



PRECISION
ENVIRONMENTAL SERVICES, INC.

831 RT. 67, LOT 38 A
BALLSTON SPA, NY 12020
TEL: 518-885-4399
FAX: 518-885-4416

CERTIFIED WOMEN-OWNED BUSINESS ENTERPRISE



Via Electronic Mail: heidi.dudek@dec.ny.gov

May 10, 2019

Heidi-Marie Dudek, P.E.
Project Manager
Division of Environmental Remediation
NYS Department of Environmental Conservation
625 Broadway, Albany, NY 12233

**Re: Groundwater Sampling Report of Findings
Granite Pointe Subdivision – OFF SITE
144 Route 118
Somers, New York
NYSDEC Site No: C360107A**

Dear Ms. Dudek;

This letter serves as the report of findings for Groundwater Monitoring and Sampling conducted at the above referenced site on October 31st, 2018. The attached Figure 1 provides site location details. Activities consisted of developing, gauging, purging, monitoring parameters and sampling of 3 accessible and functioning monitoring wells for Perfluorinated Alkyl Substances via Method 537 Modified and 1,4 Dioxane via method 8270 SIM.

1.0 Well Development and Gauging Summary:

The three (3) monitoring wells: MW-1AR, MW-2R and MW-3R, which were recently installed by others, were developed on October 31st, 2018 using mechanical methods with a surge block. Well location detail has been included in the attached Figure 2. Each well was also gauged to determine the depth to groundwater at each location. The observed depth to water measurements ranged from 7.50-feet to 14.46-feet (as measured from top of casing). Groundwater elevations were determined by subtracting the depth to groundwater from each well's respective top of casing elevation. The calculated groundwater elevations within surveyed wells ranged from 399.02 to 403.08-feet. The well gauging data for the event is summarized in the attached Table 1 (Groundwater Monitoring Well Gauging Data). *Note: Top of Casing height was determined using a well construction report provided to PES by ARCADIS.*

2.0 Groundwater Sampling Protocols and Laboratory Analytical Results:

Following development each well was purged using low flow methods until a minimum of three well volumes was removed or when equilibrium was reached with respect to the following physical parameter: including pH, Temperature, Total Dissolved Solids, Dissolved Oxygen, Turbidity, Oxidation Reduction Potential and Conductivity. Purging was completed using dedicated high-density polyethylene (HDPE) tubing and a peristaltic pump. Following purge, the wells were allowed to recharge and sampled for laboratory analysis by Method 537 Modified and 8270 SIM. Purge water was containerized in a 55-gallon drum and stored

at the site. A sample of the drum contents was collected for site specific contaminants (lead) via method 6010D - Metals for future disposal consideration.

All stabilized physical parameters were recorded prior to sampling (see attached Table 2 - Summary of Physical Field Parameters for details). PFAS samples were collected under both NYSDEC Sampling Guidelines and Protocols and PFC Groundwater Samples from Monitoring Wells Sample Protocol, which includes but is not limited to the use of HDPE or Polypropylene bottles, separate coolers, HDPE tubing, nitrile gloves and non-waterproof clothing. Please see PFAs Sampling Checklist in Attachment 1 for additional details. 1,4 Dioxane samples were obtained by aseptic techniques, placed into clean glassware provided by the analytical laboratory, labeled, and placed on iced storage for subsequent submission under chain of custody to TestAmerica Laboratories, Inc.

The data report provided by TestAmerica, which has been included as Attachment 2, for the samples submitted in October 31st, 2018 is equivalent to an Analytical Services Protocol Category B deliverable package. As such, a Data Usability Summary Report, which was prepared by an independent third party, has been generated. There are no data that were qualified as either estimated (J) or rejected, unusable (R) in the data pack. Please see Attachment 3 - Data Usability Summary Report for detail.

Table 3 includes a summary of laboratory analytical results for the 8270 SIM analysis. As shown in this table, 1,4 Dioxane was not detected in any of the sampled wells.

As the attached Table 4 indicates, all sampled monitoring wells contained constituents of concern above laboratory detection limits for analysis 537 Modified.

There currently are no published groundwater standards for PFAS compounds. However, the NYSDEC does have internal screening values of 10 parts per trillion (ppt) for PFOA and PFOS each respectively. There are also screening values of 100 ppt for other individual PFAS compounds along with a screening value of 500 ppt for the total sum of all PFAS family compounds present. Of the three (3) groundwater well samples none demonstrated concentrated of PFAS compounds in exceedance of any internal screening values.

In addition, and for comparative purposes, the EPA drinking water standard of 70 parts per trillion for individual and combined concentrations of PFAS compounds can be used. The EPA has established the health advisory level at 70 parts per trillion (ppt) or nanograms per liter (ng/l) for a lifetime exposure to PFAS substances. None of the three (3) wells had PFAS sample concentrations reported with individual or combined PFAS of greater than 70 parts per trillion.

3.0 Discussion

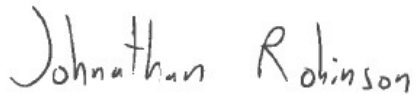
On October 31st, 2018 groundwater monitoring and sampling occurred at the subject site. The event consisted of developing, gauging, purging, monitoring parameters and sampling of three (3) onsite monitoring wells for Perfluorinated Alkyl Substances via Method 537 Modified and 1,4 Dioxane via method 8270 SIM. Each well was purged of a minimum of three well volumes or when equilibrium was reached with respect to physical parameter values. Wells were allowed to recharge to equilibration prior to sampling.

All sampled monitoring wells (3) reported PFAS concentrations above the laboratory minimum detection limits. PFOA and PFOS combined compounds ranged from 0.89 ppt (MW-3R) to 58.10 (MW-1A). Of these three wells, none (0) contained a combined concentration of PFOS and PFAS above the EPA health advisory level of 70 parts per trillion for drinking water. Of these three wells none (0) exceeded screening levels established by NYSDEC. All wells reported Non Detect for the 8270 SIM analysis for 1,4 Dioxane.

If you have any questions or comments regarding the above information, please contact the undersigned at (518) 885-4399.

Sincerely;

Precision Environmental Services, Inc.



John Robinson
Project Manager / Environmental Scientist



Stephen M. Phelps, P.G.
Operations Manager

FIGURES

Figure 1 – Site Map

Figure 2 – Well Location Map

TABLES

Table 1 – Groundwater Monitoring Well Gauging Data

Table 2 – Field Parameters

Table 3 – Summary of Groundwater Analytical Results: 1,4-Dioxane

Table 4 – Summary of Groundwater Analytical Results: PFAS

ATTACHMENTS

Attachment 1 – PFAS Sampling Checklist

Attachment 2 – Laboratory Results

Attachment 3 – DUSR Report

FIGURES



Image Courtesy of Google Earth



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ENVIRONMENTAL SERVICES, INC.
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TEL: 518-885-4399
FAX: 518-885-4416

Granite Pointe Subdivision - OFFSITE

Site Location

Location: 144 Route 118, Somers, NY

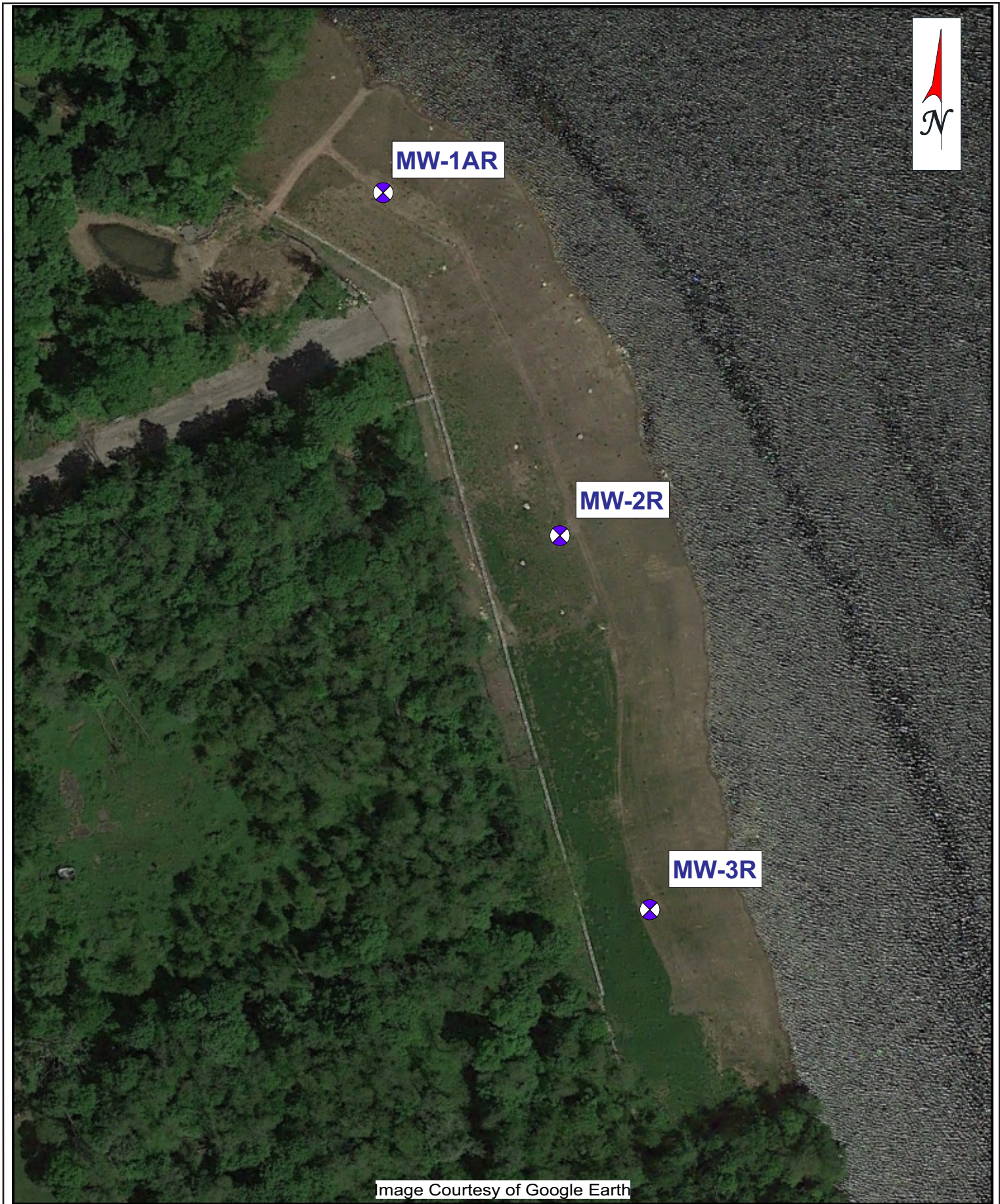
Client: NYSDEC Central Offices

Drawn By: John Robinson

Date: October 31, 2018

Scale: NTS

Figure: 1



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BALLSTON SPA, NY 12020
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Granite Pointe Subdivision - OFFSITE

Monitoring Well Location

Location: 144 Route 118, Somers, NY

Client: NYSDEC Central Offices

Drawn By: John Robinson

Date: October 31, 2018

Scale: NTS

Figure: 2

TABLES

Granite Pointe Subdivision - OFFSITE

144 Route 118, Somers NY

NYSDEC Site No.: C360107A

Groundwater Monitoring Well Gauging Data

Table 1

Well	Top of Casing	Measured Depth to Water	Measured Depth to Bottom	Relative GW Elevation
MW-1AR	410.568	9.65	22.32	400.92
MW-2R	410.900	11.88	22.98	399.02
MW-3R	410.576	7.50	22.48	403.08
Date of gauging event - October 31st, 2018				
Elevations as reported by Arcadis in Appendix C of Previous Study				

Granite Pointe Subdivision - OFFSITE
144 Route 118, Somers NY
NYSDEC Site No.: C360107A

Field Parameters

Table 2

Groundwater Analytical Summary			
Parameter	Sample Designation		
	MW-1AR	MW-2R	MW-3R
pH	7.43	7.09	7.16
Temp (°C)	17.79	17.41	17.21
TDS (g/l)	0.503	0.298	0.393
Disolved Oxygen (mg/L)	90.1	0.0	1.3
Turbidity (NTU)	44.2	48.2	42.3
ORP (mV)	-6	4	7
Conductivity (mS/cm)	0.786	0.451	0.612
NOTES:			
- Parameters observed prior to sampling			
- NA = No parameters taken (metal only samples)			
- DMG = Well damaged, no samples or parameters taken			
- Samples obtained on October 31st, 2018			

Granite Pointe Subdivision - OFFSITE
144 Route 118, Somers NY
NYSDEC Site No.: C360107A

Summary of Groundwater Analytical Results: 1,4-Dioxane

Table 3

Compound	MW-1AR	MW-2R	MW-3R	NYSDEC Proposed MCL
Method: 8270D SIM	10/31/2018	10/31/2018	10/31/2018	
1,4-Dioxane	ND	ND	ND	1.0 ppb
NOTES: - All results reported in ug/L (Parts per billion) - Analysis performed by TestAmerica Environmental Laboratories, Inc via Eurofins Lancaster Laboratory - R = Data Validation Flag. Data is considered Un-usable due to very low spike recoveries - ND = Not Detected above method detection limit (0.20 ppb)				

Compound	Site Sample Locations			Quality Control Samples			NYSDEC Internal Screening Levels (Until EC Standards are Finalized)
	MW-1AR	MW-2R	MW-3R	Duplicate	Field Blank	Equipment Blank	
Sample Date	10/31/2018	10/31/2018	10/31/2018	10/31/2018	10/31/2018	10/31/2018	
Perfluorinated Alkyl Substances (Method 537, 1.1 Modified)							
6:2-Fts	ND	ND	ND	ND	ND	ND	100
8:2-Fts	ND	ND	ND	ND	ND	ND	100
N-ethyl perfluorooctanesulfonamidoacetic Acid (NEtFOSAA)	ND	ND	ND	ND	ND	ND	100
N-methyl perfluorooctanesulfonamidoacetic Acid (NMeFOSAA)	ND	ND	ND	ND	ND	ND	100
Perfluorobutanesulfonic Acid (PFBS)	1.4	ND	ND	ND	ND	ND	100
Perfluorobutanoic Acid (PFBA)	31	ND	ND	ND	ND	ND	100
Perfluorodecanesulfonic acid (PFDS)	ND	ND	ND	ND	ND	ND	100
Perfluorodecanoic acid (PFDA)	ND	ND	ND	ND	ND	ND	100
Perfluorododecanoic acid (PFDoA)	ND	ND	ND	ND	ND	ND	100
Perfluoroheptanesulfonic Acid (PFHpS)	ND	ND	ND	ND	ND	ND	100
Perfluoroheptanoic acid (PFHpA)	3.3	0.28	ND	0.3	ND	ND	100
Perfluorohexanesulfonic acid (PFHxS)	ND	ND	ND	0.23	ND	ND	100
Perfluorohexanoic acid (PFHxA)	6.9	1.3	0.22	0.7	ND	ND	100
Perfluorononanoic acid (PFNA)	ND	ND	ND	ND	ND	ND	100
Perfluorooctanesulfonamide (FOSA)	ND	ND	ND	ND	ND	ND	100
Perfluorooctanesulfonate Acid (PFOS)	ND	ND	ND	0.64	ND	ND	10
Perfluorooctanoic acid (PFOA)	4.5	0.91	0.47	1.2	0.26	ND	10
Perfluoropentanoic acid (PFPeA)	11	ND	ND	ND	ND	ND	100
Perfluorotetradecanoic acid (PFTeA)	ND	ND	ND	ND	ND	ND	100
Perfluorotridecanoic ((PFTriA)	ND	ND	ND	ND	ND	ND	100
Perfluoroundecanoic acid (PFUnA)	ND	0.2	0.2	0.27	ND	0.29	100
EPA Health Advisory Level for Drinking Water (For Comparision, Combined PFOS and PFOA)	4.50	0.91	0.47	1.84	0.26	0.00	70.00 PPT
Total PFAS (incl. PFOA/PFOS)	58.10	2.69	0.89	3.34	0.26	0.29	500.00 PPT
NOTES:							
- All results reported in ng/L (Parts Per Trillion, PPT)							
- Highlighted Sections equal values above NYSDEC's Internal "Screening Levels"							
- ND = Not Detected above method detection limit							

ATTACHMENT - 1

PFCs Sampling Checklist

Date: 10/31/2018

Weather (temp./precipitation): FAIRLY CLOUDY, ~70°F Site Name: GRANITE POINT PFOA

Field Clothing and PPE:

- ☒ No clothing or boots containing Gore-Tex™
- ☒ All safety boots made from polyurethane and PVC
- ☒ No materials containing Tyvek®
- ☒ Field crew has not used fabric softener on clothing
- ☒ Field crew has not used cosmetics, moisturizers, hand cream, or other related products this morning
- ☒ Field crew has not applied unauthorized sunscreen or insect repellent

Field Equipment:

- ☒ No Teflon® or LDPE containing materials on-site
- ☒ All sample materials made from stainless steel, HDPE, acetate, silicon, or polypropylene
- ☒ No waterproof field books on-site
- ☒ No plastic clipboards, binders, or spiral hard cover notebooks on-site
- ☒ No adhesives (Post-It Notes) on-site

- ☒ Coolers filled with regular ice only. No chemical (blue) ice packs in possession

Sample Containers:

- ☒ All sample containers made of HDPE or polypropylene
- ☒ Caps are unlined and made of HDPE or polypropylene

Wet Weather (as applicable):

- ☒ Wet weather gear made of polyurethane and PVC only

Equipment Decontamination:

- ☒ "PFC-free" water on-site for decontamination of sample equipment. No other water sources to be used.
- ☒ Alconox and Liquinox to be used as decontamination materials

Food Considerations:

- ☒ No food or drink on-site with exception of bottled water and/or hydration drinks (i.e., Gatorade and Powerade) that is available for consumption only in the staging area

If any applicable boxes cannot be checked, the Field Lead shall describe the noncompliance issues below and work with field personnel to address noncompliance issues prior to commencement of that day's work. Corrective action shall include removal of noncompliance items from the site or removal of worker offsite until in compliance.

Describe the noncompliance issues (include personnel not in compliance) and action/outcome of noncompliance:

100% COMPLIANCE, NO ISSUES

Field Lead Name: JOHNATHAN ROBINSON

Field Lead Signature: Jonathan M Robinson Time: 9:30 AM

ATTACHMENT - 2

ANALYTICAL REPORT

TestAmerica Laboratories, Inc.

TestAmerica Burlington

30 Community Drive

Suite 11

South Burlington, VT 05403

Tel: (802)660-1990

TestAmerica Job ID: 200-46033-1

Client Project/Site: Granite Pte Subdiv-Off Site #C360107A

For:

New York State D.E.C.

625 Broadway

11th Floor

Albany, New York 12233-3256

Attn: Ms. Heide-Marie Dudek



Authorized for release by:

11/19/2018 11:16:02 AM

Judy Stone, Senior Project Manager

(484)685-0868

judy.stone@testamericainc.com

LINKS

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www.testamericainc.com

The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

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Definitions/Glossary

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Qualifiers

GC/MS Semi VOA

Qualifier	Qualifier Description
F1	MS and/or MSD Recovery is outside acceptance limits.
F2	MS/MSD RPD exceeds control limits

LCMS

Qualifier	Qualifier Description
*	Isotope Dilution analyte is outside acceptance limits.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.

Metals

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

Glossary

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

Case Narrative

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Job ID: 200-46033-1

Laboratory: TestAmerica Burlington

Narrative

Job Narrative 200-46033-1

Receipt

The samples were received on 11/2/2018 10:10 AM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 2.7° C.

GC/MS Semi VOA

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

Metals

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

LCMS

Method(s) 537 (modified): Internal standard (ISTD) response for the IDAs for the following samples were outside acceptance criteria: MW-1AR (200-46033-1), FIELD BLANK (200-46033-2), EQUIPMENT BLANK (200-46033-5), MW-3R (200-46033-6[MS]), LCS 200-136595/2-A) and (MB 200-136595/1-A). The IDA recoveries are all within acceptance criteria; therefore, the data have been reported.

Method(s) 537 (modified): The Isotope Dilution Analyte (IDA) recovery of 13C4 PFBA associated with the following sample is below the method recommended limit: MW-1AR (200-46033-1). Generally, data quality is not considered affected if the IDA signal-to-noise ratio is greater than 10:1, which is achieved for all IDA in the sample. All detection limits are below the lower calibration.

Method(s) 537 (modified): Isotope Dilution Analyte (IDA) recovery of M2-6:2 FTS and/or M2-8:2 FTS is above the method recommended limit for the following samples: MW-1AR (200-46033-1), MW-2R (200-46033-3) and DUPLICATE (200-46033-4). Quantitation by isotope dilution generally precludes any adverse effect on data quality due to elevated IDA recoveries. These two IDAs have shown to behave differently than their internal standard, often resulting in elevated recoveries in certain matrices. The associated target compounds (1H,1H,2H,2H-perfluorooctanesulfonic acid (6:2) and 1H,1H,2H,2H-perfluorodecanesulfonic acid (8:2)) appear to follow the same elevated responses based on results.

Method(s) 537 (modified): The method blank for preparation batch 200-136595 and analytical batch 200-136651 contained Perfluorobutanoic acid (PFBA) above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

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

Organic Prep

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

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: MW-1AR

Date Collected: 10/31/18 15:30

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-1

Matrix: Water

Method: 8270D SIM ID - Semivolatile Organic Compounds (GC/MS SIM / Isotope Dilution)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,4-Dioxane	ND		0.20	0.016	ug/L		11/04/18 08:26	11/04/18 20:38	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,4-Dioxane-d8	27		10 - 150				11/04/18 08:26	11/04/18 20:38	1

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	31	B	1.6	0.32	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluoropentanoic acid (PFPeA)	11		1.6	0.59	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorohexanoic acid (PFHxA)	6.9		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluoroheptanoic acid (PFHpA)	3.3		1.6	0.25	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorooctanoic acid (PFOA)	4.5		1.6	0.25	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluoroundecanoic acid (PFUnA)	ND		1.6	0.20	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorobutanesulfonic acid (PFBS)	1.4	J	1.6	0.35	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorohexanesulfonic acid (PFHxS)	ND		1.6	0.21	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.65	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.42	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorooctanesulfonic acid (PFOS)	ND		1.6	0.60	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.44	ng/L		11/09/18 11:30	11/11/18 01:29	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.36	ng/L		11/09/18 11:30	11/11/18 01:29	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.55	ng/L		11/09/18 11:30	11/11/18 01:29	1
6:2 FTS	ND		16	0.79	ng/L		11/09/18 11:30	11/11/18 01:29	1
8:2 FTS	ND		16	0.44	ng/L		11/09/18 11:30	11/11/18 01:29	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
13C8 FOSA	72		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C4 PFBA	19	*	25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C5-PFPeA DNU	39		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C2 PFHxA	44		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C4 PFHpA	60		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C4 PFOA	74		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C5 PFNA	86		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C2 PFDA	91		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C2 PFUnA	92		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C2 PFDoA	84		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C2 PFTeDA	89		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C3 PFBS	59		25 - 150				11/09/18 11:30	11/11/18 01:29	1
18O2 PFHxS	74		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C4 PFOS	79		25 - 150				11/09/18 11:30	11/11/18 01:29	1
d3-NMeFOSAA	74		25 - 150				11/09/18 11:30	11/11/18 01:29	1
d5-NEtFOSAA	82		25 - 150				11/09/18 11:30	11/11/18 01:29	1
M2-6:2 FTS	185	*	25 - 150				11/09/18 11:30	11/11/18 01:29	1
M2-8:2 FTS	111		25 - 150				11/09/18 11:30	11/11/18 01:29	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: FIELD BLANK

Lab Sample ID: 200-46033-2

Date Collected: 10/31/18 13:30

Matrix: Water

Date Received: 11/02/18 10:10

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	ND		1.6	0.33	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluoropentanoic acid (PFPeA)	ND		1.6	0.60	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorohexanoic acid (PFHxA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluoroheptanoic acid (PFHpA)	ND		1.6	0.26	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorooctanoic acid (PFOA)	0.26	J	1.6	0.26	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluoroundecanoic acid (PFUnA)	ND		1.6	0.20	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorobutanesulfonic acid (PFBS)	ND		1.6	0.35	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorohexanesulfonic acid (PFHxS)	ND		1.6	0.21	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.66	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.42	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorooctanesulfonic acid (PFOS)	ND		1.6	0.61	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.45	ng/L		11/09/18 11:30	11/11/18 01:45	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.36	ng/L		11/09/18 11:30	11/11/18 01:45	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.56	ng/L		11/09/18 11:30	11/11/18 01:45	1
6:2 FTS	ND		16	0.80	ng/L		11/09/18 11:30	11/11/18 01:45	1
8:2 FTS	ND		16	0.45	ng/L		11/09/18 11:30	11/11/18 01:45	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C8 FOSA	54		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C4 PFBA	63		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C5-PFPeA DNU	70		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C2 PFHxA	70		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C4 PFHpA	77		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C4 PFOA	76		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C5 PFNA	81		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C2 PFDA	89		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C2 PFUnA	88		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C2 PFDoA	83		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C2 PFTeDA	80		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C3 PFBS	66		25 - 150	11/09/18 11:30	11/11/18 01:45	1
18O2 PFHxS	79		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C4 PFOS	79		25 - 150	11/09/18 11:30	11/11/18 01:45	1
d3-NMeFOSAA	77		25 - 150	11/09/18 11:30	11/11/18 01:45	1
d5-NEtFOSAA	89		25 - 150	11/09/18 11:30	11/11/18 01:45	1
M2-6:2 FTS	103		25 - 150	11/09/18 11:30	11/11/18 01:45	1
M2-8:2 FTS	88		25 - 150	11/09/18 11:30	11/11/18 01:45	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: MW-2R

Date Collected: 10/31/18 15:20

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-3

Matrix: Water

Method: 8270D SIM ID - Semivolatile Organic Compounds (GC/MS SIM / Isotope Dilution)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,4-Dioxane	ND		0.20	0.016	ug/L		11/04/18 08:26	11/04/18 20:55	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,4-Dioxane-d8	29		10 - 150				11/04/18 08:26	11/04/18 20:55	1

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	ND		1.6	0.33	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluoropentanoic acid (PFPeA)	ND		1.6	0.60	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorohexanoic acid (PFHxA)	1.3	J	1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluoroheptanoic acid (PFHpA)	0.28	J	1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorooctanoic acid (PFOA)	0.91	J	1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluoroundecanoic acid (PFUnA)	0.20	J	1.6	0.20	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorobutanesulfonic acid (PFBS)	ND		1.6	0.35	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorohexanesulfonic acid (PFHxS)	ND		1.6	0.21	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.66	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.42	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorooctanesulfonic acid (PFOS)	ND		1.6	0.61	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.45	ng/L		11/09/18 11:30	11/11/18 02:01	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.36	ng/L		11/09/18 11:30	11/11/18 02:01	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.56	ng/L		11/09/18 11:30	11/11/18 02:01	1
6:2 FTS	ND		16	0.80	ng/L		11/09/18 11:30	11/11/18 02:01	1
8:2 FTS	ND		16	0.45	ng/L		11/09/18 11:30	11/11/18 02:01	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
13C8 FOSA	62		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C4 PFBA	44		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C5-PFPeA DNU	50		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C2 PFHxA	42		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C4 PFHpA	56		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C4 PFOA	74		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C5 PFNA	88		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C2 PFDA	84		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C2 PFUnA	90		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C2 PFDoA	87		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C2 PFTeA	87		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C3 PFBS	72		25 - 150				11/09/18 11:30	11/11/18 02:01	1
18O2 PFHxS	74		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C4 PFOS	80		25 - 150				11/09/18 11:30	11/11/18 02:01	1
d3-NMeFOSAA	79		25 - 150				11/09/18 11:30	11/11/18 02:01	1
d5-NEtFOSAA	90		25 - 150				11/09/18 11:30	11/11/18 02:01	1
M2-6:2 FTS	213	*	25 - 150				11/09/18 11:30	11/11/18 02:01	1
M2-8:2 FTS	113		25 - 150				11/09/18 11:30	11/11/18 02:01	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: DUPLICATE

Lab Sample ID: 200-46033-4

Date Collected: 10/31/18 15:22

Matrix: Water

Date Received: 11/02/18 10:10

Method: 8270D SIM ID - Semivolatile Organic Compounds (GC/MS SIM / Isotope Dilution)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,4-Dioxane	ND		0.20	0.016	ug/L		11/04/18 08:26	11/04/18 21:11	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,4-Dioxane-d8	33		10 - 150				11/04/18 08:26	11/04/18 21:11	1

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	ND		1.6	0.33	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluoropentanoic acid (PFPeA)	ND		1.6	0.59	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorohexanoic acid (PFHxA)	0.70	J	1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluoroheptanoic acid (PFHpA)	0.30	J	1.6	0.25	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorooctanoic acid (PFOA)	1.2	J	1.6	0.25	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluoroundecanoic acid (PFUnA)	0.27	J	1.6	0.20	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorobutanesulfonic acid (PFBS)	ND		1.6	0.35	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorohexanesulfonic acid (PFHxS)	0.23	J	1.6	0.21	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.65	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.42	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorooctanesulfonic acid (PFOS)	0.64	J	1.6	0.60	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.44	ng/L		11/09/18 11:30	11/11/18 02:17	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.36	ng/L		11/09/18 11:30	11/11/18 02:17	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.56	ng/L		11/09/18 11:30	11/11/18 02:17	1
6:2 FTS	ND		16	0.79	ng/L		11/09/18 11:30	11/11/18 02:17	1
8:2 FTS	ND		16	0.44	ng/L		11/09/18 11:30	11/11/18 02:17	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
13C8 FOSA	56		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C4 PFBA	40		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C5-PFPeA DNU	49		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C2 PFHxA	41		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C4 PFHpA	55		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C4 PFOA	72		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C5 PFNA	76		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C2 PFDA	79		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C2 PFUnA	78		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C2 PFDoA	73		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C2 PFTeA	72		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C3 PFBS	62		25 - 150				11/09/18 11:30	11/11/18 02:17	1
18O2 PFHxS	68		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C4 PFOS	73		25 - 150				11/09/18 11:30	11/11/18 02:17	1
d3-NMeFOSAA	65		25 - 150				11/09/18 11:30	11/11/18 02:17	1
d5-NEtFOSAA	77		25 - 150				11/09/18 11:30	11/11/18 02:17	1
M2-6:2 FTS	151	*	25 - 150				11/09/18 11:30	11/11/18 02:17	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: DUPLICATE

Date Collected: 10/31/18 15:22

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-4

Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
M2-8:2 FTS	100		25 - 150	11/09/18 11:30	11/11/18 02:17	1

Client Sample ID: EQUIPMENT BLANK

Date Collected: 10/31/18 14:15

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-5

Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	ND		1.6	0.33	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluoropentanoic acid (PFPeA)	ND		1.6	0.61	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorohexanoic acid (PFHxA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluoroheptanoic acid (PFHpA)	ND		1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorooctanoic acid (PFOA)	ND		1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.31	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.31	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluoroundecanoic acid (PFUnA)	0.29	J	1.6	0.20	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorobutanesulfonic acid (PFBS)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorohexanesulfonic acid (PFHxS)	ND		1.6	0.21	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.66	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.43	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorooctanesulfonic acid (PFOS)	ND		1.6	0.61	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.45	ng/L		11/09/18 11:30	11/11/18 02:33	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.36	ng/L		11/09/18 11:30	11/11/18 02:33	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.57	ng/L		11/09/18 11:30	11/11/18 02:33	1
6:2 FTS	ND		16	0.81	ng/L		11/09/18 11:30	11/11/18 02:33	1
8:2 FTS	ND		16	0.45	ng/L		11/09/18 11:30	11/11/18 02:33	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C8 FOSA	53		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C4 PFBA	70		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C5-PFPeA DNU	77		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C2 PFHxA	76		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C4 PFHpA	77		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C4 PFOA	82		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C5 PFNA	84		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C2 PFDA	91		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C2 PFUnA	85		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C2 PFDoA	79		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C2 PFTeDA	73		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C3 PFBS	69		25 - 150	11/09/18 11:30	11/11/18 02:33	1
18O2 PFHxS	76		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C4 PFOS	78		25 - 150	11/09/18 11:30	11/11/18 02:33	1
d3-NMeFOSAA	74		25 - 150	11/09/18 11:30	11/11/18 02:33	1
d5-NEtFOSAA	87		25 - 150	11/09/18 11:30	11/11/18 02:33	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: EQUIPMENT BLANK

Date Collected: 10/31/18 14:15

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-5

Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
M2-6:2 FTS	125		25 - 150	11/09/18 11:30	11/11/18 02:33	1
M2-8:2 FTS	94		25 - 150	11/09/18 11:30	11/11/18 02:33	1

Client Sample ID: MW-3R

Date Collected: 10/31/18 15:15

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-6

Matrix: Water

Method: 8270D SIM ID - Semivolatile Organic Compounds (GC/MS SIM / Isotope Dilution)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,4-Dioxane	ND	F1 F2	0.20	0.016	ug/L	-	11/04/18 08:26	11/04/18 18:58	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,4-Dioxane-d8	31		10 - 150				11/04/18 08:26	11/04/18 18:58	1

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	ND		1.6	0.33	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluoropentanoic acid (PFPeA)	ND		1.6	0.61	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorohexanoic acid (PFHxA)	0.22	J	1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluoroheptanoic acid (PFHpA)	ND		1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorooctanoic acid (PFOA)	0.47	J	1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.31	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.31	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluoroundecanoic acid (PFUnA)	0.20	J	1.6	0.20	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.37	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorobutanesulfonic acid (PFBS)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorohexanesulfonic acid (PFHxS)	ND		1.6	0.21	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.67	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.43	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorooctanesulfonic acid (PFOS)	ND		1.6	0.62	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.45	ng/L		11/09/18 11:30	11/11/18 02:49	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.37	ng/L		11/09/18 11:30	11/11/18 02:49	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.57	ng/L		11/09/18 11:30	11/11/18 02:49	1
6:2 FTS	ND		16	0.81	ng/L		11/09/18 11:30	11/11/18 02:49	1
8:2 FTS	ND		16	0.45	ng/L		11/09/18 11:30	11/11/18 02:49	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
13C8 FOSA	67		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C4 PFBA	58		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C5-PFPeA DNU	62		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C2 PFHxA	69		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C4 PFHpA	72		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C4 PFOA	82		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C5 PFNA	85		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C2 PFDA	91		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C2 PFUnA	89		25 - 150				11/09/18 11:30	11/11/18 02:49	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: MW-3R

Date Collected: 10/31/18 15:15

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-6

Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C2 PFDoA	76		25 - 150	11/09/18 11:30	11/11/18 02:49	1
13C2 PFTeDA	80		25 - 150	11/09/18 11:30	11/11/18 02:49	1
13C3 PFBS	72		25 - 150	11/09/18 11:30	11/11/18 02:49	1
18O2 PFHxS	86		25 - 150	11/09/18 11:30	11/11/18 02:49	1
13C4 PFOS	78		25 - 150	11/09/18 11:30	11/11/18 02:49	1
d3-NMeFOSAA	66		25 - 150	11/09/18 11:30	11/11/18 02:49	1
d5-NEtFOSAA	83		25 - 150	11/09/18 11:30	11/11/18 02:49	1
M2-6:2 FTS	139		25 - 150	11/09/18 11:30	11/11/18 02:49	1
M2-8:2 FTS	116		25 - 150	11/09/18 11:30	11/11/18 02:49	1

Client Sample ID: DRUM WASTE CHAR

Date Collected: 10/31/18 15:35

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-7

Matrix: Water

Method: 6010D - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Lead	6.7	J	10.0	2.5	ug/L		11/09/18 01:00	11/09/18 17:23	1

Lab Chronicle

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: MW-1AR

Date Collected: 10/31/18 15:30

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-1

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3510C			565693	11/04/18 08:26	KMH	TAL EDI
Total/NA	Analysis	8270D SIM ID		1	565750	11/04/18 20:38	YAH	TAL EDI
Total/NA	Prep	3535			136595	11/09/18 11:30	JM1	TAL BUR
Total/NA	Analysis	537 (modified)		1	136651	11/11/18 01:29	BWC	TAL BUR

Client Sample ID: FIELD BLANK

Date Collected: 10/31/18 13:30

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-2

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3535			136595	11/09/18 11:30	JM1	TAL BUR
Total/NA	Analysis	537 (modified)		1	136651	11/11/18 01:45	BWC	TAL BUR

Client Sample ID: MW-2R

Date Collected: 10/31/18 15:20

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-3

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3510C			565693	11/04/18 08:26	KMH	TAL EDI
Total/NA	Analysis	8270D SIM ID		1	565750	11/04/18 20:55	YAH	TAL EDI
Total/NA	Prep	3535			136595	11/09/18 11:30	JM1	TAL BUR
Total/NA	Analysis	537 (modified)		1	136651	11/11/18 02:01	BWC	TAL BUR

Client Sample ID: DUPLICATE

Date Collected: 10/31/18 15:22

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-4

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3510C			565693	11/04/18 08:26	KMH	TAL EDI
Total/NA	Analysis	8270D SIM ID		1	565750	11/04/18 21:11	YAH	TAL EDI
Total/NA	Prep	3535			136595	11/09/18 11:30	JM1	TAL BUR
Total/NA	Analysis	537 (modified)		1	136651	11/11/18 02:17	BWC	TAL BUR

Client Sample ID: EQUIPMENT BLANK

Date Collected: 10/31/18 14:15

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-5

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3535			136595	11/09/18 11:30	JM1	TAL BUR
Total/NA	Analysis	537 (modified)		1	136651	11/11/18 02:33	BWC	TAL BUR

TestAmerica Burlington

Lab Chronicle

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: MW-3R

Date Collected: 10/31/18 15:15

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-6

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3510C			565693	11/04/18 08:26	KMH	TAL EDI
Total/NA	Analysis	8270D SIM ID		1	565750	11/04/18 18:58	YAH	TAL EDI
Total/NA	Prep	3535			136595	11/09/18 11:30	JM1	TAL BUR
Total/NA	Analysis	537 (modified)		1	136651	11/11/18 02:49	BWC	TAL BUR

Client Sample ID: DRUM WASTE CHAR

Date Collected: 10/31/18 15:35

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-7

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3010A			566968	11/09/18 01:00	GAE	TAL EDI
Total/NA	Analysis	6010D		1	567138	11/09/18 17:23	YZH	TAL EDI

Laboratory References:

TAL BUR = TestAmerica Burlington, 30 Community Drive, Suite 11, South Burlington, VT 05403, TEL (802)660-1990

TAL EDI = TestAmerica Edison, 777 New Durham Road, Edison, NJ 08817, TEL (732)549-3900

Accreditation/Certification Summary

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Laboratory: TestAmerica Burlington

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

Authority	Program	EPA Region	Identification Number	Expiration Date
New York	NELAP	2	10391	04-01-19

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

Analysis Method	Prep Method	Matrix	Analyte
537 (modified)	3535	Water	6:2 FTS
537 (modified)	3535	Water	8:2 FTS
537 (modified)	3535	Water	N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)
537 (modified)	3535	Water	N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)
537 (modified)	3535	Water	Perfluorobutanesulfonic acid (PFBS)
537 (modified)	3535	Water	Perfluorobutanoic acid (PFBA)
537 (modified)	3535	Water	Perfluorodecanesulfonic acid (PFDS)
537 (modified)	3535	Water	Perfluorodecanoic acid (PFDA)
537 (modified)	3535	Water	Perfluorododecanoic acid (PFDoA)
537 (modified)	3535	Water	Perfluoroheptanesulfonic Acid (PFHpS)
537 (modified)	3535	Water	Perfluoroheptanoic acid (PFHpA)
537 (modified)	3535	Water	Perfluorohexanesulfonic acid (PFHxS)
537 (modified)	3535	Water	Perfluorohexanoic acid (PFHxA)
537 (modified)	3535	Water	Perfluorononanoic acid (PFNA)
537 (modified)	3535	Water	Perfluorooctanesulfonamide (FOSA)
537 (modified)	3535	Water	Perfluorooctanesulfonic acid (PFOS)
537 (modified)	3535	Water	Perfluorooctanoic acid (PFOA)
537 (modified)	3535	Water	Perfluoropentanoic acid (PFPeA)
537 (modified)	3535	Water	Perfluorotetradecanoic acid (PFTeA)
537 (modified)	3535	Water	Perfluorotridecanoic acid (PFTrA)
537 (modified)	3535	Water	Perfluoroundecanoic acid (PFUnA)

Laboratory: TestAmerica Buffalo

The accreditations/certifications listed below are applicable to this report.

Authority	Program	EPA Region	Identification Number	Expiration Date
New York	NELAP	2	10026	03-31-19

Laboratory: TestAmerica Edison

The accreditations/certifications listed below are applicable to this report.

Authority	Program	EPA Region	Identification Number	Expiration Date
New York	NELAP	2	11452	04-01-19

Method Summary

Client: New York State D.E.C.

TestAmerica Job ID: 200-46033-1

Project/Site: Granite Pte Subdiv-Off Site #C360107A

Method	Method Description	Protocol	Laboratory
8270D SIM ID	Semivolatile Organic Compounds (GC/MS SIM / Isotope Dilution)	SW846	TAL EDI
537 (modified)	Fluorinated Alkyl Substances	EPA	TAL BUR
6010D	Metals (ICP)	SW846	TAL EDI
3010A	Preparation, Total Metals	SW846	TAL EDI
3510C	Liquid-Liquid Extraction (Separatory Funnel)	SW846	TAL EDI
3535	Solid-Phase Extraction (SPE)	SW846	TAL BUR

Protocol References:

EPA = US Environmental Protection Agency

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

Laboratory References:

TAL BUR = TestAmerica Burlington, 30 Community Drive, Suite 11, South Burlington, VT 05403, TEL (802)660-1990

TAL EDI = TestAmerica Edison, 777 New Durham Road, Edison, NJ 08817, TEL (732)549-3900

Sample Summary

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
200-46033-1	MW-1AR	Water	10/31/18 15:30	11/02/18 10:10
200-46033-2	FIELD BLANK	Water	10/31/18 13:30	11/02/18 10:10
200-46033-3	MW-2R	Water	10/31/18 15:20	11/02/18 10:10
200-46033-4	DUPLICATE	Water	10/31/18 15:22	11/02/18 10:10
200-46033-5	EQUIPMENT BLANK	Water	10/31/18 14:15	11/02/18 10:10
200-46033-6	MW-3R	Water	10/31/18 15:15	11/02/18 10:10
200-46033-7	DRUM WASTE CHAR	Water	10/31/18 15:35	11/02/18 10:10

Chain of Custody Record



Client Information Company: HEIDI DUDEK (DEC) Address: 21 SOUTH MOUNTAIN CORNERS RD City: NEW PALM, NY State: NY Zip: 12561 Phone: (845) 256-3000 Email: irobinson@pesnyinc.com Project Name: HEIDI DUDEK (DEC) NY 6W Granite Pre Subdiv-Off Site #C360107A Site: GRANITE POZN 2 144 NY RT 118		Sampler: JOHN ROZMAN Lab PM: Stone, Judy L Phone: 518-888-6254 E-Mail: judy.stone@testamericainc.com		COC No: 480-120873-27768.1 Page: Page 1 of 1 Job #:					
Analysis Requested Due Date Requested: TAT Requested (days): 10 DAY STANDARD TURN PO #: Callout: 136369 WO #: 48010852 Project #: SSOW#:		Preservation Codes: A - HCL B - NaOH C - Zn Acetate D - Nitric Acid E - NaHSO4 F - MeOH G - Amchlor H - Ascorbic Acid I - Ice J - DI Water K - EDTA L - EDA Other:							
Sample Identification MW - 1XR FIBER BLANK MW - 2R DADDCATE EQUALMENT BLANK MW - 3R DRUM WASTE CHAR		Sample Date 10/31/18 10/31/18 10/31/18 10/31/18 10/31/18 10/31/18	Sample Time 15:30 13:30 15:20 15:22 14:15 15:15 15:35	Sample Type (C=Comp, G=grab) G G G G G G	Matrix (W=water, S=solid, O=waste/soil, BT=tissue, A=air) Water Water Water Water Water Water Water	Field Filtered Sample (Yes or No) X X X X X X X	PFC, LPA - PFAS, Standard List (21 Analytes) m/MSD 870D, SIM, MS, ID - 1,4-Dioxane (Edison) 6010C - Lead	Total Number of Containers CAT B DEU	Special Instructions/Note: PERFORM MS/MSD
Possible Hazard Identification ☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☒ Unknown ☐ Radiological Deliverable Requested: I, II, III, IV, Other (specify)		Sample Disposal (A fee may be assessed if samples are retained longer than 1 month) ☐ Return To Client ☒ Disposal By Lab ☐ Archive For _____ Months							
Empty Kit Relinquished by:		Special Instructions/QC Requirements:							
Relinquished by: Anthony M Robinson Signature: Roberta Gelinas Date/Time: 11-1-18 0720 Relinquished by: Rae Sash Date/Time: 11-1-18 1700 Custody Seal No.: Δ Yes Δ No		Received by: Rae Sash Date/Time: 11-1-18 0720 Received by: Rae Sash Date/Time: 11-1-18 1700 Cooler Temperature(s) °C and Other Remarks:							

FROM: (518) 438-8140
TIM KNOLLMEYER
TESTAMERICA LAB INC
25 KRAFT AVE

ALBANY NY 12205
US

SHIP DATE: 01NOV18
ACTWGT: 24.05 LB
CAD: 0439821/CAFE3211

BILL 3rd PARTY

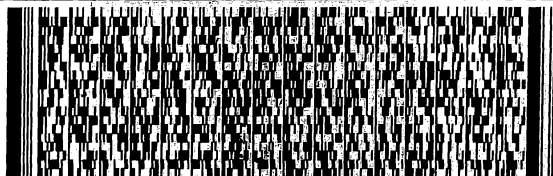
SS1C1/3BE7/104C

TO **SAMPLE RECEIVING/ CALLAHAN**
TESTAMERICA - BURLINGTON
30 COMMUNITY DRIVE, SUITE 11

BURLINGTON VT 05403

(US)

(802) 660-1990
REF: PES SAMPLES



FedEx
Ground



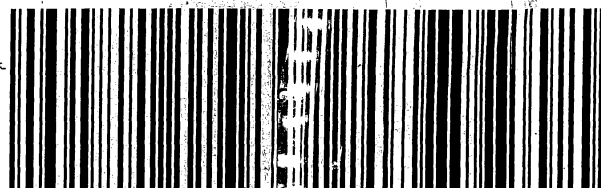
J181118060501uy

TRK# **4635 9988 9940**

05403

9622-0417-3 (000 000 0000) 0 00 4635 9988 9940

Part # 156148-434 R1T2 04/13



Job Number:

200-46033

Number of Coolers

IR Gun



Cooler Temperatures

RAW		CORRECTED		RAW		CORRECTED	
Cooler #1	34 °C	3.4 °C		Cooler #4			
Cooler #2				Cooler #5			
Cooler #3				Cooler #6			
				Cooler #7			
				Cooler #8			
				Cooler #9			

[illegible]

If pH adjustments are required record the information below:

Sample No(s). adjusted:

Preservative Name/Conc.:

Volume of Preservative used (ml):

Lot # of Preservative(s):

Expiration Date:

The appropriate Project Manager and Department Manager should be notified about the samples which were pH adjusted.

Samples for Metal analysis which are out of compliance must be acidified at least 24 hours prior to analysis.

Initials:

2

Date:

11/2/18

Login Sample Receipt Checklist

Client: New York State D.E.C.

Job Number: 200-46033-1

Login Number: 46033

List Number: 1

Creator: Johnson, Eleanor E

List Source: TestAmerica Burlington

Question	Answer	Comment
Radioactivity either was not measured or, if measured, is at or below background	N/A	NA: Lab does not accept radioactive samples
The cooler's custody seal, if present, is intact.	True	743339
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	2.7°C
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	JR
There are no discrepancies between the sample IDs on the containers and the COC.	True	
Samples are received within Holding Time (Excluding tests with immediate HTs)..	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	N/A	
Sample Preservation Verified	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
VOA sample vials do not have headspace or bubble is <6mm (1/4") in diameter.	True	
If necessary, staff have been informed of any short hold time or quick TAT needs	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Sampling Company provided.	True	
Samples received within 48 hours of sampling.	True	
Samples requiring field filtration have been filtered in the field.	True	
Chlorine Residual checked.	N/A	NA: No analysis requiring residual chlorine check assigned

Login Sample Receipt Checklist

Client: New York State D.E.C.

Job Number: 200-46033-1

Login Number: 46033

List Number: 2

Creator: Rivera, Kenneth

List Source: TestAmerica Edison

List Creation: 11/03/18 03:45 PM

Question	Answer	Comment
Radioactivity wasn't checked or is $\leq$ background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	743340
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	3.4°C, IR #9
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is $<6\text{mm}$ (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

ATTACHMENT - 3



Geology

Hydrology

Remediation

Water Supply

November 30, 2018

Mr. John Robinson
Precision Environmental Services, Inc.
Curtis Industrial Park
831 Rt. 67, Lot 38
Ballston Spa, New York 12020

Re: Data Usability Summary Reports
Granite Point Site #C360107A
October 2018 Ground Water Sampling Event

Dear Mr. Robinson:

The data usability summary report (DUSR) and data validation summaries are attached to this letter for the Granite Point Site, October 2018 ground water sampling event. The data for TestAmerica job number 200-46033-1 were acceptable with some minor issues that are identified and discussed in the validation summaries and DUSR. There were no data that were qualified as rejected, unusable (R) in the data pack.

A list of common data validation acronyms and data validation qualifiers is attached to this letter to assist you interpreting the validation summaries. If you have any questions concerning the work performed, please contact me at (518) 348-6995. Thank you for the opportunity to assist Precision Environmental Services, Inc.

Sincerely,
Alpha Geoscience

Donald Anné
Senior Chemist

DCA:dca
attachments

Z:\projects\2018\18600-18620\18620-Granite Point\Granite Point-181.ltr.wpd

Data Validation Qualifiers Used in the QA/QC Reviews for USEPA Region II

U	=	Not detected. The associated number indicates the approximate sample concentration necessary to be detected significantly greater than the level of the highest associated blank.
R	=	Unreliable result; data is rejected or unusable. Analyte may or may not be present in the sample. <u>Supporting data or information is necessary to confirm the result.</u>
N	=	Tentative identification. Analyte is considered present. Special methods may be needed to confirm its presence or absence during future sampling efforts.
J	=	Analyte is present. Reported value may be associated with a higher level of uncertainty than is normally expected with the analytical method.
J-	=	Analyte is present. Reported value may be biased low and associated with a higher level of uncertainty than is normally expected with the analytical method.
J+	=	Analyte is present. Reported value may be biased high and associated with a higher level of uncertainty than is normally expected with the analytical method.
UJ	=	Not detected, quantitation limit may be inaccurate or imprecise.

Note: These qualifiers are used for data validation purposes. The data validation qualifiers may differ from the qualifiers that the laboratory assigns to the data. Refer to the laboratory analytical report for the definitions of the laboratory qualifiers.

Polyfluorinated Alkyl Substances (PFAS) Acronyms

PFBA	Perfluorobutanoic acid
PFPeA	Perfluoropentanoic acid
PFHxA	Perfluorohexanoic acid
PFHpA	Perfluoroheptanoic acid
PFOA	Perfluorooctanoic acid
PFNA	Perfluorononanoic acid
PFDA	Perfluorodecanoic acid
PFUnA	Perfluoroundecanoic acid
PFDoA	Perfluorododecanoic acid
PFTriA or PFTriDA	Perfluorotridecanoic acid
PFTeA or PFTA	Perfluorotetradecanoic acid
PFBS	Perfluorobutanesulfonic acid
PFPeS	Perfluoropentanesulfonic acid
PFHxS	Perfluorohexanesulfonic acid
PFHpS	Perfluoroheptanesulfonic acid
PFOS	Perfluorooctanesulfonic acid
PFNS	Perfluorononanesulfonic acid
PFDS	Perfluorodecanesulfonic acid
FOSA	Perfluorooctane Sulfonamide
NMeFOSAA	N-methyl perfluorooctane sulfonamidoacetic acid
NEtFOSAA	N-ethyl perfluorooctane sulfonamidoacetic acid
4:2 FTS or 4:2	1H, 1H, 2H, 2H-perfluorohexanesulfonic acid
6:2 FTS or 6:2	1H, 1H, 2H, 2H-perfluorooctanesulfonic acid
8:2 FTS or 8:2	1H, 1H, 2H, 2H-perfluorodecanesulfonic acid

Data Validation Acronyms

AA	Atomic absorption, flame technique
BHC	Hexachlorocyclohexane
BFB	Bromofluorobenzene
CCB	Continuing calibration blank
CCC	Calibration check compound
CCV	Continuing calibration verification
CN	Cyanide
CRDL	Contract required detection limit
CRQL	Contract required quantitation limit
CVAA	Atomic adsorption, cold vapor technique
DCAA	2,4-Dichlophenylacetic acid
DCB	Decachlorobiphenyl
DFTPP	Decafluorotriphenyl phosphine
ECD	Electron capture detector
FAA	Atomic absorption, furnace technique
FID	Flame ionization detector
FNP	1-Fluoronaphthalene
GC	Gas chromatography
GC/MS	Gas chromatography/mass spectrometry
GPC	Gel permeation chromatography
ICB	Initial calibration blank
ICP	Inductively coupled plasma-atomic emission spectrometer
ICV	Initial calibration verification
IDL	Instrument detection limit
IS	Internal standard
LCS	Laboratory control sample
LCS/LCSD	Laboratory control sample/laboratory control sample duplicate
MSA	Method of standard additions
MS/MSD	Matrix spike/matrix spike duplicate
PID	Photo ionization detector
PCB	Polychlorinated biphenyl
PCDD	Polychlorinated dibenzodioxins
PCDF	Polychlorinated dibenzofurans
QA	Quality assurance
QC	Quality control
RF	Response factor
RPD	Relative percent difference
RRF	Relative response factor
RRF(number)	Relative response factor at concentration of the number following
RT	Retention time
RRT	Relative retention time
SDG	Sample delivery group
SPCC	System performance check compound
TCX	Tetrachloro-m-xylene
%D	Percent difference
%R	Percent recovery
%RSD	Percent relative standard deviation



Geology

Hydrology

Remediation

Water Supply

**Data Usability Summary Report for
TestAmerica, Job No: 200-46033-1**

**3 Ground Water Samples, 1 Field Duplicate,
1 Field Blank, and 1 Equipment Blank
Collected October 31, 2018**

Prepared by: Donald Anné
November 30, 2018

The data packages contain the documentation required by NYSDEC ASP. The proper chain of custody procedures were followed by the samplers. All information appeared legible and complete. The data pack contained the results for 3 ground water samples and 1 field duplicate analyzed for 1,4-dioxane and 3 ground water samples, 1 field duplicate, 1 field blank, and 1 equipment blank analyzed for PFAS compounds.

The overall performances of the analyses are acceptable. TestAmerica Burlington and Edison did fulfill the requirements of the analytical methods.

The data are mostly acceptable with some issues that are identified in the accompanying data validation reviews. The following data were qualified:

- Positive PFAS results for PFOA were qualified as “not detected” (U) for samples MW-2R, DUPLICATE, and MW-3R because the level reported in the samples were not significantly greater than (more than 5 times) the associated method blank level.
- The PFAS results for 6 compounds were qualified as estimated, biased low (J-) in sample MW-1AR because internal standard area was above control limits in the sample.
- The PFAS result for PFOA was qualified as estimated, biased low (J-) in sample FIELD BLANK because internal standard area was above control limits in the sample.
- The PFAS result for PFUnA was qualified as estimated, biased low (J-) in sample EQUIPMENT BLANK because internal standard area was above control limits in the sample.

All data are considered usable with estimated (J-) data associated with a higher level of quantitative uncertainty. Detailed information on data quality is included in the data validation reviews.



Geology

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Water Supply

**QA/QC Review of Method 8270D SIM 1,4-Dioxane
Data for TestAmerica Edison, Job No: 200-46033-1**

**3 Ground Water Samples and 1 Field Duplicate
Collected October 31, 2018**

Prepared by: Donald Anné
November 30, 2018

Holding Times: The sample was analyzed within USEPA SW-846 holding times.

GC/MS Tuning and Mass Calibration: The DFTPP tuning criteria were within control limits.

Initial Calibration: The average RRF for 1,4-dioxane was above the allowable minimum (0.010) and the %RSD was below the allowable maximum (30%), as required.

Continuing Calibration: The RRF for 1,4-dioxane was above the allowable minimum (0.010) and the %D was below the allowable maximum (25%), as required.

Blanks: The analysis of the method blank reported 1,4-dioxane as not detected.

Internal Standard Area Summary: The internal standard areas and retention times were within control limits.

Surrogate Recovery: The surrogate recoveries were within control limits for the ground water samples.

Matrix Spike/Matrix Spike Duplicate: The relative percent difference for 1,4-dioxane was above the allowable maximum and 1 of 2 percent recoveries was above QC limits for aqueous MS/MSD sample MW-3R. Positive results for 1,4-dioxane should be considered estimated, biased high (J+). Sample MW-3R reported 1,4-dioxane as "not detected"; therefore, no action is taken.

Laboratory Control Sample: The percent recovery for 1,4-dioxane was within QC limits for aqueous sample LCS 460-565693/2-A.

Field Duplicates: The analyses of aqueous field duplicate pair MW-2R/DUPLICATE reported 1,4-dioxane as not detected; therefore, a valid relative percent difference could not be calculated. The analyses for the field duplicate pair were acceptable.

Compound ID: Checked surrogates were within GC quantitation limits. The analyses of the ground water samples reported 1,4-dioxane as not detected.

FORM III
GC/MS SEMI VOA MATRIX SPIKE RECOVERY

Lab Name: TestAmerica Edison

Job No.: 200-46033-1

SDG No.: _____

Matrix: Water

Level: Low

Lab File ID: C31900.D

Lab ID: 200-46033-6 MS

Client ID: MW-3R MS

COMPOUND	SPIKE ADDED (ug/L)	SAMPLE CONCENTRATION (ug/L)	MS CONCENTRATION (ug/L)	MS % REC	QC LIMITS REC	#
1,4-Dioxane	1.60	ND	1.44	90	70-130	
1,4-Dioxane-d8	32.0	10	11.3	35	10-150	

Column to be used to flag recovery and RPD values

FORM III 8270D SIM ID

FORM III
GC/MS SEMI VOA MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: TestAmerica Edison Job No.: 200-46033-1
 SDG No.: _____
 Matrix: Water Level: Low Lab File ID: C31901.D
 Lab ID: 200-46033-6 MSD Client ID: MW-3R MSD

COMPOUND	SPIKE ADDED (ug/L)	MSD CONCENTRATION (ug/L)	MSD %	MSD %	QC LIMITS		#
			REC	RPD	RPD	REC	
1,4-Dioxane	1.60	2.71	170	61	20	70-130	F1 F2
1,4-Dioxane-d8	32.0	11.3	35			10-150	

Column to be used to flag recovery and RPD values

FORM III 8270D SIM ID



Geology

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Remediation

Water Supply

**QA/QC Review of Method 537 (Modified) PFAS Data
for TestAmerica Burlington, Job No: 200-46033-1**

**3 Ground Water Samples, 1 Field Duplicate,
1 Field Blank, and 1 Equipment Blank
Collected October 31, 2018**

Prepared by: Donald Anné
November 30, 2018

Holding Times: Samples were analyzed within USEPA holding times.

Initial Calibration (External Standard): The %RSDs for applicable PFAS compounds were below the method maximums, as required.

Continuing Calibration: The %Ds for applicable PFAS compounds were below the allowable maximums, as required

Blanks: Method blank MB 200-136595/1-A contained a trace of PFBA (0.543 ng/L). The field blank contained a trace of PFOA (0.26 ng/L). The equipment blank contained a trace of PFUnA (0.29 ng/L). Positive results for these compounds that are less than 5 times the highest blank level should be reported as not detected (U) in associated samples.

Surrogate Recovery: The surrogate recoveries for M262FTS in samples MW-1AR, MW-2R, and DUPLICATE were above QC limits. Positive results for compounds associated with M262FTS should be considered estimated, biased low (J-) in samples MW-1AR, MW-2R, and DUPLICATE

The surrogate recovery for PFBA in sample MW-1AR was below QC limits, but not below 10%. Positive results for compounds associated with PFBA should be considered estimated, biased high (J+) and "not detected" results estimated (UJ) in sample MW-1AR.

Internal Standard Area Summary: The internal standard retention times were within control limits.

The internal standard areas for samples MW-1AR, FIELD BLANK, and EQUIPMENT BLANK were above control limits. Positive results for samples MW-1AR, FIELD BLANK, and EQUIPMENT BLANK should be considered estimated, biased low (J-).

Matrix Spike/Matrix Spike Duplicate: The relative percent differences for spiked PFAS compounds were below the allowable maximum and percent recoveries were within QC limits for aqueous MS/MSD sample MW-3R.

Laboratory Control Sample: ~~The percent recoveries for spiked compounds were within QC limits~~ for aqueous sample LCS 200-136595/2-A.

Field Duplicates: The analyses of aqueous field duplicate pair MW-2R/DUPLICATE reported target PFAS as either not detected or below the lowest standard; therefore, valid relative percent differences could not be calculated. The analyses for the field duplicate pair were acceptable.

Compound ID: Checked compounds and surrogates were within LC quantitation limits.

FORM II
LCMS SURROGATE RECOVERY

Lab Name: TestAmerica Burlington

Job No.: 200-46033-1

SDG No.: _____

Matrix: Water

Level: Low

GC Column (1): C-18

ID: 4.6 (mm)

Client Sample ID	Lab Sample ID	PFBA #	PFPeA #	PFBS #	PFHxA #	PFHpA #	PFHxS #	M262FTS #	PFOA #
MW-1AR	200-46033-1	19	39	59	44	60	74	185 *	74
FIELD BLANK	200-46033-2	63	70	66	70	77	79	103	76
MW-2R	200-46033-3	44	50	72	42	56	74	213 *	74
DUPLICATE	200-46033-4	40	49	62	41	55	68	151 *	72
EQUIPMENT BLANK	200-46033-5	70	77	69	76	77	76	125	82
MW-3R	200-46033-6	58	62	72	69	72	86	139	82
	MB	55	70	73	70	65	77	143	74
	200-136595/1-A								
	LCS	61	75	73	70	67	81	139	81
	200-136595/2-A								
MW-3R MS	200-46033-6 MS	55	56	63	63	72	79	132	76
MW-3R MSD	200-46033-6 MSD	53	59	70	62	69	80	127	75

PFBA = 13C4 PFBA
 PFPeA = 13C5-PFPeA DNU
 PFBS = 13C3 PFBS
 PFHxA = 13C2 PFHxA
 PFHpA = 13C4 PFHpA
 PFHxS = 18O2 PFHxS
 M262FTS = M2-6:2 FTS
 PFOA = 13C4 PFOA

QC LIMITS

25-150
 25-150
 25-150
 25-150
 25-150
 25-150
 25-150
 25-150

Column to be used to flag recovery values

FORM II 537 (modified)

FORM II
LCMS SURROGATE RECOVERY

Lab Name: TestAmerica Burlington

Job No.: 200-46033-1

SDG No.: _____

Matrix: Water

Level: Low

GC Column (1): C-18 ID: 4.6 (mm)

Client Sample ID	Lab Sample ID	PFNA #	PFOS #	M282FTS #	PFDA #	d3NMFOS #	d5NEFOS #	PFUnA #	PFOSA #
MW-1AR	200-46033-1	86	79	111	91	74	82	92	72
FIELD BLANK	200-46033-2	81	79	88	89	77	89	88	54
MW-2R	200-46033-3	88	80	113	84	79	90	90	62
DUPLICATE	200-46033-4	76	73	100	79	65	77	78	56
EQUIPMENT BLANK	200-46033-5	84	78	94	91	74	87	85	53
MW-3R	200-46033-6	85	78	116	91	66	83	89	67
	MB 200-136595/1-A	71	78	93	81	67	79	78	57
	LCS 200-136595/2-A	80	89	97	84	75	82	84	67
MW-3R MS	200-46033-6 MS	79	80	99	84	71	74	80	67
MW-3R MSD	200-46033-6 MSD	86	81	98	83	77	78	87	68

QC LIMITS

PFNA = 13C5 PFNA	25-150
PFOS = 13C4 PFOS	25-150
M282FTS = M2-8:2 FTS	25-150
PFDA = 13C2 PFDA	25-150
d3NMFOS = d3-NMeFOSAA	25-150
d5NEFOS = d5-NEtFOSAA	25-150
PFUnA = 13C2 PFUnA	25-150
PFOSA = 13C8 FOSA	25-150

Column to be used to flag recovery values

FORM II 537 (modified)

FORM II
LCMS SURROGATE RECOVERY

Lab Name: TestAmerica Burlington

Job No.: 200-46033-1

SDG No.: _____

Matrix: Water

Level: Low

GC Column (1): C-18

ID: 4.6 (mm)

Client Sample ID	Lab Sample ID	PFDa #	PFTDA #
MW-1AR	200-46033-1	84	89
FIELD BLANK	200-46033-2	83	80
MW-2R	200-46033-3	87	87
DUPLICATE	200-46033-4	73	72
EQUIPMENT BLANK	200-46033-5	79	73
MW-3R	200-46033-6	76	80
	MB 200-136595/1-A	73	69
	LCS 200-136595/2-A	80	78
MW-3R MS	200-46033-6 MS	69	74
MW-3R MSD	200-46033-6 MSD	78	81

PFDa = 13C2 PFDa
PFTDA = 13C2 PFTda

QC LIMITS
25-150
25-150

Column to be used to flag recovery values

FORM II 537 (modified)

FORM VIII
LCMS INTERNAL STANDARD AREA AND RETENTION TIME SUMMARY

Lab Name: TestAmerica Burlington Job No.: 200-46033-1
 SDG No.: _____
 Sample No.: CCVIS 200-136651/6 Date Analyzed: 11/10/2018 12:00
 Instrument ID: LC410 GC Column: C-18 ID: 4.6 (mm)
 Lab File ID (Standard): PF111018A06.d Heated Purge: (Y/N) N
 Calibration ID: 40218

		13PFOA					
		AREA #	RT #	AREA #	RT #	AREA #	RT #
12/24 HOUR STD		576204	4.41				
UPPER LIMIT		864306	4.61				
LOWER LIMIT		288102	4.21				
LAB SAMPLE ID	CLIENT SAMPLE ID						
CCVL 200-136651/7		659896	4.41				
CCV 200-136651/43		737123	4.41				
MB 200-136595/1-A		1081313*	4.39				
LCS 200-136595/2-A		938016*	4.39				
CCV 200-136651/56		687378	4.39				
200-46033-1	MW-1AR	887620*	4.37				
200-46033-2	FIELD BLANK	979939*	4.39				
200-46033-3	MW-2R	812816	4.37				
200-46033-4	DUPLICATE	852319	4.39				
200-46033-5	EQUIPMENT BLANK	919001*	4.39				
200-46033-6	MW-3R	785224	4.41				
200-46033-6 MS	MW-3R MS	865723*	4.39				
200-46033-6 MSD	MW-3R MSD	854234	4.39				
CCV 200-136651/69		736627	4.41				

13PFOA = 13C2 PFOA

Area Limit = 50%-150% of internal standard area
 RT Limit = ± 0.2 minutes of internal standard RT

Column used to flag values outside QC limits

FORM VIII 537 (MODIFIED)

FORM I
LCMS ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Burlington Job No.: 200-46033-1
 SDG No.: _____
 Client Sample ID: _____ Lab Sample ID: MB 200-136595/1-A
 Matrix: Water Lab File ID: PF111018A44.d
 Analysis Method: 537 (modified) Date Collected: _____
 Extraction Method: 3535 Date Extracted: 11/09/2018 11:30
 Sample wt/vol: 250 (mL) Date Analyzed: 11/10/2018 22:03
 Con. Extract Vol.: 0.5 (mL) Dilution Factor: 1
 Injection Volume: 20 (uL) GC Column: C-18 ID: 4.6 (mm)
 % Moisture: _____ GPC Cleanup: (Y/N) N
 Analysis Batch No.: 136651 Units: ng/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
375-22-4	Perfluorobutanoic acid (PFBA)	0.543	J	2.0	0.41
2706-90-3	Perfluoropentanoic acid (PFPeA)	ND		2.0	0.75
307-24-4	Perfluorohexanoic acid (PFHxA)	ND		2.0	0.24
375-85-9	Perfluoroheptanoic acid (PFHpA)	ND		2.0	0.32
335-67-1	Perfluorooctanoic acid (PFOA)	ND		2.0	0.32
375-95-1	Perfluorononanoic acid (PFNA)	ND		2.0	0.38
335-76-2	Perfluorodecanoic acid (PFDA)	ND		2.0	0.38
2058-94-8	Perfluoroundecanoic acid (PFUnA)	ND		2.0	0.25
307-55-1	Perfluorododecanoic acid (PFDoA)	ND		2.0	0.35
72629-94-8	Perfluorotridecanoic acid (PFTriA)	ND		2.0	0.24
376-06-7	Perfluorotetradecanoic acid (PFTeA)	ND		2.0	0.45
375-73-5	Perfluorobutanesulfonic acid (PFBS)	ND		2.0	0.44
355-46-4	Perfluorohexanesulfonic acid (PFHxS)	ND		2.0	0.26
375-92-8	Perfluoroheptanesulfonic Acid (PFHpS)	ND		2.0	0.82
335-77-3	Perfluorodecanesulfonic acid (PFDS)	ND		2.0	0.53
1763-23-1	Perfluorooctanesulfonic acid (PFOS)	ND		2.0	0.76
754-91-6	Perfluorooctanesulfonamide (FOSA)	ND		2.0	0.56
2355-31-9	N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		20	0.45
2991-50-6	N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		20	0.70
27619-97-2	6:2 FTS	ND		20	1.0
39108-34-4	8:2 FTS	ND		20	0.56

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: MW-1AR

Date Collected: 10/31/18 15:30

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-1

Matrix: Water

Method: 8270D SIM ID - Semivolatile Organic Compounds (GC/MS SIM / Isotope Dilution)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,4-Dioxane	ND		0.20	0.016	ug/L		11/04/18 08:26	11/04/18 20:38	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,4-Dioxane-d8	27		10 - 150				11/04/18 08:26	11/04/18 20:38	1

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	31	B J-	1.6	0.32	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluoropentanoic acid (PFPeA)	11	J-	1.6	0.59	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorohexanoic acid (PFHxA)	6.9	J-	1.6	0.19	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluoroheptanoic acid (PFHpA)	3.3	J-	1.6	0.25	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorooctanoic acid (PFOA)	4.5	J-	1.6	0.25	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluoroundecanoic acid (PFUnA)	ND		1.6	0.20	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorobutanesulfonic acid (PFBS)	1.4	J J-	1.6	0.35	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorohexanesulfonic acid (PFHxS)	ND		1.6	0.21	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.65	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.42	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorooctanesulfonic acid (PFOS)	ND		1.6	0.60	ng/L		11/09/18 11:30	11/11/18 01:29	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.44	ng/L		11/09/18 11:30	11/11/18 01:29	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.36	ng/L		11/09/18 11:30	11/11/18 01:29	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.55	ng/L		11/09/18 11:30	11/11/18 01:29	1
6:2 FTS	ND		16	0.79	ng/L		11/09/18 11:30	11/11/18 01:29	1
8:2 FTS	ND		16	0.44	ng/L		11/09/18 11:30	11/11/18 01:29	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
13C8 FOSA	72		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C4 PFBA	19	*	25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C5-PFPeA DNU	39		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C2 PFHxA	44		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C4 PFHpA	60		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C4 PFOA	74		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C5 PFNA	86		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C2 PFDA	91		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C2 PFUnA	92		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C2 PFDoA	84		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C2 PFTeDA	89		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C3 PFBS	59		25 - 150				11/09/18 11:30	11/11/18 01:29	1
18O2 PFHxS	74		25 - 150				11/09/18 11:30	11/11/18 01:29	1
13C4 PFOS	79		25 - 150				11/09/18 11:30	11/11/18 01:29	1
d3-NMeFOSAA	74		25 - 150				11/09/18 11:30	11/11/18 01:29	1
d5-NEtFOSAA	82		25 - 150				11/09/18 11:30	11/11/18 01:29	1
M2-6:2 FTS	185	*	25 - 150				11/09/18 11:30	11/11/18 01:29	1
M2-8:2 FTS	111		25 - 150				11/09/18 11:30	11/11/18 01:29	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: FIELD BLANK

Date Collected: 10/31/18 13:30

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-2

Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	ND		1.6	0.33	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluoropentanoic acid (PFPeA)	ND		1.6	0.60	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorohexanoic acid (PFHxA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluoroheptanoic acid (PFHpA)	ND		1.6	0.26	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorooctanoic acid (PFOA)	0.26	J J-	1.6	0.26	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluoroundecanoic acid (PFUnA)	ND		1.6	0.20	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorobutanesulfonic acid (PFBS)	ND		1.6	0.35	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorohexanesulfonic acid (PFHxS)	ND		1.6	0.21	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.66	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.42	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorooctanesulfonic acid (PFOS)	ND		1.6	0.61	ng/L		11/09/18 11:30	11/11/18 01:45	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.45	ng/L		11/09/18 11:30	11/11/18 01:45	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.36	ng/L		11/09/18 11:30	11/11/18 01:45	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.56	ng/L		11/09/18 11:30	11/11/18 01:45	1
6:2 FTS	ND		16	0.80	ng/L		11/09/18 11:30	11/11/18 01:45	1
8:2 FTS	ND		16	0.45	ng/L		11/09/18 11:30	11/11/18 01:45	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C8 FOSA	54		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C4 PFBA	63		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C5-PFPeA DNU	70		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C2 PFHxA	70		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C4 PFHpA	77		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C4 PFOA	76		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C5 PFNA	81		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C2 PFDA	89		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C2 PFUnA	88		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C2 PFDoA	83		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C2 PFTeDA	80		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C3 PFBS	66		25 - 150	11/09/18 11:30	11/11/18 01:45	1
18O2 PFHxS	79		25 - 150	11/09/18 11:30	11/11/18 01:45	1
13C4 PFOS	79		25 - 150	11/09/18 11:30	11/11/18 01:45	1
d3-NMeFOSAA	77		25 - 150	11/09/18 11:30	11/11/18 01:45	1
d5-NEtFOSAA	89		25 - 150	11/09/18 11:30	11/11/18 01:45	1
M2-6:2 FTS	103		25 - 150	11/09/18 11:30	11/11/18 01:45	1
M2-8:2 FTS	88		25 - 150	11/09/18 11:30	11/11/18 01:45	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: MW-2R

Date Collected: 10/31/18 15:20

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-3

Matrix: Water

Method: 8270D SIM ID - Semivolatile Organic Compounds (GC/MS SIM / Isotope Dilution)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,4-Dioxane	ND		0.20	0.016	ug/L		11/04/18 08:26	11/04/18 20:55	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,4-Dioxane-d8	29		10 - 150				11/04/18 08:26	11/04/18 20:55	1

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	ND		1.6	0.33	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluoropentanoic acid (PFPeA)	ND		1.6	0.60	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorohexanoic acid (PFHxA)	1.3	J	1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluoroheptanoic acid (PFHpA)	0.28	J	1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorooctanoic acid (PFOA)	0.91	J U	1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluoroundecanoic acid (PFUnA)	0.20	J	1.6	0.20	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorobutanesulfonic acid (PFBS)	ND		1.6	0.35	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorohexanesulfonic acid (PFHxS)	ND		1.6	0.21	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.66	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.42	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorooctanesulfonic acid (PFOS)	ND		1.6	0.61	ng/L		11/09/18 11:30	11/11/18 02:01	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.45	ng/L		11/09/18 11:30	11/11/18 02:01	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.36	ng/L		11/09/18 11:30	11/11/18 02:01	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.56	ng/L		11/09/18 11:30	11/11/18 02:01	1
6:2 FTS	ND		16	0.80	ng/L		11/09/18 11:30	11/11/18 02:01	1
8:2 FTS	ND		16	0.45	ng/L		11/09/18 11:30	11/11/18 02:01	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
13C8 FOSA	62		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C4 PFBA	44		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C5-PFPeA DNU	50		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C2 PFHxA	42		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C4 PFHpA	56		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C4 PFOA	74		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C5 PFNA	88		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C2 PFDA	84		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C2 PFUnA	90		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C2 PFDoA	87		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C2 PFTeA	87		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C3 PFBS	72		25 - 150				11/09/18 11:30	11/11/18 02:01	1
18O2 PFHxS	74		25 - 150				11/09/18 11:30	11/11/18 02:01	1
13C4 PFOS	80		25 - 150				11/09/18 11:30	11/11/18 02:01	1
d3-NMeFOSAA	79		25 - 150				11/09/18 11:30	11/11/18 02:01	1
d5-NEtFOSAA	90		25 - 150				11/09/18 11:30	11/11/18 02:01	1
M2-6:2 FTS	213		25 - 150				11/09/18 11:30	11/11/18 02:01	1
M2-8:2 FTS	113		25 - 150				11/09/18 11:30	11/11/18 02:01	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: DUPLICATE

Date Collected: 10/31/18 15:22

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-4

Matrix: Water

Method: 8270D SIM ID - Semivolatile Organic Compounds (GC/MS SIM / Isotope Dilution)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,4-Dioxane	ND		0.20	0.016	ug/L		11/04/18 08:26	11/04/18 21:11	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,4-Dioxane-d8	33		10 - 150				11/04/18 08:26	11/04/18 21:11	1

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	ND		1.6	0.33	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluoropentanoic acid (PFPeA)	ND		1.6	0.59	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorohexanoic acid (PFHxA)	0.70	J	1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluoroheptanoic acid (PFHpA)	0.30	J	1.6	0.25	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorooctanoic acid (PFOA)	1.2	J U	1.6	0.25	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.30	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluoroundecanoic acid (PFUnA)	0.27	J	1.6	0.20	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorobutanesulfonic acid (PFBS)	ND		1.6	0.35	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorohexanesulfonic acid (PFHxS)	0.23	J	1.6	0.21	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.65	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.42	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorooctanesulfonic acid (PFOS)	0.64	J	1.6	0.60	ng/L		11/09/18 11:30	11/11/18 02:17	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.44	ng/L		11/09/18 11:30	11/11/18 02:17	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.36	ng/L		11/09/18 11:30	11/11/18 02:17	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.56	ng/L		11/09/18 11:30	11/11/18 02:17	1
6:2 FTS	ND		16	0.79	ng/L		11/09/18 11:30	11/11/18 02:17	1
8:2 FTS	ND		16	0.44	ng/L		11/09/18 11:30	11/11/18 02:17	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
13C8 FOSA	56		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C4 PFBA	40		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C5-PFPeA DNU	49		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C2 PFHxA	41		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C4 PFHpA	55		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C4 PFOA	72		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C5 PFNA	76		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C2 PFDA	79		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C2 PFUnA	78		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C2 PFDoA	73		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C2 PFTeA	72		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C3 PFBS	62		25 - 150				11/09/18 11:30	11/11/18 02:17	1
18O2 PFHxS	68		25 - 150				11/09/18 11:30	11/11/18 02:17	1
13C4 PFOS	73		25 - 150				11/09/18 11:30	11/11/18 02:17	1
d3-NMeFOSAA	65		25 - 150				11/09/18 11:30	11/11/18 02:17	1
d5-NEtFOSAA	77		25 - 150				11/09/18 11:30	11/11/18 02:17	1
M2-6:2 FTS	151	*	25 - 150				11/09/18 11:30	11/11/18 02:17	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: DUPLICATE

Date Collected: 10/31/18 15:22

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-4

Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits
M2-8:2 FTS	100		25 - 150

Prepared	Analyzed	Dil Fac
11/09/18 11:30	11/11/18 02:17	1

Client Sample ID: EQUIPMENT BLANK

Date Collected: 10/31/18 14:15

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-5

Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	ND		1.6	0.33	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluoropentanoic acid (PFPeA)	ND		1.6	0.61	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorohexanoic acid (PFHxA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluoroheptanoic acid (PFHpA)	ND		1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorooctanoic acid (PFOA)	ND		1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.31	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.31	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluoroundecanoic acid (PFUnA)	0.29	J J-	1.6	0.20	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorobutanesulfonic acid (PFBS)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorohexanesulfonic acid (PFHxS)	ND		1.6	0.21	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.66	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.43	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorooctanesulfonic acid (PFOS)	ND		1.6	0.61	ng/L		11/09/18 11:30	11/11/18 02:33	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.45	ng/L		11/09/18 11:30	11/11/18 02:33	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.36	ng/L		11/09/18 11:30	11/11/18 02:33	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.57	ng/L		11/09/18 11:30	11/11/18 02:33	1
6:2 FTS	ND		16	0.81	ng/L		11/09/18 11:30	11/11/18 02:33	1
8:2 FTS	ND		16	0.45	ng/L		11/09/18 11:30	11/11/18 02:33	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C8 FOSA	53		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C4 PFBA	70		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C5-PFPeA DNU	77		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C2 PFHxA	76		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C4 PFHpA	77		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C4 PFOA	82		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C5 PFNA	84		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C2 PFDA	91		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C2 PFUnA	85		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C2 PFDoA	79		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C2 PFTeDA	73		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C3 PFBS	69		25 - 150	11/09/18 11:30	11/11/18 02:33	1
18O2 PFHxS	76		25 - 150	11/09/18 11:30	11/11/18 02:33	1
13C4 PFOS	78		25 - 150	11/09/18 11:30	11/11/18 02:33	1
d3-NMeFOSAA	74		25 - 150	11/09/18 11:30	11/11/18 02:33	1
d5-NEtFOSAA	87		25 - 150	11/09/18 11:30	11/11/18 02:33	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: EQUIPMENT BLANK

Date Collected: 10/31/18 14:15

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-5

Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
M2-6:2 FTS	125		25 - 150	11/09/18 11:30	11/11/18 02:33	1
M2-8:2 FTS	94		25 - 150	11/09/18 11:30	11/11/18 02:33	1

Client Sample ID: MW-3R

Date Collected: 10/31/18 15:15

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-6

Matrix: Water

Method: 8270D SIM ID - Semivolatile Organic Compounds (GC/MS SIM / Isotope Dilution)

1,4-Dioxane - Semi-Quant - Organic Compounds (Semi-Quant - Isotope Dilution)									
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,4-Dioxane	ND	F1 F2	0.20	0.016	ug/L		11/04/18 08:26	11/04/18 18:58	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,4-Dioxane-d8	31		10 - 150				11/04/18 08:26	11/04/18 18:58	1

Method: 537 (modified) - Fluorinated Alkyl Substances

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	ND		1.6	0.33	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluoropentanoic acid (PFPeA)	ND		1.6	0.61	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorohexanoic acid (PFHxA)	0.22	J	1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluoroheptanoic acid (PFHpA)	ND		1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorooctanoic acid (PFOA)	0.47	J U	1.6	0.26	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorononanoic acid (PFNA)	ND		1.6	0.31	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorodecanoic acid (PFDA)	ND		1.6	0.31	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluoroundecanoic acid (PFUnA)	0.20	J	1.6	0.20	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorododecanoic acid (PFDoA)	ND		1.6	0.28	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorotridecanoic acid (PFTriA)	ND		1.6	0.19	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorotetradecanoic acid (PFTeA)	ND		1.6	0.37	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorobutanesulfonic acid (PFBS)	ND		1.6	0.36	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorohexanesulfonic acid (PFHxS)	ND		1.6	0.21	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluoroheptanesulfonic Acid (PFHpS)	ND		1.6	0.67	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorodecanesulfonic acid (PFDS)	ND		1.6	0.43	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorooctanesulfonic acid (PFOS)	ND		1.6	0.62	ng/L		11/09/18 11:30	11/11/18 02:49	1
Perfluorooctanesulfonamide (FOSA)	ND		1.6	0.45	ng/L		11/09/18 11:30	11/11/18 02:49	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	ND		16	0.37	ng/L		11/09/18 11:30	11/11/18 02:49	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	ND		16	0.57	ng/L		11/09/18 11:30	11/11/18 02:49	1
6:2 FTS	ND		16	0.81	ng/L		11/09/18 11:30	11/11/18 02:49	1
8:2 FTS	ND		16	0.45	ng/L		11/09/18 11:30	11/11/18 02:49	1
Isotope Dilution	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
13C8 FOSA	67		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C4 PFBA	58		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C5-PFPeA DNU	62		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C2 PFHxA	69		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C4 PFHpA	72		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C4 PFOA	82		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C5 PFNA	85		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C2 PFDA	91		25 - 150				11/09/18 11:30	11/11/18 02:49	1
13C2 PFUnA	89		25 - 150				11/09/18 11:30	11/11/18 02:49	1

TestAmerica Burlington

Client Sample Results

Client: New York State D.E.C.
Project/Site: Granite Pte Subdiv-Off Site #C360107A

TestAmerica Job ID: 200-46033-1

Client Sample ID: MW-3R

Date Collected: 10/31/18 15:15

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-6

Matrix: Water

Method: 537 (modified) - Fluorinated Alkyl Substances (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C2 PFDoA	76		25 - 150	11/09/18 11:30	11/11/18 02:49	1
13C2 PFTeDA	80		25 - 150	11/09/18 11:30	11/11/18 02:49	1
13C3 PFBS	72		25 - 150	11/09/18 11:30	11/11/18 02:49	1
18O2 PFHxS	86		25 - 150	11/09/18 11:30	11/11/18 02:49	1
13C4 PFOS	78		25 - 150	11/09/18 11:30	11/11/18 02:49	1
d3-NMFOFOSAA	86		25 - 150	11/09/18 11:30	11/11/18 02:49	1
d5-NEFOSAA	83		25 - 150	11/09/18 11:30	11/11/18 02:49	1
M2-6:2 FTS	139		25 - 150	11/09/18 11:30	11/11/18 02:49	1
M2-8:2 FTS	116		25 - 150	11/09/18 11:30	11/11/18 02:49	1

Client Sample ID: DRUM WASTE CHAR

Date Collected: 10/31/18 15:35

Date Received: 11/02/18 10:10

Lab Sample ID: 200-46033-7

Matrix: Water

Method: 6010D - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Lead	6.7	J	10.0	2.5	ug/L		11/09/18 01:00	11/09/18 17:23	1