-130				5/14/25 11:46			
D3-NMeFOSAA	32.4	*	40-170		PF-18		5/14/25 11:46			
D5-NEtFOSAA	28.6		25-135				5/14/25 11:46			
D7-NMeFOSE	30.6		10-130				5/14/25 11:46			
D9-NEtFOSE	24.3		10-130				5/14/25 11:46			
13C3-HFPO-DA	61.7		40-130				5/14/25 11:46			

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: MW-4

Sampled: 4/28/2025 15:00

Sample ID: 25E0264-04

Sample Matrix: Ground Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	0.82	5.7	0.72	ng/L	1	J	Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluoropentanoic acid (PFPeA)	ND	2.9	0.40	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorohexanoic acid (PFHxA)	ND	1.4	0.25	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluoroheptanoic acid (PFHpA)	ND	1.4	0.25	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorooctanoic acid (PFOA)	0.44	1.4	0.37	ng/L	1	J	Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorononanoic acid (PFNA)	ND	1.4	0.58	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorodecanoic acid (PFDA)	ND	1.4	0.35	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluoroundecanoic acid (PFUnA)	ND	1.4	0.46	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorododecanoic acid (PFDoA)	ND	1.4	0.31	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorotridecanoic acid (PFTrDA)	ND	1.4	0.43	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	1.4	0.14	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorobutanesulfonic acid (PFBS)	ND	1.4	0.31	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	1.4	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	1.4	0.55	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.4	0.76	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorooctanesulfonic acid (PFOS)	0.47	1.4	0.35	ng/L	1	J	Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorononanesulfonic acid (PFNS)	ND	1.4	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorodecanesulfonic acid (PFDS)	ND	1.4	0.45	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	1.4	0.64	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	5.7	1.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	5.7	2.7	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	5.7	2.9	ng/L	1	V-20	Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluorooctanesulfonamide (PFOSA)	ND	1.4	0.50	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.4	0.24	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.4	0.30	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
N-MeFOSAA (NMeFOSAA)	ND	1.4	1.4	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
N-EtFOSAA (NEtFOSAA)	ND	1.4	0.58	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	14	1.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	14	1.5	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	5.7	1.4	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	5.7	0.76	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
9Cl-PF3ONS (F53B Minor)	ND	5.7	0.83	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
11Cl-PF3OUDs (F53B Major)	ND	5.7	1.5	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.1	2.0	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	36	6.3	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	36	8.0	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	2.9	0.51	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	2.9	0.41	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: MW-4

Sampled: 4/28/2025 15:00

Sample ID: 25E0264-04

Sample Matrix: Ground Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	2.9	0.38	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	2.9	1.9	ng/L	1		Draft Method 1633	5/13/25	5/14/25 11:55	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	81.1		5-130				5/14/25 11:55			
13C5-PFPeA	79.5		40-130				5/14/25 11:55			
13C5-PFHxA	83.4		40-130				5/14/25 11:55			
13C4-PFHpA	86.2		40-130				5/14/25 11:55			
13C8-PFOA	83.8		40-130				5/14/25 11:55			
13C9-PFNA	82.1		40-130				5/14/25 11:55			
13C6-PFDA	72.5		40-130				5/14/25 11:55			
13C7-PFUnA	61.7		30-130				5/14/25 11:55			
13C2-PFDoA	52.1		10-130				5/14/25 11:55			
13C2-PFTeDA	49.7		10-130				5/14/25 11:55			
13C3-PFBS	87.5		40-135				5/14/25 11:55			
13C3-PFHxS	79.3		40-130				5/14/25 11:55			
13C8-PFOS	76.6		40-130				5/14/25 11:55			
13C2-4:2FTS	60.2		40-200				5/14/25 11:55			
13C2-6:2FTS	66.4		40-200				5/14/25 11:55			
13C2-8:2FTS	71.2		40-300				5/14/25 11:55			
13C8-PFOSA	66.7		40-130				5/14/25 11:55			
D3-NMeFOSA	49.6		10-130				5/14/25 11:55			
D5-NEtFOSA	50.6		10-130				5/14/25 11:55			
D3-NMeFOSAA	50.0		40-170				5/14/25 11:55			
D5-NEtFOSAA	43.1		25-135				5/14/25 11:55			
D7-NMeFOSE	51.6		10-130				5/14/25 11:55			
D9-NEtFOSE	49.9		10-130				5/14/25 11:55			
13C3-HFPO-DA	90.1		40-130				5/14/25 11:55			

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: MW-5

Sampled: 4/28/2025 15:40

Sample ID: 25E0264-05

Sample Matrix: Ground Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	13	7.0	0.87	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluoropentanoic acid (PFPeA)	5.0	3.5	0.49	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorohexanoic acid (PFHxA)	8.2	1.7	0.30	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluoroheptanoic acid (PFHpA)	16	1.7	0.31	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorooctanoic acid (PFOA)	11	1.7	0.46	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorononanoic acid (PFNA)	1.7	1.7	0.71	ng/L	1	J, S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorodecanoic acid (PFDA)	ND	1.7	0.42	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluoroundecanoic acid (PFUnA)	ND	1.7	0.56	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorododecanoic acid (PFDoA)	ND	1.7	0.38	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorotridecanoic acid (PFTrDA)	ND	1.7	0.53	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	1.7	0.17	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorobutanesulfonic acid (PFBS)	3.7	1.7	0.38	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluoropentanesulfonic acid (PFPeS)	4.2	1.7	0.51	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorohexanesulfonic acid (PFHxS)	30	1.7	0.68	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluoroheptanesulfonic acid (PFHpS)	1.2	1.7	0.92	ng/L	1	J, S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorooctanesulfonic acid (PFOS)	44	1.7	0.43	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorononanesulfonic acid (PFNS)	ND	1.7	0.51	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorodecanesulfonic acid (PFDS)	ND	1.7	0.55	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	1.7	0.79	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	7.0	1.4	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	7.0	3.3	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	7.0	3.6	ng/L	1	S-29, V-20	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluorooctanesulfonamide (PFOSA)	ND	1.7	0.61	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.7	0.30	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.7	0.36	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
N-MeFOSAA (NMeFOSAA)	ND	1.7	1.7	ng/L	1	PF-18	Draft Method 1633	5/13/25	5/14/25 12:04	CML
N-EtFOSAA (NEtFOSAA)	ND	1.7	0.70	ng/L	1	PF-18	Draft Method 1633	5/13/25	5/14/25 12:04	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	17	1.4	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	17	1.8	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	7.0	1.7	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	7.0	0.93	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
9Cl-PF3ONS (F53B Minor)	ND	7.0	1.0	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
11Cl-PF3OUs (F53B Major)	ND	7.0	1.8	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	8.7	2.5	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	44	7.6	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	44	9.8	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	3.5	0.62	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	3.5	0.50	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:04	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: MW-5

Sampled: 4/28/2025 15:40

Sample ID: 25E0264-05

Sample Matrix: Ground Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	3.5	0.47	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	3.5	2.3	ng/L	1	S-29	Draft Method 1633	5/13/25	5/14/25 12:04	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	46.9		5-130				5/14/25 12:04			
13C5-PFPeA	37.4 *		40-130		S-29		5/14/25 12:04			
13C5-PFHxA	30.9 *		40-130		S-29		5/14/25 12:04			
13C4-PFHpA	23.1 *		40-130		S-29		5/14/25 12:04			
13C8-PFOA	18.5 *		40-130		S-29		5/14/25 12:04			
13C9-PFNA	14.9 *		40-130		S-29		5/14/25 12:04			
13C6-PFDA	11.3 *		40-130		S-29, Z-01		5/14/25 12:04			
13C7-PFUnA	5.32 *		30-130		S-29, Z-01		5/14/25 12:04			
13C2-PFDoA	1.26 *		10-130		Z-01, S-29		5/14/25 12:04			
13C2-PFTeDA	0.0352 *		10-130		Z-01, S-29		5/14/25 12:04			
13C3-PFBS	31.7 *		40-135		S-29		5/14/25 12:04			
13C3-PFHxS	17.9 *		40-130		S-29		5/14/25 12:04			
13C8-PFOS	12.5 *		40-130		S-29		5/14/25 12:04			
13C2-4:2FTS	26.6 *		40-200		S-29		5/14/25 12:04			
13C2-6:2FTS	15.8 *		40-200		S-29		5/14/25 12:04			
13C2-8:2FTS	8.66 *		40-300		S-29		5/14/25 12:04			
13C8-PFOSA	6.56 *		40-130		S-29		5/14/25 12:04			
D3-NMeFOSA	1.70 *		10-130		S-29		5/14/25 12:04			
D5-NEtFOSA	1.02 *		10-130		S-29		5/14/25 12:04			
D3-NMeFOSAA	3.67 *		40-170		PF-18		5/14/25 12:04			
D5-NEtFOSAA	2.43 *		25-135		PF-18		5/14/25 12:04			
D7-NMeFOSE	1.13 *		10-130		S-29		5/14/25 12:04			
D9-NEtFOSE	0.385 *		10-130		S-29		5/14/25 12:04			
13C3-HFPO-DA	34.5 *		40-130		S-29		5/14/25 12:04			

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: DUP

Sampled: 4/28/2025 00:00

Sample ID: 25E0264-06

Sample Matrix: Ground Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	0.85	5.6	0.71	ng/L	1	J	Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluoropentanoic acid (PFPeA)	ND	2.8	0.39	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorohexanoic acid (PFHxA)	ND	1.4	0.24	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluoroheptanoic acid (PFHpA)	ND	1.4	0.25	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorooctanoic acid (PFOA)	0.50	1.4	0.37	ng/L	1	J	Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorononanoic acid (PFNA)	ND	1.4	0.57	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorodecanoic acid (PFDA)	ND	1.4	0.34	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluoroundecanoic acid (PFUnA)	ND	1.4	0.45	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorododecanoic acid (PFDoA)	ND	1.4	0.31	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorotridecanoic acid (PFTrDA)	ND	1.4	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	1.4	0.14	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorobutanesulfonic acid (PFBS)	ND	1.4	0.30	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	1.4	0.41	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	1.4	0.55	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.4	0.75	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorooctanesulfonic acid (PFOS)	0.47	1.4	0.35	ng/L	1	J	Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorononanesulfonic acid (PFNS)	ND	1.4	0.41	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorodecanesulfonic acid (PFDS)	ND	1.4	0.45	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	1.4	0.63	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	5.6	1.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	5.6	2.6	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	5.6	2.9	ng/L	1	V-20	Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluorooctanesulfonamide (PFOSA)	ND	1.4	0.49	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.4	0.24	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.4	0.29	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
N-MeFOSAA (NMeFOSAA)	ND	1.4	1.3	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
N-EtFOSAA (NEtFOSAA)	ND	1.4	0.57	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	14	1.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	14	1.4	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	5.6	1.3	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	5.6	0.75	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
9Cl-PF3ONS (F53B Minor)	ND	5.6	0.82	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
11Cl-PF3OUs (F53B Major)	ND	5.6	1.5	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.0	2.0	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	35	6.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	35	7.9	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	2.8	0.50	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	2.8	0.41	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: DUP

Sampled: 4/28/2025 00:00

Sample ID: 25E0264-06

Sample Matrix: Ground Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	2.8	0.38	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	2.8	1.9	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:13	CML
Surrogates	% Recovery		Recovery Limits		Flag/Qual					
13C4-PFBA	104		5-130				5/14/25 12:13			
13C5-PFPeA	105		40-130				5/14/25 12:13			
13C5-PFHxA	107		40-130				5/14/25 12:13			
13C4-PFHpA	109		40-130				5/14/25 12:13			
13C8-PFOA	109		40-130				5/14/25 12:13			
13C9-PFNA	104		40-130				5/14/25 12:13			
13C6-PFDA	100		40-130				5/14/25 12:13			
13C7-PFUnA	82.9		30-130				5/14/25 12:13			
13C2-PFDoA	68.5		10-130				5/14/25 12:13			
13C2-PFTeDA	66.8		10-130				5/14/25 12:13			
13C3-PFBS	112		40-135				5/14/25 12:13			
13C3-PFHxS	105		40-130				5/14/25 12:13			
13C8-PFOS	103		40-130				5/14/25 12:13			
13C2-4:2FTS	85.2		40-200				5/14/25 12:13			
13C2-6:2FTS	96.8		40-200				5/14/25 12:13			
13C2-8:2FTS	98.1		40-300				5/14/25 12:13			
13C8-PFOSA	90.0		40-130				5/14/25 12:13			
D3-NMeFOSA	69.2		10-130				5/14/25 12:13			
D5-NEtFOSA	69.0		10-130				5/14/25 12:13			
D3-NMeFOSAA	71.8		40-170				5/14/25 12:13			
D5-NEtFOSAA	66.5		25-135				5/14/25 12:13			
D7-NMeFOSE	69.8		10-130				5/14/25 12:13			
D9-NEtFOSE	65.2		10-130				5/14/25 12:13			
13C3-HFPO-DA	112		40-130				5/14/25 12:13			

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: Equipment Blank 1

Sampled: 4/28/2025 00:00

Sample ID: 25E0264-07

Sample Matrix: Equipment Blank Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluorobutanoic acid (PFBA)	ND	5.8	0.73	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluoropentanoic acid (PFPeA)	ND	2.9	0.40	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorohexanoic acid (PFHxA)	ND	1.5	0.25	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluoroheptanoic acid (PFHpA)	ND	1.5	0.26	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorooctanoic acid (PFOA)	ND	1.5	0.38	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorononanoic acid (PFNA)	ND	1.5	0.59	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorodecanoic acid (PFDA)	ND	1.5	0.35	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluoroundecanoic acid (PFUnA)	ND	1.5	0.46	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorododecanoic acid (PFDoA)	ND	1.5	0.32	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorotridecanoic acid (PFTrDA)	ND	1.5	0.44	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorotetradecanoic acid (PFTeDA)	ND	1.5	0.14	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorobutanesulfonic acid (PFBS)	ND	1.5	0.31	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluoropentanesulfonic acid (PFPeS)	ND	1.5	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorohexanesulfonic acid (PFHxS)	ND	1.5	0.56	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.5	0.77	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorooctanesulfonic acid (PFOS)	ND	1.5	0.36	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorononanesulfonic acid (PFNS)	ND	1.5	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorodecanesulfonic acid (PFDS)	ND	1.5	0.46	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorododecanesulfonic acid (PFDoS)	ND	1.5	0.65	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	5.8	1.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	5.8	2.7	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	5.8	3.0	ng/L	1	V-20	Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluorooctanesulfonamide (PFOSA)	ND	1.5	0.51	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.5	0.25	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.5	0.30	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
N-MeFOSAA (NMeFOSAA)	ND	1.5	1.4	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
N-EtFOSAA (NEtFOSAA)	ND	1.5	0.59	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	15	1.2	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	15	1.5	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	5.8	1.4	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	ND	5.8	0.77	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
9Cl-PF3ONS (F53B Minor)	ND	5.8	0.85	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
11Cl-PF3OUDs (F53B Major)	ND	5.8	1.5	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.3	2.0	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	36	6.4	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
3-Perfluoroheptyl propanoic acid (FHPrPA) (7:3FTCA)	ND	36	8.1	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	ND	2.9	0.52	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	2.9	0.42	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Mohawk, NY

Sample Description:

Work Order: 25E0264

Date Received: 4/30/2025

Field Sample #: Equipment Blank 1

Sampled: 4/28/2025 00:00

Sample ID: 25E0264-07

Sample Matrix: Equipment Blank Water

Semivolatile Organic Compounds by - LC/MS-MS

Analyte	Results	RL	DL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	2.9	0.39	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	2.9	1.9	ng/L	1		Draft Method 1633	5/13/25	5/14/25 12:22	CML
Surrogates	% Recovery	Recovery Limits		Flag/Qual						
13C4-PFBA	76.0	5-130							5/14/25 12:22	
13C5-PFPeA	76.5	40-130							5/14/25 12:22	
13C5-PFHxA	76.5	40-130							5/14/25 12:22	
13C4-PFHpA	72.2	40-130							5/14/25 12:22	
13C8-PFOA	72.7	40-130							5/14/25 12:22	
13C9-PFNA	71.1	40-130							5/14/25 12:22	
13C6-PFDA	70.2	40-130							5/14/25 12:22	
13C7-PFUnA	65.3	30-130							5/14/25 12:22	
13C2-PFDoA	56.1	10-130							5/14/25 12:22	
13C2-PFTeDA	53.4	10-130							5/14/25 12:22	
13C3-PFBS	71.5	40-135							5/14/25 12:22	
13C3-PFHxS	66.1	40-130							5/14/25 12:22	
13C8-PFOS	64.1	40-130							5/14/25 12:22	
13C2-4:2FTS	81.3	40-200							5/14/25 12:22	
13C2-6:2FTS	73.5	40-200							5/14/25 12:22	
13C2-8:2FTS	61.2	40-300							5/14/25 12:22	
13C8-PFOSA	73.9	40-130							5/14/25 12:22	
D3-NMeFOSA	68.7	10-130							5/14/25 12:22	
D5-NEtFOSA	69.7	10-130							5/14/25 12:22	
D3-NMeFOSAA	69.1	40-170							5/14/25 12:22	
D5-NEtFOSAA	66.5	25-135							5/14/25 12:22	
D7-NMeFOSE	75.5	10-130							5/14/25 12:22	
D9-NEtFOSE	71.7	10-130							5/14/25 12:22	
13C3-HFPO-DA	77.4	40-130							5/14/25 12:22	

**Sample Extraction Data****Prep Method:**EPA 1633**Analytical Method:**Draft Method 1633

Lab Number [Field ID]	Batch	Initial [mL]	Final [mL]	Date
25E0264-01RE1 [MW-1]	B404971	551	4.00	05/13/25
25E0264-02RE1 [MW-2]	B404971	142	4.00	05/13/25
25E0264-03RE1 [MW-3]	B404971	551	4.00	05/13/25
25E0264-04RE1 [MW-4]	B404971	560	4.00	05/13/25
25E0264-05RE1 [MW-5]	B404971	458	4.00	05/13/25
25E0264-06RE1 [DUP]	B404971	568	4.00	05/13/25
25E0264-07RE1 [Equipment Blank 1]	B404971	551	4.00	05/13/25

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B404701 - EPA 1633										
Blank (B404701-BLK1)										
Prepared & Analyzed: 05/12/25										
Perfluorobutanoic acid (PFBA)	ND	6.3	ng/L							
Perfluoropentanoic acid (PFPeA)	ND	3.2	ng/L							
Perfluorohexanoic acid (PFHxA)	ND	1.6	ng/L							
Perfluoroheptanoic acid (PFHpA)	ND	1.6	ng/L							
Perfluorooctanoic acid (PFOA)	ND	1.6	ng/L							
Perfluorononanoic acid (PFNA)	ND	1.6	ng/L							
Perfluorodecanoic acid (PFDA)	ND	1.6	ng/L							
Perfluoroundecanoic acid (PFUnA)	ND	1.6	ng/L							
Perfluorododecanoic acid (PFDoA)	ND	1.6	ng/L							
Perfluorotridecanoic acid (PFTrDA)	ND	1.6	ng/L							L-03
Perfluorotetradecanoic acid (PFTeDA)	ND	1.6	ng/L							
Perfluorobutanesulfonic acid (PFBS)	ND	1.6	ng/L							
Perfluoropentanesulfonic acid (PFPeS)	ND	1.6	ng/L							
Perfluorohexanesulfonic acid (PFHxS)	ND	1.6	ng/L							
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.6	ng/L							
Perfluorooctanesulfonic acid (PFOS)	ND	1.6	ng/L							
Perfluorononanesulfonic acid (PFNS)	ND	1.6	ng/L							L-03
Perfluorodecanesulfonic acid (PFDS)	ND	1.6	ng/L							L-03
Perfluorododecanesulfonic acid (PFDoS)	ND	1.6	ng/L							L-03
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	6.3	ng/L							
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	6.3	ng/L							
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	6.3	ng/L							
Perfluorooctanesulfonamide (PFOSA)	ND	1.6	ng/L							
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.6	ng/L							
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.6	ng/L							
N-MeFOSAA (NMeFOSAA)	ND	1.6	ng/L							
N-EtFOSAA (NEtFOSAA)	ND	1.6	ng/L							L-03
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	16	ng/L							
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	16	ng/L							
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	6.3	ng/L							
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	6.3	ng/L							
9Cl-PF3ONS (F53B Minor)	ND	6.3	ng/L							L-03
11Cl-PF3OUdS (F53B Major)	ND	6.3	ng/L							L-03
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.9	ng/L							L-03
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	ND	40	ng/L							L-03
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	ND	40	ng/L							
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	ND	3.2	ng/L							
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	3.2	ng/L							
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	3.2	ng/L							
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	3.2	ng/L							
Surrogate: 13C4-PFBA	80.3		ng/L	79.25		101	5-130			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B404701 - EPA 1633
Blank (B404701-BLK1)

Prepared & Analyzed: 05/12/25

Surrogate: 13C5-PFPeA	39.7		ng/L	39.63		100	40-130			
Surrogate: 13C5-PFHxA	18.4		ng/L	19.81		92.9	40-130			
Surrogate: 13C4-PFHpA	17.7		ng/L	19.81		89.2	40-130			
Surrogate: 13C8-PFOA	19.3		ng/L	19.81		97.6	40-130			
Surrogate: 13C9-PFNA	9.64		ng/L	9.906		97.4	40-130			
Surrogate: 13C6-PFDA	9.33		ng/L	9.906		94.1	40-130			
Surrogate: 13C7-PFUnA	8.42		ng/L	9.906		85.0	30-130			
Surrogate: 13C2-PFDoA	7.43		ng/L	9.906		75.0	10-130			
Surrogate: 13C2-PFTeDA	5.21		ng/L	9.906		52.5	10-130			
Surrogate: 13C3-PFBS	20.8		ng/L	19.81		105	40-135			
Surrogate: 13C3-PFHxS	18.8		ng/L	19.81		94.7	40-130			
Surrogate: 13C8-PFOS	19.0		ng/L	19.81		96.0	40-130			
Surrogate: 13C2-4:2FTS	48.2		ng/L	39.63		122	40-200			
Surrogate: 13C2-6:2FTS	40.2		ng/L	39.63		101	40-200			
Surrogate: 13C2-8:2FTS	40.0		ng/L	39.63		101	40-300			
Surrogate: 13C8-PFOSA	15.3		ng/L	19.81		77.2	40-130			
Surrogate: D3-NMeFOSA	13.4		ng/L	19.81		67.7	10-130			
Surrogate: D5-NEtFOSA	12.1		ng/L	19.81		61.1	10-130			
Surrogate: D3-NMeFOSAA	34.7		ng/L	39.63		87.5	40-170			
Surrogate: D5-NEtFOSAA	33.2		ng/L	39.63		83.9	25-135			
Surrogate: D7-NMeFOSE	121		ng/L	198.1		61.2	10-130			
Surrogate: D9-NEtFOSE	110		ng/L	198.1		55.4	10-130			
Surrogate: 13C3-HFPO-DA	75.5		ng/L	79.25		95.3	40-130			

Batch B404971 - EPA 1633
Blank (B404971-BLK1)

Prepared: 05/13/25 Analyzed: 05/14/25

Perfluorobutanoic acid (PFBA)	ND	6.3	ng/L							
Perfluoropentanoic acid (PFPeA)	ND	3.2	ng/L							
Perfluorohexanoic acid (PFHxA)	ND	1.6	ng/L							
Perfluoroheptanoic acid (PFHpA)	ND	1.6	ng/L							
Perfluorooctanoic acid (PFOA)	ND	1.6	ng/L							
Perfluorononanoic acid (PFNA)	ND	1.6	ng/L							
Perfluorodecanoic acid (PFDA)	ND	1.6	ng/L							
Perfluoroundecanoic acid (PFUnA)	ND	1.6	ng/L							
Perfluorododecanoic acid (PFDoA)	ND	1.6	ng/L							
Perfluorotridecanoic acid (PFTTrDA)	ND	1.6	ng/L							
Perfluorotetradecanoic acid (PFTeDA)	ND	1.6	ng/L							
Perfluorobutanesulfonic acid (PFBS)	ND	1.6	ng/L							
Perfluoropentanesulfonic acid (PFPeS)	ND	1.6	ng/L							
Perfluorohexanesulfonic acid (PFHxS)	ND	1.6	ng/L							
Perfluoroheptanesulfonic acid (PFHpS)	ND	1.6	ng/L							
Perfluorooctanesulfonic acid (PFOS)	ND	1.6	ng/L							
Perfluorononanesulfonic acid (PFNS)	ND	1.6	ng/L							
Perfluorodecanesulfonic acid (PFDS)	ND	1.6	ng/L							
Perfluorododecanesulfonic acid (PFDoS)	ND	1.6	ng/L							
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	ND	6.3	ng/L							
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	ND	6.3	ng/L							
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	ND	6.3	ng/L							
Perfluorooctanesulfonamide (PFOSA)	ND	1.6	ng/L							

QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B404971 - EPA 1633										
Blank (B404971-BLK1)										
Prepared: 05/13/25 Analyzed: 05/14/25										
N-methyl perfluorooctanesulfonamide (NMeFOSA)	ND	1.6	ng/L							
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	ND	1.6	ng/L							
N-MeFOSAA (NMeFOSAA)	ND	1.6	ng/L							
N-EtFOSAA (NEtFOSAA)	ND	1.6	ng/L							
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	ND	16	ng/L							
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	ND	16	ng/L							
Hexafluoropropylene oxide dimer acid (HFPO-DA)	ND	6.3	ng/L							
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	ND	6.3	ng/L							
9Cl-PF3ONS (F53B Minor)	ND	6.3	ng/L							
11Cl-PF3OUDS (F53B Major)	ND	6.3	ng/L							
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	ND	7.9	ng/L							
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	ND	39	ng/L							
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	ND	39	ng/L							
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	ND	3.2	ng/L							
Perfluoro-3-methoxypropanoic acid (PFMPA)	ND	3.2	ng/L							
Perfluoro-4-methoxybutanoic acid (PFMBA)	ND	3.2	ng/L							
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	ND	3.2	ng/L							
Surrogate: 13C4-PFBA	67.2		ng/L	78.79		85.3	5-130			Z-01
Surrogate: 13C5-PFPeA	36.0		ng/L	39.39		91.4	40-130			Z-01
Surrogate: 13C5-PFHxA	17.4		ng/L	19.70		88.5	40-130			Z-01
Surrogate: 13C4-PFHpA	17.8		ng/L	19.70		90.6	40-130			Z-01
Surrogate: 13C8-PFOA	18.4		ng/L	19.70		93.3	40-130			Z-01
Surrogate: 13C9-PFNA	8.84		ng/L	9.848		89.8	40-130			Z-01
Surrogate: 13C6-PFDA	8.76		ng/L	9.848		88.9	40-130			Z-01
Surrogate: 13C7-PFUnA	8.22		ng/L	9.848		83.5	30-130			Z-01
Surrogate: 13C2-PFDoA	7.48		ng/L	9.848		76.0	10-130			Z-01
Surrogate: 13C2-PFTeDA	7.33		ng/L	9.848		74.5	10-130			Z-01
Surrogate: 13C3-PFBS	18.0		ng/L	19.70		91.4	40-135			Z-01
Surrogate: 13C3-PFHxS	17.4		ng/L	19.70		88.5	40-130			Z-01
Surrogate: 13C8-PFOS	15.7		ng/L	19.70		79.6	40-130			
Surrogate: 13C2-4:2FTS	41.5		ng/L	39.39		105	40-200			Z-01
Surrogate: 13C2-6:2FTS	35.8		ng/L	39.39		91.0	40-200			Z-01
Surrogate: 13C2-8:2FTS	35.2		ng/L	39.39		89.3	40-300			Z-01
Surrogate: 13C8-PFOSA	18.0		ng/L	19.70		91.2	40-130			
Surrogate: D3-NMeFOSA	15.6		ng/L	19.70		79.1	10-130			
Surrogate: D5-NEtFOSA	15.6		ng/L	19.70		79.1	10-130			
Surrogate: D3-NMeFOSAA	36.5		ng/L	39.39		92.7	40-170			
Surrogate: D5-NEtFOSAA	33.2		ng/L	39.39		84.3	25-135			
Surrogate: D7-NMeFOSE	182		ng/L	197.0		92.5	10-130			
Surrogate: D9-NEtFOSE	177		ng/L	197.0		89.7	10-130			
Surrogate: 13C3-HFPO-DA	76.9		ng/L	78.79		97.6	40-130			Z-01
LCS (B404971-BS1)										
Prepared: 05/13/25 Analyzed: 05/14/25										
Perfluorobutanoic acid (PFBA)	81.0	6.3	ng/L	78.67		103	70-140			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B404971 - EPA 1633										
LCS (B404971-BS1)										
Prepared: 05/13/25 Analyzed: 05/14/25										
Perfluoropentanoic acid (PFPeA)	41.1	3.1	ng/L	39.34		104	65-135			
Perfluorohexanoic acid (PFHxA)	21.3	1.6	ng/L	19.67		108	70-145			
Perfluoroheptanoic acid (PFHpA)	20.9	1.6	ng/L	19.67		106	70-150			
Perfluorooctanoic acid (PFOA)	19.5	1.6	ng/L	19.67		99.4	70-150			
Perfluorononanoic acid (PFNA)	21.4	1.6	ng/L	19.67		109	70-150			
Perfluorodecanoic acid (PFDA)	21.1	1.6	ng/L	19.67		107	70-140			
Perfluoroundecanoic acid (PFUnA)	22.0	1.6	ng/L	19.67		112	70-145			
Perfluorododecanoic acid (PFDoA)	22.2	1.6	ng/L	19.67		113	70-140			
Perfluorotridecanoic acid (PFTrDA)	22.0	1.6	ng/L	19.67		112	65-140			
Perfluorotetradecanoic acid (PFTeDA)	22.0	1.6	ng/L	19.67		112	60-140			
Perfluorobutanesulfonic acid (PFBS)	17.3	1.6	ng/L	17.47		99.2	60-145			
Perfluoropentanesulfonic acid (PFPeS)	21.7	1.6	ng/L	18.49		117	65-140			
Perfluorohexanesulfonic acid (PFHxS)	20.7	1.6	ng/L	17.94		115	65-145			
Perfluoroheptanesulfonic acid (PFHpS)	19.6	1.6	ng/L	18.72		105	70-150			
Perfluorooctanesulfonic acid (PFOS)	19.5	1.6	ng/L	18.25		107	55-150			
Perfluorononanesulfonic acid (PFNS)	20.1	1.6	ng/L	18.88		107	65-145			
Perfluorodecanesulfonic acid (PFDS)	20.3	1.6	ng/L	18.96		107	60-145			
Perfluorododecanesulfonic acid (PFDoS)	19.4	1.6	ng/L	19.04		102	50-145			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	87.3	6.3	ng/L	73.72		118	70-145			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	89.0	6.3	ng/L	74.82		119	65-155			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	89.6	6.3	ng/L	75.53		119	60-150			
Perfluorooctanesulfonamide (PFOSA)	21.2	1.6	ng/L	19.67		108	70-145			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	20.4	1.6	ng/L	19.67		104	60-150			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	20.6	1.6	ng/L	19.67		105	65-145			
N-MeFOSAA (NMeFOSAA)	20.8	1.6	ng/L	19.67		106	50-140			
N-EtFOSAA (NEtFOSAA)	20.8	1.6	ng/L	19.67		106	70-145			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	209	16	ng/L	196.7		106	70-145			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	210	16	ng/L	196.7		107	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	82.6	6.3	ng/L	78.67		105	70-140			
4,8-Dioxo-3H-perfluorononanoic acid (ADONA)	80.1	6.3	ng/L	74.35		108	65-145			
9Cl-PF3ONS (F53B Minor)	86.4	6.3	ng/L	73.40		118	70-155			
11Cl-PF3OUDS (F53B Major)	88.5	6.3	ng/L	73.17		121	55-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	78.7	7.9	ng/L	98.34		80.0	65-130			
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA) (5:3FTCA)	525	39	ng/L	491.7		107	70-135			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	531	39	ng/L	491.7		108	50-145			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEA)	37.6	3.1	ng/L	35.09		107	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	37.3	3.1	ng/L	39.34		94.9	55-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	40.0	3.1	ng/L	39.34		102	60-150			
Nonafluoro-3,6-dioxahexanoic acid (NFDHA)	42.8	3.1	ng/L	39.34		109	50-150			
Surrogate: 13C4-PFBA	62.7		ng/L	78.67		79.7	5-130			
Surrogate: 13C5-PFPeA	32.1		ng/L	39.34		81.6	40-130			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B404971 - EPA 1633
LCS (B404971-BS1)

Prepared: 05/13/25 Analyzed: 05/14/25

Surrogate: 13C5-PFHxA	15.9		ng/L	19.67		80.6	40-130			
Surrogate: 13C4-PFHpA	15.5		ng/L	19.67		79.1	40-130			
Surrogate: 13C8-PFOA	15.6		ng/L	19.67		79.4	40-130			
Surrogate: 13C9-PFNA	7.35		ng/L	9.834		74.8	40-130			
Surrogate: 13C6-PFDA	7.81		ng/L	9.834		79.5	40-130			
Surrogate: 13C7-PFUnA	7.61		ng/L	9.834		77.3	30-130			
Surrogate: 13C2-PFDoA	7.17		ng/L	9.834		72.9	10-130			
Surrogate: 13C2-PFTeDA	6.69		ng/L	9.834		68.0	10-130			
Surrogate: 13C3-PFBS	17.1		ng/L	19.67		86.7	40-135			
Surrogate: 13C3-PFHxS	15.2		ng/L	19.67		77.4	40-130			
Surrogate: 13C8-PFOS	15.0		ng/L	19.67		76.1	40-130			
Surrogate: 13C2-4:2FTS	34.8		ng/L	39.34		88.6	40-200			
Surrogate: 13C2-6:2FTS	32.8		ng/L	39.34		83.4	40-200			
Surrogate: 13C2-8:2FTS	34.0		ng/L	39.34		86.3	40-300			
Surrogate: 13C8-PFOSA	15.7		ng/L	19.67		79.6	40-130			
Surrogate: D3-NMeFOSA	13.2		ng/L	19.67		67.0	10-130			
Surrogate: D5-NEtFOSA	13.1		ng/L	19.67		66.4	10-130			
Surrogate: D3-NMeFOSAA	34.4		ng/L	39.34		87.4	40-170			
Surrogate: D5-NEtFOSAA	34.4		ng/L	39.34		87.5	25-135			
Surrogate: D7-NMeFOSE	158		ng/L	196.7		80.3	10-130			
Surrogate: D9-NEtFOSE	154		ng/L	196.7		78.2	10-130			
Surrogate: 13C3-HFPO-DA	67.2		ng/L	78.67		85.5	40-130			

MRL Check (B404971-MRL1)

Prepared: 05/13/25 Analyzed: 05/14/25

Perfluorobutanoic acid (PFBA)	11.5	6.3	ng/L	12.58		91.4	70-140			
Perfluoropentanoic acid (PFPeA)	6.16	3.1	ng/L	6.289		97.9	65-135			
Perfluorohexanoic acid (PFHxA)	2.97	1.6	ng/L	3.144		94.6	70-145			
Perfluoroheptanoic acid (PFHpA)	2.99	1.6	ng/L	3.144		95.0	70-150			
Perfluorooctanoic acid (PFOA)	3.39	1.6	ng/L	3.144		108	70-150			
Perfluorononanoic acid (PFNA)	2.90	1.6	ng/L	3.144		92.1	70-150			
Perfluorodecanoic acid (PFDA)	2.76	1.6	ng/L	3.144		87.7	70-140			
Perfluoroundecanoic acid (PFUnA)	3.21	1.6	ng/L	3.144		102	70-145			
Perfluorododecanoic acid (PFDoA)	3.12	1.6	ng/L	3.144		99.4	70-140			
Perfluorotridecanoic acid (PFTTrDA)	3.46	1.6	ng/L	3.144		110	65-140			
Perfluorotetradecanoic acid (PFTeDA)	2.92	1.6	ng/L	3.144		92.7	60-140			
Perfluorobutanesulfonic acid (PFBS)	2.78	1.6	ng/L	2.792		99.6	60-145			
Perfluoropentanesulfonic acid (PFPeS)	3.03	1.6	ng/L	2.956		102	65-140			
Perfluorohexanesulfonic acid (PFHxS)	2.69	1.6	ng/L	2.868		94.0	65-145			
Perfluoroheptanesulfonic acid (PFHpS)	2.96	1.6	ng/L	2.993		99.0	70-150			
Perfluorooctanesulfonic acid (PFOS)	2.67	1.6	ng/L	2.918		91.4	55-150			
Perfluorononanesulfonic acid (PFNS)	3.02	1.6	ng/L	3.019		100	65-145			
Perfluorodecanesulfonic acid (PFDS)	2.97	1.6	ng/L	3.031		98.1	60-145			
Perfluorododecanesulfonic acid (PFDoS)	2.58	1.6	ng/L	3.044		84.8	50-145			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	12.2	6.3	ng/L	11.79		103	70-145			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	12.6	6.3	ng/L	11.96		105	65-155			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	14.7	6.3	ng/L	12.07		121	60-150			
Perfluorooctanesulfonamide (PFOSA)	3.45	1.6	ng/L	3.144		110	70-145			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	3.38	1.6	ng/L	3.144		108	60-150			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	3.04	1.6	ng/L	3.144		96.7	65-145			

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QUALITY CONTROL

Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B404971 - EPA 1633

MRL Check (B404971-MRL1)

Prepared: 05/13/25 Analyzed: 05/14/25

N-MeFOSAA (NMeFOSAA)	3.73	1.6	ng/L	3.144		119	50-140			
N-EtFOSAA (NEtFOSAA)	2.97	1.6	ng/L	3.144		94.4	70-145			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	30.4	16	ng/L	31.44		96.8	70-145			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	30.8	16	ng/L	31.44		98.0	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	11.8	6.3	ng/L	12.58		94.0	70-140			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	12.0	6.3	ng/L	11.89		101	65-145			
9Cl-PF3ONS (F53B Minor)	12.4	6.3	ng/L	11.73		106	70-155			
11Cl-PF3OUdS (F53B Major)	12.8	6.3	ng/L	11.70		110	55-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	11.6	7.9	ng/L	15.72		74.0	65-130			
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA)(5:3FTCA)	77.5	39	ng/L	78.61		98.6	70-135			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	75.3	39	ng/L	78.61		95.8	50-145			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEESA)	5.46	3.1	ng/L	5.610		97.4	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	5.40	3.1	ng/L	6.289		85.8	55-140			
Perfluoro-4-methoxybutanoic acid (PFMBA)	5.81	3.1	ng/L	6.289		92.4	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	6.40	3.1	ng/L	6.289		102	50-150			
Surrogate: 13C4-PFBA	88.1		ng/L	78.61		112	5-130			Z-01
Surrogate: 13C5-PFPeA	45.1		ng/L	39.30		115	40-130			Z-01
Surrogate: 13C5-PFHxA	22.8		ng/L	19.65		116	40-130			Z-01
Surrogate: 13C4-PFHpA	22.3		ng/L	19.65		113	40-130			Z-01
Surrogate: 13C8-PFOA	23.5		ng/L	19.65		119	40-130			Z-01
Surrogate: 13C9-PFNA	10.7		ng/L	9.826		109	40-130			Z-01
Surrogate: 13C6-PFDA	11.7		ng/L	9.826		119	40-130			Z-01
Surrogate: 13C7-PFUnA	11.5		ng/L	9.826		117	30-130			Z-01
Surrogate: 13C2-PFDoA	10.7		ng/L	9.826		109	10-130			Z-01
Surrogate: 13C2-PFTeDA	10.7		ng/L	9.826		109	10-130			Z-01
Surrogate: 13C3-PFBS	23.1		ng/L	19.65		118	40-135			Z-01
Surrogate: 13C3-PFHxS	22.0		ng/L	19.65		112	40-130			Z-01
Surrogate: 13C8-PFOS	21.7		ng/L	19.65		110	40-130			Z-01
Surrogate: 13C2-4:2FTS	50.6		ng/L	39.30		129	40-200			Z-01
Surrogate: 13C2-6:2FTS	47.0		ng/L	39.30		120	40-200			Z-01
Surrogate: 13C2-8:2FTS	44.4		ng/L	39.30		113	40-300			Z-01
Surrogate: 13C8-PFOA	19.2		ng/L	19.65		97.7	40-130			Z-01
Surrogate: D3-NMeFOSA	17.8		ng/L	19.65		90.5	10-130			Z-01
Surrogate: D5-NEtFOSA	17.6		ng/L	19.65		89.8	10-130			Z-01
Surrogate: D3-NMeFOSAA	48.2		ng/L	39.30		123	40-170			Z-01
Surrogate: D5-NEtFOSAA	45.8		ng/L	39.30		117	25-135			Z-01
Surrogate: D7-NMeFOSE	200		ng/L	196.5		102	10-130			Z-01
Surrogate: D9-NEtFOSE	194		ng/L	196.5		98.5	10-130			Z-01
Surrogate: 13C3-HFPO-DA	93.2		ng/L	78.61		119	40-130			Z-01

Matrix Spike (B404971-MS1)

Source: 25E0264-03RE1

Prepared: 05/13/25 Analyzed: 05/14/25

Perfluorobutanoic acid (PFBA)	82.0	6.3	ng/L	78.51	ND	104	70-140			
Perfluoropentanoic acid (PFPeA)	43.9	3.1	ng/L	39.25	ND	112	65-135			
Perfluorohexanoic acid (PFHxA)	21.2	1.6	ng/L	19.63	ND	108	70-145			
Perfluoroheptanoic acid (PFHpA)	20.4	1.6	ng/L	19.63	ND	104	70-150			

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B404971 - EPA 1633										
Matrix Spike (B404971-MS1)	Source: 25E0264-03RE1			Prepared: 05/13/25 Analyzed: 05/14/25						
Perfluorooctanoic acid (PFOA)	19.5	1.6	ng/L	19.63	ND	99.4	70-150			
Perfluorononanoic acid (PFNA)	20.9	1.6	ng/L	19.63	ND	106	70-150			
Perfluorodecanoic acid (PFDA)	22.2	1.6	ng/L	19.63	ND	113	70-140			
Perfluoroundecanoic acid (PFUnA)	23.0	1.6	ng/L	19.63	ND	117	70-145			
Perfluorododecanoic acid (PFDoA)	22.5	1.6	ng/L	19.63	ND	115	70-140			
Perfluorotridecanoic acid (PFTrDA)	24.2	1.6	ng/L	19.63	ND	123	65-140			
Perfluorotetradecanoic acid (PFTeDA)	22.5	1.6	ng/L	19.63	ND	115	60-140			
Perfluorobutanesulfonic acid (PFBS)	18.1	1.6	ng/L	17.43	ND	104	60-145			
Perfluoropentanesulfonic acid (PFPeS)	20.2	1.6	ng/L	18.45	ND	109	65-140			
Perfluorohexanesulfonic acid (PFHxS)	17.5	1.6	ng/L	17.90	ND	97.9	65-145			
Perfluoroheptanesulfonic acid (PFHpS)	19.2	1.6	ng/L	18.69	ND	103	70-150			
Perfluorooctanesulfonic acid (PFOS)	19.2	1.6	ng/L	18.21	1.23	98.4	55-150			
Perfluorononanesulfonic acid (PFNS)	18.7	1.6	ng/L	18.84	ND	99.2	65-145			
Perfluorodecanesulfonic acid (PFDS)	16.5	1.6	ng/L	18.92	ND	87.4	60-145			
Perfluorododecanesulfonic acid (PFDoS)	18.1	1.6	ng/L	19.00	ND	95.2	50-145			
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	86.2	6.3	ng/L	73.56	ND	117	70-145			
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	89.0	6.3	ng/L	74.66	ND	119	65-155			
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	90.0	6.3	ng/L	75.37	ND	119	60-150			
Perfluorooctanesulfonamide (PFOSA)	21.3	1.6	ng/L	19.63	ND	109	70-145			
N-methyl perfluorooctanesulfonamide (NMeFOSA)	22.1	1.6	ng/L	19.63	ND	113	60-150			
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	22.2	1.6	ng/L	19.63	ND	113	65-145			
N-MeFOSAA (NMeFOSAA)	20.9	1.6	ng/L	19.63	ND	106	50-140			
N-EtFOSAA (NEtFOSAA)	21.4	1.6	ng/L	19.63	ND	109	70-145			
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	219	16	ng/L	196.3	ND	111	70-145			
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	215	16	ng/L	196.3	ND	110	70-135			
Hexafluoropropylene oxide dimer acid (HFPO-DA)	86.5	6.3	ng/L	78.51	ND	110	70-140			
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	81.1	6.3	ng/L	74.19	ND	109	65-145			
9Cl-PF3ONS (F53B Minor)	79.5	6.3	ng/L	73.25	ND	109	70-155			
11Cl-PF3OUdS (F53B Major)	76.8	6.3	ng/L	73.01	ND	105	55-160			
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	91.7	7.9	ng/L	98.14	ND	93.5	65-130			
2H,2H,3H,3H-Perfluorooctanoic acid(FPePA)(5:3FTCA)	541	39	ng/L	490.7	ND	110	70-135			
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	551	39	ng/L	490.7	ND	112	50-145			
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEsA)	39.7	3.1	ng/L	35.02	ND	113	70-140			
Perfluoro-3-methoxypropanoic acid (PFMPA)	38.2	3.1	ng/L	39.25	ND	97.4	55-140			
Perfluoro-4-methoxybutanoic acid (PFMBa)	44.2	3.1	ng/L	39.25	ND	113	60-150			
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	37.8	3.1	ng/L	39.25	ND	96.3	50-150			
Surrogate: 13C4-PFBA	79.9		ng/L	78.51		102	5-130			Z-01
Surrogate: 13C5-PFPeA	38.3		ng/L	39.25		97.7	40-130			Z-01
Surrogate: 13C5-PFHxA	21.0		ng/L	19.63		107	40-130			Z-01
Surrogate: 13C4-PFHpA	20.4		ng/L	19.63		104	40-130			Z-01
Surrogate: 13C8-PFOA	22.1		ng/L	19.63		112	40-130			Z-01

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QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B404971 - EPA 1633
Matrix Spike (B404971-MS1)
Source: 25E0264-03RE1

Prepared: 05/13/25 Analyzed: 05/14/25

Surrogate: 13C9-PFNA	10.4		ng/L	9.814		106	40-130			Z-01
Surrogate: 13C6-PFDA	9.66		ng/L	9.814		98.4	40-130			Z-01
Surrogate: 13C7-PFUnA	9.09		ng/L	9.814		92.6	30-130			Z-01
Surrogate: 13C2-PFDoA	8.21		ng/L	9.814		83.7	10-130			Z-01
Surrogate: 13C2-PFTeDA	8.02		ng/L	9.814		81.7	10-130			Z-01
Surrogate: 13C3-PFBS	21.3		ng/L	19.63		108	40-135			Z-01
Surrogate: 13C3-PFHxS	20.5		ng/L	19.63		104	40-130			Z-01
Surrogate: 13C8-PFOS	20.0		ng/L	19.63		102	40-130			Z-01
Surrogate: 13C2-4:2FTS	34.1		ng/L	39.25		86.8	40-200			Z-01
Surrogate: 13C2-6:2FTS	40.1		ng/L	39.25		102	40-200			Z-01
Surrogate: 13C2-8:2FTS	45.5		ng/L	39.25		116	40-300			Z-01
Surrogate: 13C8-PFOSA	19.4		ng/L	19.63		99.0	40-130			Z-01
Surrogate: D3-NMeFOSA	14.9		ng/L	19.63		75.9	10-130			Z-01
Surrogate: D5-NEtFOSA	14.2		ng/L	19.63		72.2	10-130			Z-01
Surrogate: D3-NMeFOSAA	30.3		ng/L	39.25		77.3	40-170			Z-01
Surrogate: D5-NEtFOSAA	26.6		ng/L	39.25		67.9	25-135			Z-01
Surrogate: D7-NMeFOSE	158		ng/L	196.3		80.7	10-130			Z-01
Surrogate: D9-NEtFOSE	153		ng/L	196.3		77.9	10-130			Z-01
Surrogate: 13C3-HFPO-DA	87.7		ng/L	78.51		112	40-130			Z-01

Matrix Spike Dup (B404971-MSD1)
Source: 25E0264-03RE1

Prepared: 05/13/25 Analyzed: 05/14/25

Perfluorobutanoic acid (PFBA)	77.6	5.8	ng/L	72.11	ND	108	70-140	5.46	25	
Perfluoropentanoic acid (PFPeA)	40.6	2.9	ng/L	36.06	ND	113	65-135	7.77	25	
Perfluorohexanoic acid (PFHxA)	20.4	1.4	ng/L	18.03	ND	113	70-145	3.88	25	
Perfluoroheptanoic acid (PFHpA)	20.3	1.4	ng/L	18.03	ND	113	70-150	0.426	25	
Perfluorooctanoic acid (PFOA)	19.9	1.4	ng/L	18.03	ND	110	70-150	1.72	25	
Perfluorononanoic acid (PFNA)	19.4	1.4	ng/L	18.03	ND	107	70-150	7.43	25	
Perfluorodecanoic acid (PFDA)	21.2	1.4	ng/L	18.03	ND	117	70-140	4.68	25	
Perfluoroundecanoic acid (PFUnA)	21.0	1.4	ng/L	18.03	ND	117	70-145	8.90	25	
Perfluorododecanoic acid (PFDoA)	22.6	1.4	ng/L	18.03	ND	125	70-140	0.495	25	
Perfluorotridecanoic acid (PFTTrDA)	23.6	1.4	ng/L	18.03	ND	131	65-140	2.70	25	
Perfluorotetradecanoic acid (PFTeDA)	21.8	1.4	ng/L	18.03	ND	121	60-140	3.04	25	
Perfluorobutanesulfonic acid (PFBS)	17.9	1.4	ng/L	16.01	ND	112	60-145	0.859	25	
Perfluoropentanesulfonic acid (PFPeS)	19.6	1.4	ng/L	16.95	ND	116	65-140	2.58	25	
Perfluorohexanesulfonic acid (PFHxS)	18.8	1.4	ng/L	16.44	ND	115	65-145	7.22	25	
Perfluoroheptanesulfonic acid (PFHpS)	20.2	1.4	ng/L	17.16	ND	118	70-150	5.11	25	
Perfluorooctanesulfonic acid (PFOS)	18.9	1.4	ng/L	16.73	1.23	106	55-150	1.13	25	
Perfluorononanesulfonic acid (PFNS)	18.6	1.4	ng/L	17.31	ND	108	65-145	0.366	25	
Perfluorodecanesulfonic acid (PFDS)	17.1	1.4	ng/L	17.38	ND	98.1	60-145	3.05	25	
Perfluorododecanesulfonic acid (PFDoS)	15.7	1.4	ng/L	17.45	ND	90.1	50-145	14.0	25	
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2FTS)	79.6	5.8	ng/L	67.57	ND	118	70-145	7.95	25	
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2FTS)	89.7	5.8	ng/L	68.58	ND	131	65-155	0.773	25	
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2FTS)	91.0	5.8	ng/L	69.23	ND	131	60-150	1.15	25	
Perfluorooctanesulfonamide (PFOSA)	21.1	1.4	ng/L	18.03	ND	117	70-145	0.918	25	
N-methyl perfluorooctanesulfonamide (NMeFOSA)	22.8	1.4	ng/L	18.03	ND	126	60-150	2.97	25	
N-ethyl perfluorooctanesulfonamide (NEtFOSA)	22.3	1.4	ng/L	18.03	ND	124	65-145	0.206	25	
N-MeFOSAA (NMeFOSAA)	22.5	1.4	ng/L	18.03	ND	125	50-140	7.41	25	
N-EtFOSAA (NEtFOSAA)	21.6	1.4	ng/L	18.03	ND	120	70-145	0.818	25	

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

QUALITY CONTROL
Semivolatile Organic Compounds by - LC/MS-MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B404971 - EPA 1633										
Matrix Spike Dup (B404971-MSD1)	Source: 25E0264-03RE1			Prepared: 05/13/25 Analyzed: 05/14/25						
N-methylperfluorooctanesulfonamidoethanol (NMeFOSE)	213	14	ng/L	180.3	ND	118	70-145	2.63	25	
N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	209	14	ng/L	180.3	ND	116	70-135	2.88	25	
Hexafluoropropylene oxide dimer acid (HFPO-DA)	80.6	5.8	ng/L	72.11	ND	112	70-140	6.98	25	
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	78.6	5.8	ng/L	68.15	ND	115	65-145	3.03	25	
9Cl-PF3ONS (F53B Minor)	81.3	5.8	ng/L	67.28	ND	121	70-155	2.30	25	
11Cl-PF3OUDS (F53B Major)	73.1	5.8	ng/L	67.07	ND	109	55-160	5.01	25	
3-Perfluoropropyl propanoic acid (FPrPA) (3:3FTCA)	84.7	7.2	ng/L	90.14	ND	94.0	65-130	7.97	25	
2H,2H,3H,3H-Perfluorooctanoic acid (FPePA) (5:3FTCA)	564	36	ng/L	450.7	ND	125	70-135	4.06	25	
3-Perfluoroheptyl propanoic acid (FHpPA) (7:3FTCA)	572	36	ng/L	450.7	ND	127	50-145	3.89	25	
Perfluoro(2-ethoxyethane)sulfonic acid (PFEEESA)	38.5	2.9	ng/L	32.16	ND	120	70-140	3.18	25	
Perfluoro-3-methoxypropanoic acid (PFMPA)	37.5	2.9	ng/L	36.06	ND	104	55-140	2.02	25	
Perfluoro-4-methoxybutanoic acid (PFMBA)	40.8	2.9	ng/L	36.06	ND	113	60-150	7.92	25	
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	37.6	2.9	ng/L	36.06	ND	104	50-150	0.491	25	
Surrogate: 13C4-PFBA	60.8		ng/L	72.11		84.4	5-130			
Surrogate: 13C5-PFPeA	30.6		ng/L	36.06		84.9	40-130			
Surrogate: 13C5-PFHxA	16.0		ng/L	18.03		88.9	40-130			
Surrogate: 13C4-PFHpA	15.9		ng/L	18.03		88.1	40-130			
Surrogate: 13C8-PFOA	16.1		ng/L	18.03		89.1	40-130			
Surrogate: 13C9-PFNA	7.37		ng/L	9.014		81.7	40-130			
Surrogate: 13C6-PFDA	6.69		ng/L	9.014		74.2	40-130			
Surrogate: 13C7-PFUnA	6.32		ng/L	9.014		70.1	30-130			
Surrogate: 13C2-PFDoA	5.19		ng/L	9.014		57.6	10-130			
Surrogate: 13C2-PFTeDA	5.46		ng/L	9.014		60.5	10-130			
Surrogate: 13C3-PFBS	16.0		ng/L	18.03		88.6	40-135			
Surrogate: 13C3-PFHxS	15.7		ng/L	18.03		87.3	40-130			
Surrogate: 13C8-PFOS	13.8		ng/L	18.03		76.7	40-130			
Surrogate: 13C2-4:2FTS	27.3		ng/L	36.06		75.8	40-200			
Surrogate: 13C2-6:2FTS	27.5		ng/L	36.06		76.2	40-200			
Surrogate: 13C2-8:2FTS	28.2		ng/L	36.06		78.1	40-300			
Surrogate: 13C8-PFOSA	15.0		ng/L	18.03		83.0	40-130			
Surrogate: D3-NMeFOSA	11.6		ng/L	18.03		64.4	10-130			
Surrogate: D5-NEtFOSA	11.4		ng/L	18.03		63.4	10-130			
Surrogate: D3-NMeFOSAA	20.7		ng/L	36.06		57.3	40-170			
Surrogate: D5-NEtFOSAA	20.2		ng/L	36.06		56.1	25-135			
Surrogate: D7-NMeFOSE	124		ng/L	180.3		69.0	10-130			
Surrogate: D9-NEtFOSE	119		ng/L	180.3		66.0	10-130			
Surrogate: 13C3-HFPO-DA	67.6		ng/L	72.11		93.7	40-130			

FLAG/QUALIFIER SUMMARY

*	QC result is outside of established limits.
†	Wide recovery limits established for difficult compound.
‡	Wide RPD limits established for difficult compound.
#	Data exceeded client recommended or regulatory level
ND	Not Detected
RL	Reporting Limit is at the level of quantitation (LOQ)
DL	Detection Limit is the lower limit of detection determined by the MDL study
MCL	Maximum Contaminant Level
	Percent recoveries and relative percent differences (RPDs) are determined by the software using values in the calculation which have not been rounded.
	No results have been blank subtracted unless specified in the case narrative section.
D-01	Sample extracted/prepared at a dilution due to sample matrix.
J	Detected but below the Reporting Limit (lowest calibration standard); therefore, result is an estimated concentration (CLP J-Flag).
L-03	Laboratory fortified blank/laboratory control sample recovery is outside of control limits. Reported value for this compound is likely to be biased on the low side.
PF-18	Re-analysis confirmed Extracted Internal Standard failure due to matrix effects.
PF-23	Qualifier ion ratio <50% of associated calibration. Detection is suspect.
PF-24	Non-extracted internal standard compound recovery <50%. Re-extracted sample exhibited similar results.
S-29	Possible high bias present on associated extracted internal standard recoveries Extracted Internal Standard is outside of control limits.
V-06	Continuing calibration verification (CCV) did not meet method specifications and was biased on the high side for this compound.
V-20	Continuing calibration verification (CCV) did not meet method specifications and was biased on the high side. Data validation is not affected since sample result was "not detected" for this compound.
Z-01	Non-extracted internal standard compound recovery <50%. Possible high bias present on associated extracted internal standard recoveries.



Pace Analytical Services, LLC - East Longmeadow, Ma

39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

CERTIFICATIONS

Certified Analyses included in this Report

Analyte	Certifications
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No certified Analyses included in this Report

Pace Analytical Services, LLC - East Longmeadow, Ma, operates under the following certifications and accreditations:

Code	Description	Number	Expires
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Phone: 612-607-6400
Fax: 612-607-6344

<https://www.pacelabs.com/>

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1800 Elm Street SE
Minneapolis, MN 55414

Page 1 of 1

Contact: <https://www.pacelabs.com/contact-us/contact-environmental-sciences/>

Company Name: LaBella Associates
Address: 5 McCrea Hill Road, Ballston Spa, NY 12020
Phone: 838-946-5114
Project Name: NYSDEC Richard L Hanson FTC
Project Location: Mohawk, NY
Pace Callout ID: 152879 **Site Number:** B00138
Project Manager: S. Vaverchak / E. Kopper (NYSDEC)
Pace Analytical Quote Name/Number:
Invoice Recipient: NYSDEC
Sampled By: Lindsay Mcbrath

CHAIN OF CUSTODY RECORD (New York)

Requested Turnaround Time
7-Day ☐ 10-Day ☐
Due Date: Standard TAT ☒
Rush-Approval Required
1-Day ☐ 3-Day ☐
2-Day ☐ 4-Day ☐
Data Delivery
Format: PDF ☒ EXCEL ☒
Other:
CLP Like Data Pkg Required: ☐
Email To: See Comments
Fax To #:

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Requested Turnaround Time							Rush-Approval Required							Data Delivery								
7-Day	☐	10-Day	☐	1-Day	☐	3-Day	☐	2-Day	☐	4-Day	☐	Format:	PDF	☒	EXCEL	☒	Other:	CLP Like Data Pkg Required:	☐	Email To:	See Comments	Fax To #:
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	DC#_Title: ENV-FRM-ELON-0001 v08_Sample Receiving Checklist
	Effective Date: 06/11/2024

Log In Back-Sheet

Login Sample Receipt Checklist – (Rejection Criteria Listing
– Using Acceptance Policy) Any False statement will be
brought to the attention of the Client – True or False

Client La Bella
 Project Richard L. Hanson FTC
 MCP/RCP Required NA
 Deliverable Package Requirement CAT B
 Location NY
 PWSID# (When Applicable) NA
 Arrival Method:
 Courier ☒ Fed Ex ☐ Walk In ☐ Other ☐
 Received By / Date / Time LA 4/30/25 200
 Back-Sheet By / Date / Time gn 5/5/25 1122
 Temperature Method gun # 6
 WV samples: Yes (see note 1) / No (follow normal procedure) No
 Temp < 6° C Actual Temperature 2.3, 2.5
 Rush Samples: Yes / No / Notify No
 Short Hold: Yes / No / Notify No

	True	False
Received on Ice	☒	☐
Received in Cooler	☒	☐
Custody Seal: DATE TIME	☐	☒
COC Relinquished	☒	☐
COC/Samples Labels Agree	☒	☐
All Samples in Good Condition	☒	☐
Samples Received within Holding Time	☒	☐
Is there enough Volume	☒	☐
Proper Media/Container Used	☒	☐
Splitting Samples Required	☐	☒
MS/MSD	☒	☐
Trip Blanks	☐	☒
Lab to Filters	☐	☒
COC Legible	☒	☐
COC Included: (Check all included)		
Client ☒ Analysis ☒ Sampler Name ☒		
Project ☒ IDs ☒ Collection Date/Time ☒		

All Samples Proper pH: N/A ☐ ☐

Notes regarding Samples/COC outside of SOP:

Additional Container Notes

*Note: West Virginia requires all samples to have their
temperature taken. Note any outliers.

[illegible]