

Appendix I

OMP Factual reports

Sampling Event Factual Report, April 2024

PFAS OMP - Jervis Bay Range Facility and HMAS Creswell

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Sampling Event Factual Report, April 2024

PFAS OMP - Jervis Bay Range Facility and HMAS Creswell

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List of Acronyms

Acronym	Term
ADWG	Australian Drinking Water Guidelines
AEC	Area of Environmental Concern
AECOM	AECOM Australia Pty Ltd
AFFF	Aqueous Film Forming Foam
Defence	Department of Defence
DoH	Department of Health
DQI	Data Quality Indicator
DQO	Data Quality Objective
FSANZ	Food Standards Australia New Zealand
HEPA	Heads of Environment Protection Authority
HMAS	His Majesty's Australian Ship
LOR	Limit of Reporting
MW	Monitoring Well
NATA	National Analytical Testing Authority
NEMP	National Environmental Management Plan
NEPC	National Environment Protection Council
NHMRC	National Health and Medical Research Council
NSW	New South Wales
OMP	Ongoing Monitoring Plan
OMR	Ongoing Monitoring Report
ORP	Oxidation-Reduction Potential
PFAS	Per- and poly-fluoroalkyl Substances
PFHxS	Perfluorohexane Sulfonic Acid
PFOA	Perfluorooctanoic Acid
PFOS	Perfluorooctane Sulfonic Acid
PMAP	PFAS Management Area Plan
QA/QC	Quality Assurance / Quality Control
RPD	Relative Percentage Difference
SAQP	Sampling and Analysis Quality Plan
SD	Sediment
SW	Surface Water
TDS	Total Dissolved Solids
TOC	Top of Casing

List of Units

Units	Term
°C	Degrees Celsius
µg/L	Micrograms per Litre
µS/cm	MicroSiemens per centimetre
g	Grams
km	Kilometre
L	Litre
m	Metre
mAHD	Metres Australian Height Datum
mbgl	Metres below ground level
mbTOC	Metres below Top of Casing
mg/kg	Milligrams per Kilogram
mg/L	Milligrams per Litre
mV	MilliVolts

1.0 Introduction

1.1 General

AECOM Australia Pty Ltd (AECOM) has been engaged by the Department of Defence (Defence) to implement the per- and poly-fluoroalkyl substances (PFAS) Ongoing Monitoring Plan (OMP) at the Jervis Bay Range Facility (JBRF) and His/Her Majesty's Australian Ship (HMAS) Creswell (the 'Site') in the Jervis Bay Territory. The location of the Site, Management Area and Monitoring Area is shown in **Figure F1 in Appendix A**.

The OMP (Defence, 2020a) outlines the sampling requirements for the Site and off-Site areas.

Following each sampling event, factual sampling event reports will be prepared. An Ongoing Monitoring Report (OMR) will be prepared following the completion of each 12-month sampling period.

This Sampling Event Factual Report has been prepared to report the results of the April 2024 biannual sampling event, specifically highlighting first-time detections and/or new exceedances of human health or ecological screening criteria for the sum of Perfluorooctane sulfonic acid (PFOS) and Perfluorohexane sulfonic acid (PFHxS) (herein referred to as PFOS+PFHxS), PFOS and/or Perfluorooctanoic acid (PFOA).

This report has been prepared in accordance with the Defence *Ongoing Monitoring Program Reporting Guidance* issued in May 2021 (Defence, 2021).

1.2 Objectives

The objectives were to:

- implement the OMP (Defence, 2020a) prepared as part of the Detailed Environmental Investigations; and
- collect data that will enable Defence to maintain an up-to-date understanding of the distribution, concentration, transport, and transformation of PFAS.

The data will assist in the timely identification of risks and inform Defence's approach to the management of PFAS, including updates and revisions to the PFAS Management Area Plan (PMAP) (Defence, 2020b).

The objective of this phase of works was to implement the scope of works for the April 2024 biannual sampling event in accordance with the Sampling and Analysis Quality Plan (SAQP) (AECOM, 2024).

2.0 Scope of Work

The scope of works was completed generally in accordance with the SAQP (AECOM, 2024), as follows:

- obtain permission (where required) to conduct works at the Site, off-Site publicly accessible areas and commercial properties, and off-Site areas around Wreck Bay Village managed by the Wreck Bay Aboriginal Community Council
- gauging of groundwater levels in all 63 scheduled groundwater monitoring wells (refer to **Table 1** below and **Figure F2** in **Appendix A** for specific locations)
- groundwater sampling and collection of water quality parameters at all 55 scheduled groundwater monitoring wells (refer to **Table 1** below and **Figures F2** in **Appendix A** for specific locations)
- surface water sampling and collection of water quality parameters at 68 of 74 scheduled surface water locations (refer to **Table 2** below and **Figure F3** in **Appendix A** for specific locations)
- sediment sampling at 59 of 62 scheduled sediment locations (refer to **Table 3** below and **Figure F4** in **Appendix A** for specific locations)
- tank water sampling at all 6 scheduled tank water locations (refer to **Table 4** below and **Figure F5** in **Appendix A** for specific locations)
- collection of field duplicate samples at a rate of 1 in 10 primary samples
- analysis of samples for PFAS suite at the standard limit of reporting (LOR), with the exception of 8 groundwater samples and 2 surface water samples which were analysed for PFAS suite at the Super Trace LOR
- data management of the OMP field and laboratory data in Defence ESdat database
- preparation of this Sampling Event Factual Report.

Table 1 Groundwater Sampling Locations

On/Off-Site	Area	Site ID	Gauging / Sampling Locations	Number of Locations	Total
On-Site HMAS Creswell	AEC E	0020	MW017, MW109, MW110, MW111	4	10
	AEC F	0020	MW037, MW112, MW115	3	
	Captains Lagoon	0020	MW012	1	
	Other HMAS Creswell	0020	MW001 , MW007	2	
On-Site JBRF	AEC A	0021	MW024, MW061, MW062, MW101, MW102, MW103, MW104, MW105, MW106, MW107, MW108, MW109, MW150, MW151, MW152, MW153, MW154, MW155	18	37
	AEC B	0021	MW110, MW111, MW113	3	
	AEC C	0021	MW028, MW030, MW117, MW118, MW119, MW120, MW121, MW123, MW124,	9	
	AEC H	0021	MW025, MW026	2	
	Other JBRF/ Lakes	0021	MW022, MW112, MW125, MW126, MW128	5	
Off-Site	Captains Lagoon	0020	MW102D, MW104 , MW105	3	16

On/Off-Site	Area	Site ID	Gauging / Sampling Locations	Number of Locations	Total
Off-Site	Lake Windermere / Lake McKenzie	0021	MW114, MW115, MW129, MW130, MW135, MW136, MW137, MW138, MW139, MW140	10	
	Mary Creek	0021	MW131, MW132, MW133	3	
Total (gauge and sample)					55
Total (gauge only)					8
Total					63
Bold text indicates gauge only location.					

Table 2 Surface Water Monitoring Locations

On/Off-Site	Area	Site ID	Sampling Locations	Number of Locations	Total
On-Site HMAS Creswell	AEC E	0020	SW016, SW018	2	13
	AEC F	0020	SW022, SW023	2	
	AEC G	0020	SW035, SW036, SW037	3	
	Captains Lagoon	0020	SW004, SW005, SW010	3	
	Flatrock Creek	0020	SW026, SW027, SW029	3	
On-Site JBRF	AEC A	0021	SW001, SW002, SW003, SW110, SW111*, SW112, SW130	7	27
	AEC B	0021	SW004, SW010, SW011, SW127, SW153	5	
	AEC C	0021	SW027	1	
	Captains Lagoon	0021	SW013	1	
	Flatrock Creek	0021	SW022, SW024, SW025	3	
	Mary Creek	0021	SW048	1	
	Site drainage channels	0021	SW005, SW006, SW016*, SW017*, SW018*, SW019, SW020, SW021, SW126	9	
Off-Site	Captains Lagoon	0020	SW011, SW012	2	34
	Flatrock Creek	0020	SW030, SW032, SW033	3	
	Lake McKenzie	0021	SW032, SW034, SW035	3	
	Lake Windermere	0021	SW036, SW037, SW038*, SW040	4	
	Mary Creek	0021	SW043, SW044, SW045, SW051*, SW052, SW053	6	
	Ryan's Swamp	0021	SW083	1	
	Summercloud Creek	0021	SW056, SW057, SW058, SW059, SW085	5	
	Telegraph Creek	0021	SW060, SW062, SW064, SW068, SW069	5	
	Unnamed Water Body	0021	SW076, SW077, SW078, SW079, SW080	5	
Total					74
*Location not sampled. Refer to Table 5 for further details.					

Table 3 Sediment Sampling Locations

On/Off-Site	Area	Site ID	Sampling Locations	Number of Locations	Total
On-Site HMAS Creswell	AEC E	0020	SD028	1	9
	AEC F	0020	SD032, SD033	2	
	Captains Lagoon	0020	SD018, SD019, SD024	3	
	Flatrock Creek	0020	SD001, SD002, SD004	3	
On-Site JBRF	AEC A	0021	SD001, SD002, SD003,	3	20
	AEC B	0021	SD004, SD006, SD007	3	
	AEC C	0021	SD023	1	
	Captains Lagoon	0021	SD009	1	
	Flatrock Creek	0021	SD018, SD020, SD021	3	
	Mary Creek	0021	SD040	1	
	Site drainage channels	0021	SD005, SD012, SD013, SD014*, SD015, SD016, SD017, SD110	8	
Off-Site	Captains Lagoon	0020	SD025, SD026	2	33
	Flatrock Creek	0020	SD006, SD007	2	
	Lake McKenzie	0021	SD028, SD029, SD080	3	
	Lake Windermere	0021	SD030, SD031, SD032*, SD093	4	
	Mary Creek	0021	SD035, SD036, SD037, SD043*, SD044, SD111	6	
	Ryan's Swamp	0021	SD073	1	
	Summercloud Creek	0021	SD046, SD047, SD048, SD049, SD075	5	
	Telegraph Creek	0021	SD050, SD052, SD054, SD058, SD059	5	
	Unnamed Water Body	0021	SD066, SD067, SD068, SD069, SD070	5	
Total					62
*Location not sampled. Refer to Table 5 for further details.					

Table 4 Tank Water Sampling Locations

On/Off-Site	Area	Site ID	Sampling Locations	Number of Locations
On-Site JBRF	AEC A	0021	OTH001, OTH002, OTH003, OTH004, OTH005, OTH006	6

3.0 Deviations from the SAQP

The April 2024 biannual sampling event was completed in general accordance with the SAQP (AECOM, 2024) with the exception of the deviations outlined in **Table 5** below.

Table 5 Deviations from SAQP (AECOM, 2024)

SAQP Deviation	Comment / Justification	Impact on Dataset
Samples, as well as associated water quality parameters, were not collected from 6 of the 74 scheduled surface water sampling locations.	Surface water locations 0021_SW016 and 0021_SW017 were dry and therefore could not be sampled during this event. Surface water location 0021_SW018 was located within a construction area and therefore could not be accessed/sampled during this event.	The lack of sampling data at these locations is not considered to have a significant impact on the existing data or present a significant data gap, as surface water locations 0021_SW005, 0021_SW006, 0021_SW019, 0021_SW020, 0021_SW021 and 0021_SW126 within the same area (site drainage channels) were able to be sampled during this event. Additionally, the lack of water at 0021_SW016 and 0021_SW017 confirms that the source> pathway> receptor linkages for PFAS in surface water in the area were incomplete during sampling.
	Surface water location 0021_SW111 was dry and therefore could not be sampled during this event.	The lack of sampling data at this location is not considered to have a significant impact on the existing data or present a significant data gap, as surface water locations 0021_SW110 and 0021_SW112 within the same area (AEC A) were able to be sampled during this event. Additionally, the lack of water at 0021_SW111 confirms that the source> pathway> receptor linkages for PFAS in surface water in the area were incomplete during sampling.
	Surface water location 0021_SW038 was inaccessible due to the access path (lake beach) being submerged by high lake water levels and could not be sampled during this event.	The lack of sampling data at this location is not considered to have a significant impact on the existing data or present a significant data gap, as other surface water locations 0021_SW036 and 0021_SW037 were able to be sampled within Lake Windermere during this event.
	Surface water location 0021_SW051 was inaccessible due to the location being off the coastline and only accessible by boat and therefore could not be sampled during this event.	The lack of sampling data at this location is not considered to have a significant impact on the existing data or present a significant data gap, as another representative surface water location 0021_SW052 was able to be sampled within Summercloud Bay during this event.

SAQP Deviation	Comment / Justification	Impact on Dataset
Samples, as well as associated field data, were not collected from 3 of the 62 scheduled sediment locations.	Sediment location 0021_SD014 was located within a construction area and therefore could not be accessed/sampled during this event.	The lack of sampling data at this location is not considered to have a significant impact on the existing data or present a significant data gap, as sediment locations 0021_SD013, 0021_SD015 and 0021_SD016 within the same area (site drainage channels) were able to be sampled during this event.
	Sediment location 0021_SD032 was inaccessible due to the access path (lake beach) being submerged by high lake water levels and therefore could not be sampled during this event.	The lack of sampling data at this location is not considered to have a significant impact on the existing data or present a significant data gap, as other sediment locations 0021_SD030 and 0021_SD031 were able to be sampled within Lake Windermere during this event.
	Sediment location 0021_SD043 was inaccessible due to the location being off the coastline and only accessible by boat and therefore could not be sampled during this event.	The lack of sampling data at this location is not considered to have a significant impact on the existing data or present a significant data gap, as another representative sediment location 0021_SD044 was able to be sampled within Summercloud Bay during this event.
Samples OTH003 and OTH005 were collected using dedicated disposable bailers, rather than using a peristaltic pump	The field team determined that these sampling locations were accessible using a bailer, therefore a peristaltic pump was not required.	Given that concentrations of PFAS in these samples were within the historical range, this change in sampling methodology is not considered to impact the reliability of the dataset (AECOM, 2024)

4.0 Methodology

4.1 Sampling Methodology

The methodology used for the April 2024 biannual sampling event was in accordance with the SAQP (AECOM, 2024) and is summarised in **Table 6** below.

Table 6 Sampling Methodology

Item	Details
Groundwater gauging	The depth to groundwater was measured in each monitoring well immediately prior to collection of groundwater samples (where sampling was required) using an interface probe.
Field parameters	Temperature, electrical conductivity, dissolved oxygen, oxidation-reduction potential (ORP), pH and observations of water quality were recorded for groundwater and surface water (inclusive of tank water) samples. Field parameters were collected using a calibrated water quality meter. The equipment supplier service and calibration records and field calibration records are provided in Appendix C.
Sampling methodology	Groundwater Monitoring Wells The groundwater samples were generally collected from each monitoring well using HydraSleeves™, a no-purge sampling methodology. HydraSleeves™ were installed within the screened interval of the wells for a minimum of 24 hours prior to the sampling round, based on a review of the well construction log. For this event, all the HydraSleeves™ were installed during the previous sampling round in October 2023. At the request of Defence, new HydraSleeves™ were not deployed following the collection of samples . Surface Water Surface water samples were collected from either mid-way through the water column or approximately 0.5 m below the surface, without disturbing the bottom of the surface water body, and without capturing any surface film or floating materials in the samples. At each location, a new, laboratory supplied container was lowered into the water (either by hand or using a sampling pole) with the cap immediately applied once the container was full. Sediment Sediment samples representative of potentially deposited sediments were collected from below the water body, using a hand trowel to a maximum depth of 0.3 metres below ground level (mbgl). A new laboratory supplied container was used at each location for collection of samples. Tank Water Water samples were collected from tanks and/or open pits with the following methodology: • OTH001: Sample collected directly from the opening top of the tank using a disposable bailer • OTH002: Sample collected directly from the opening top of the tank using a disposable bailer • OTH003: Sample collected from the open pit using a disposable bailer • OTH004: Sample collected from tap connected to tank

Item	Details
	- OTH005: Sample collected from underground tank using a disposable bailer - OTH006: Sample collected from open sump tank below unit directly into sampling containers. A new laboratory supplied container was used at each location for collection of samples.
QA/QC Samples	A Quality Assurance and Quality Control (QA/QC) program was implemented for the sampling and analysis program in order to obtain representative data and assess the reliability of the data obtained. To facilitate the QA/QC program the following sample types were obtained during the sampling program: <i>Intra-laboratory duplicates</i> collected at a rate of 1 in 10 primary samples. The relative percentage difference (RPD) should be less than 30%, or less than 50% if results are less than 20 times the LOR. Higher RPDs may also be acceptable if results are less than 10 times the LOR. <i>Inter-laboratory duplicates</i> collected at a rate of 1 in 10 primary samples. The RPD should be less than 30%, or less than 50% if results are less than 20 times the LOR. Higher RPDs may also be acceptable if results are less than 10 times the LOR. <i>Rinsate blanks</i> collected at a frequency of one per set of sampling equipment per day where equipment was reused between locations. Analytical results should be below the LOR. <i>Field blanks</i> collected at a frequency of one per day of sampling. Analytical results should be below the LOR. For this April 2024 biannual sampling event, the QA/QC samples included: 21 x intra-laboratory duplicates [14 for water (including 7 groundwater and 7 surface water) and 7 for sediment], which met and exceeded the target frequency based on the analysis of 123 primary water and 59 primary sediment samples. 21 x inter-laboratory duplicates, [14 for water (including 7 groundwater and 7 surface water) and 7 for sediment], which met and exceeded the target frequency based on the analysis of 123 primary water and 59 primary sediment samples. 6 x rinsate blanks, which met the target frequency 6 x field blanks, which met the target frequency. The data validation assessment is presented in Appendix D.

Item	Details
Sample analysis	Samples were submitted to the primary and secondary laboratories for PFAS suite analysis at the standard LOR (0.02 µg/L – 0.1 µg/L for water and 0.0002 – 0.001 mg/kg for sediment), with the exception of 10 groundwater samples (8 primary, 1 inter-laboratory duplicate and 1 intra-laboratory duplicate) and 2 primary surface water samples which were analysed for PFAS suite at the Super Trace LOR (0.002 – 0.005 µg/L). ALS Environmental (ALS) Sydney, NSW was used as the primary laboratory. Envirolab Services (Envirolab) Sydney, NSW was used as the secondary laboratory. ALS and Envirolab methods for analyses were certified by the National Association of Testing Authorities (NATA). A summary of the laboratory results is presented in Section 5.3 and the laboratory certificates are presented in Appendix F.

4.2 Adopted Screening Criteria

Guidance documents used to assess the dataset include the following:

- Heads of EPAs Australia and New Zealand (HEPA) 2020. *PFAS National Environmental Management Plan 2.0*. January 2020.
- Department of Health (DoH), 2017. *Health Based Guidance Values for PFAS for use in site investigations in Australia*. April 2017.
- FSANZ (Food Standards Australia New Zealand), 2017. *Supporting Document 1: Hazard assessment report – Perfluorooctane Sulfonate (PFOS), Perfluorooctanoic Acid (PFOA), Perfluorohexane Sulfonate (PFHxS)*.
- National Health and Medical Research Council (NHMRC), 2019. *Guidance on PFAS in Recreational Water*. August 2019.
- National Environment Protection Council (NEPC), 2013. *Schedule B1. National Environment Protection (Assessment of Site Contamination) Measure 1999 (as amended 2013) Schedule B1 Guideline on Investigation Levels For Soil and Groundwater*.

The adopted PFAS screening criteria to assess the data generated as part of the OMP are presented in **Table 7**.

Table 7 Summary of Adopted Screening Criteria: Water

Pathway	Compound	Criteria	Comment/Reference
Human Health Receptors			
Drinking water – Non-saline Groundwater and Surface Water	PFOS + PFHxS	0.07 µg/L	The values presented in the PFAS NEMP (HEPA 2020) are from the DoH (2017), which published final health-based guidance values for PFAS for use in site investigations in Australia. DoH utilised the Tolerable Daily Intake for PFOS and PFOA from FSANZ (2017) and the methodology described in Chapter 6.3.3 of the National Health and Medical Research Council's (NHMRC) Australian Drinking Water Guidelines (ADWG) (2022) to determine drinking water values. For PFHxS, DoH (2017) noted that '<i>FSANZ concluded that there was not enough toxicological and epidemiological information to justify establishing a tolerable daily intake. However, as a precaution, and for the purposes of site investigations, the PFOS tolerable daily intake should apply to PFHxS. In practice, this means that the level of PFHxS exposure should be added to the level of PFOS exposure; and this combined level be compared to the tolerable daily intake for PFOS</i>'. <i>Results from non-saline* groundwater and surface water locations have been compared to these criteria.</i> <i>*Note that non-saline locations were defined by total dissolved solid (TDS) values less than 1,200 mg/L as per NHMRC (2022).</i>
	PFOA	0.56 µg/L	

Pathway	Compound	Criteria	Comment/Reference
Recreational use – surface water	PFOS + PFHxS	2 µg/L	In August 2019, NHMRC released guidance on the assessment of PFAS in surface water. Rather than adopting an ingestion rate of 0.2 L of water per day (as per the ADWG formula), NHMRC adjusted this rate with consideration of an event frequency (150 events/year) to calculate an annual ingestion rate of 30 L per year. These values were adopted by the PFAS NEMP 2.0 (HEPA 2020). <i>All surface water results have been compared to these criteria.</i>
	PFOA	10 µg/L	
Ecological receptors			
Freshwater and Marine (groundwater and surface water)	PFOS	0.00023 µg/L	The values are from the PFAS NEMP (HEPA 2020) which endorsed the Australian and New Zealand Guidelines for Fresh and Marine Water Quality. The 99% species protection level (for freshwater and interim marine) has been applied for high value conservation systems. This approach is generally adopted for chemicals that bioaccumulate and biomagnify in wildlife. It is proposed that the laboratory LOR is adopted for the purposes of preliminary screening of analytical water results, rather than sole use of the criteria value. <i>All groundwater and surface water results have been compared to these criteria.</i>
	PFOA	19 µg/L	
Freshwater and Marine (groundwater and surface water in AEC A)	PFOS	31 µg/L	The values are from the PFAS NEMP (HEPA 2020) which endorsed the Australian and New Zealand Guidelines for Fresh and Marine Water Quality. The 80% species protection level (for freshwater) has been applied for highly disturbed systems. <i>All groundwater and surface water results within the AEC A boundary in JBRT have been compared to these criteria.</i>
	PFOA	1,824 µg/L	

4.3 Data Quality Objectives and Data Validation

The data quality objectives (DQOs) and data quality indicators (DQIs) adopted for these works are presented in the SAQP (AECOM, 2024). Data validation assessment is provided in **Appendix D**.

Data validation procedures employed in the assessment of the field and laboratory QA/QC data, completed as per Section 3.2 of the SAQP, indicated that the reported analytical results are representative of the sample locations and that the overall quality of the analytical data produced is acceptably reliable (i.e. >95% of the data was suitable for use and DQIs passed acceptance criteria) for the purpose of the factual report.

Note that following receipt of PFAS results which were reported outside historical ranges for samples 0020_SD026, 0021_SD028, 0021_SD030, 0021_SD036, 0021_SD047, 0021_SD048, the primary and secondary laboratories were requested to repeat the analysis, which confirmed the originally reported concentrations.

All data collected during the monitoring period had been reviewed and uploaded to the Defence ESdat database in accordance with the Defence Contamination Management Manual requirements.

5.0 Field Observations and Results

5.1 General Observations

The weather conditions and general observations (including activities that may impact the monitoring program) recorded during the April 2024 biannual sampling event completed between 8 and 12 April 2024 are summarised in **Table 8** below.

Table 8 General Observations

Items	Observations
Weather Conditions	During the sampling event, the weather was observed to be variable, with maximum daily temperatures between 16.6°C (9 April 2024) and 22.1°C (8 April 2024), and with 18.6 mm of cumulative rainfall recorded at Jervis Bay (Jervis Bay Airfield AWS, 68264) (Bureau of Meteorology, 2024), with most of the rainfall recorded on 8 April (9.0 mm) and 10 April 2024 (9.4 mm).
Estate Management Works, Training Activities and/or Construction Works.	No estate management works or training activities were observed during the sampling event that would impact the sampling program. A construction zone adjacent to the southern part of the JBRF runway impeded the sampling of one co-located surface water and sediment location (0021_SW018 / 0021_SD014) during the sampling event.

5.2 Field Observations and Measurements

The observations and measurements recorded during the field activities for the April 2024 biannual sampling event are summarised in **Table 9**, below.

Table 9 Field Observations and Measurements

Item	Description
Monitoring Well Network Condition	The majority of the wells sampled were observed to be in good condition with the exception of the following: 0020_MW007: well gatic full of water above the top of casing (TOC) (drained prior to sampling). 0020_MW104: well monument padlock destroyed and monument lid not closed. 0020_MW105: well monument and casing damaged (knocked over at ground level). 0020_MW111: well gatic in poor condition, full of mud and loose around casing, well gatic footing partly damaged. 0020_MW112: well gatic lid in poor condition, with bolts rusted in place but well still accessible. 0021_MW061: well observed to be potentially blocked at 1.5 metres below top of casing (mbTOC). 0021_MW101: well gatic full of water above the TOC (drained prior to sampling), and bolts unable to be fasted in gatic lid. 0021_MW109: well gatic concrete footing damaged and gatic partly rusted. 0021_MW115: well monument partly rusted due to flooding in surrounding area, well monument full of water below TOC. 0021_MW121: well gatic full of water above the TOC (drained prior to sampling).

Item	Description
	0021_MW123: well gatic concrete footing partly damaged. 0021_MW125: well monument lid rusted and unhinged from monument. 0021_MW150: well gatic partly rusted and full of water above the TOC (drained prior to sampling). 0021_MW151: well gatic damaged. 0021_MW152: well gatic full of water above the TOC (drained prior to sampling). With the exception of 0021_MW115, all sample results were either within the historical range, or within the same order of magnitude as historical maximums and/or minimums, indicating that the samples collected were representative. In 0021_MW115, concentrations of PFAS were reported at the standard laboratory LOR (0.02 µg/L) where historically they were detected at super-trace concentrations (below the standard LOR). It is considered unlikely that the observed rusting of the monument, or water present within the base of the monument, have impacted the reliability of the results given that the J-cap was in place. As noted in Section 4.3, the sampling data collected is considered to be reliable for the purposes of meeting the objectives of the OMP.
Water Observations	The following were observed or noted during the sampling event: - foam of unknown origin on the water surface at two surface water locations (0021_SW062 and 0021_SW110). Given that reported concentrations of PFAS in these samples was consistent with historical results, it is considered unlikely that the observed foam was anthropogenic in nature. - hydrocarbon odour at one groundwater location (0021_MW133). - organic odour at one groundwater location (0021_MW025) and seven surface water locations (0020_SW010, 0020_SW016, 0020_SW032, 0021_SW022, 0021_SW060, 0021_SW068, 0021_SW069). - sulfurous odour at two groundwater locations (0021_MW025 and 0021_MW106). - chlorine-like odour at one tank water location (0021_OTH004).
Depth to Groundwater and Flow Direction	Depth to groundwater ranged between 0.014 (0021_MW024) and 19.890 (0020_MW102D) mbTOC. Groundwater elevation ranged between 0.794 (0020_MW007) and 78.880 (0021_MW102) metres Australian Height Datum (mAHD). Groundwater gauging data is presented in Table T1 in Appendix B. Inferred groundwater contours and groundwater flow direction for the upper overburden aquifer based on the data from this sampling event are shown on Figure F6 in Appendix A. The inferred local groundwater flow direction in the upper overburden aquifer was to the north, west and south, which was generally consistent with findings of the Detailed Site Investigation (GHD, 2019). Note that gauging data from a number of groundwater monitoring wells were omitted from the contour plan due to the following: 0020_MW105 – damage to the top of casing likely resulting in inaccurate water elevation reading 0021_MW129, 0021_MW130, 0021_MW135, 0021_MW136, 0021_MW138, 0021_MW139 – installed in the underlying lower aquifer.

Item	Description
Water Quality Parameters	Groundwater and surface water (inclusive of tank water) quality parameters were measured during the collection of water samples. The readings are presented in Table T2 and Table T4 in Appendix B and are summarised below: Groundwater Quality Parameters - Dissolved oxygen ranged from 0.67 mg/L (0020_MW037, 0021_MW138) to 6.77 mg/L (0020_MW110) indicating poor to well oxygenated conditions. - Electrical conductivity ranged from 91.1 µS/cm (0021_MW025) to 1,792 µS/cm (0021_MW030) indicating fresh to brackish conditions. - pH ranged from 3.71 (0020_MW105) to 7.12 (0020_MW007) indicating acidic to neutral conditions. - ORP (corrected) ranged from 91.4 mV (0021_MW129) to 554.8 mV (0021_MW108) indicating reducing to oxidising conditions. - Temperature ranged from 15.0°C (0021_MW139) to 24.2°C (0021_MW061). Surface Water Quality Parameters - Dissolved oxygen ranged from 2.29 mg/L (0020_SW016) to 11.05 mg/L (0021_SW021) indicating moderately to well oxygenated conditions. - Electrical conductivity ranged from 93.2 µS/cm (0021_SW022) to 47,395 µS/cm (0020_SW033) indicating fresh to saline conditions. - pH ranged from 3.55 (0021_SW058) to 8.84 (0020_SW018) indicating acidic to alkaline conditions. - ORP (corrected) ranged from 159.0 mV (0021_SW013) to 543.0 mV (0020_SW035) indicating reducing to oxidising conditions. - Temperature ranged from 14.6°C (0021_SW035) to 24.4°C (0020_SW004).
Sediment Observations	Sediment sampled and logged during this monitoring event comprised of sand, silt gravel, and clay materials with varying amounts of organic material (roots, leaves). No anthropogenic inclusions or staining was observed. Refer to in Table T6 in Appendix B for a summary of sediment classifications and observations.

5.3 Summary of Analytical Results

5.3.1 Groundwater Analytical Results

The PFAS groundwater analytical results from this sampling event are presented in **Table T3** in **Appendix B**. In summary, 55 primary groundwater samples were analysed for PFAS compounds, with concentrations of:

- PFOS+PFHxS, PFOS and/or PFOA reported above laboratory LOR in 39 primary samples
- PFOS and/or PFOA exceeded the 99% ecosystem protection ecological screening criteria in 37 of the primary samples
- PFOS+PFHxS and/or PFOA exceeded the adopted human health screening criteria in 31 of the primary groundwater samples with TDS values less than 1,200 mg/L
- PFOS and/or PFOA exceeded the adopted 80% ecosystem protection ecological screening criteria in three of the primary samples within AEC A.

There were no first-time detections or new exceedances of adopted screening criteria for PFOS+PFHxS, PFOS and/or PFOA in the groundwater samples analysed.

5.3.2 Surface Water Analytical Results

The PFAS surface water analytical results from this sampling event (inclusive of tank water) are presented in **Table T5** in **Appendix B**. In summary, 68 primary surface water samples and 6 tank water samples were analysed for PFAS compounds, with concentrations of:

- PFOS+PFHxS, PFOS and/or PFOA reported above the laboratory LOR in 47 primary surface water and in five tank water samples
- PFOS+PFHxS and/or PFOA exceeded the adopted human health recreational screening criteria in eight primary surface water samples and two tank water samples
- PFOS and/or PFOA exceeded the adopted 99% ecosystem protection ecological screening criteria in 46 of the primary surface water and five of the tank water samples
- PFOS+PFHxS and/or PFOA exceeded the adopted human health drinking water screening criteria in 32 primary surface water samples and four tank water samples with TDS values of less than 1,200 mg/L
- PFOS and/or PFOA were below the adopted 80% ecosystem protection ecological screening criteria in the surface water and tank water samples collected at AEC A.

Deviations from the historical dataset are provided in **Table 10** below and on **Figure F7** in **Appendix A**.

Table 10 Deviations from Historical Dataset - Surface Water and Tank Water

Deviation Type	Surface water & Tank water sampling location	Sum of PFOS+PFHxS (µg/L)		PFOA (µg/L)		PFOS (µg/L)	
		Apr 2024	Previous maximum	Apr 2024	Previous maximum	Apr 2024	Previous maximum
First-time detections of PFOS+PFHxS PFOS and/or PFOA in surface water or tank water	0021_SW037	There was no first-time detection in the dataset.		0.0009	<LOR	There was no first-time detection in the dataset.	
New exceedance of the NEMP (HEPA, 2020) drinking water guidelines in non-saline surface water or tank water	-	There were no new exceedances of the NEMP Human Health Screening Criteria (Drinking Water) in the dataset.		There were no new exceedances of the NEMP Human Health Screening Criteria (Drinking Water) in the dataset.		There are no applicable NEMP Human Health Screening Criteria.	
New exceedance of the NEMP (HEPA, 2020) recreational guidelines in surface water or tank water	0020_SW035	2.18	1.98	There were no new exceedances of the NEMP Human Health Screening Criteria (Recreational) in the dataset.		There are no applicable NEMP Human Health Screening Criteria (Recreational).	
New exceedance of the NEMP (HEPA, 2020) Freshwater and Marine 99% guidelines in surface water or tank water	-	There are no applicable NEMP Ecological Screening Criteria (99%).		There were no new exceedances of the NEMP Ecological Screening Criteria in the dataset (99%).		There were no new exceedances of the NEMP Ecological Screening Criteria in the dataset (99%).	
New exceedance of the NEMP (HEPA, 2020) Freshwater 80% guidelines in surface water or tank water in AEC A	-	There are no applicable NEMP Ecological Screening Criteria (80%).		There were no new exceedances of the NEMP Ecological Screening Criteria in the dataset (80%).		There were no new exceedances of the NEMP Ecological Screening Criteria in the dataset (80%).	

Deviation Type	Surface water & Tank water sampling location	Sum of PFOS+PFHxS (µg/L)		PFOA (µg/L)		PFOS (µg/L)	
		Apr 2024	Previous maximum	Apr 2024	Previous maximum	Apr 2024	Previous maximum
Legend							
Blue Shading	Blue shading indicates sampling location with first-time detection of PFOS+PFHxS, PFOS and/or PFOA						
Yellow Shading	Yellow shading indicates sampling location with new exceedance of NEMP Human Health and/or Ecological Screening Criteria						

5.3.3 Sediment Analytical Results

The PFAS sediment analytical results from this sampling event are presented in **Table T7** in **Appendix B**. In summary, 59 primary sediment samples were analysed for PFAS compounds, with concentrations of PFOS+PFHxS, PFOS and/or PFOA reported above laboratory LOR in 43 primary samples.

Deviations from the historical data set are provided in **Table 11** below and on **Figure F8** in **Appendix A**.

Table 11 Deviations from Historical Dataset - Sediment

Deviation Type	Sediment sampling location	Sum of PFOS+PFHxS (mg/kg)		PFOA (mg/kg)		PFOS (mg/kg)	
		Apr 2024	Previous maximum	Apr 2024	Previous maximum	Apr 2024	Previous maximum
First-time detections of PFOS+PFHxS PFOS and/or PFOA in sediment	0020_SD026*	0.0003	<LOR	There was no first-time detection in the dataset.		0.0003	<LOR
	0021_SD028	0.0002	<LOR	There was no first-time detection in the dataset.		0.0002	<LOR
	0021_SD030	0.0027	<LOR	There was no first-time detection in the dataset.		0.0024	<LOR
	0021_SD036	There was no first-time detection in the dataset.		0.0012	<LOR	There was no first-time detection in the dataset.	
	0021_SD047	0.0003	<LOR	There was no first-time detection in the dataset.		0.0003	<LOR
	0021_SD048	0.0005	<LOR	There was no first-time detection in the dataset.		0.0005	<LOR
	0021_SD069*	There was no first-time detection in the dataset.		0.0002	<LOR	There was no first-time detection in the dataset.	
	0021_SD110	There was no first-time detection in the dataset.		0.0005	<LOR	There was no first-time detection in the dataset.	
	0021_SD111	There was no first-time detection in the dataset.		0.0005	<LOR	There was no first-time detection in the dataset.	
Legend							
Blue Shading	Blue shading indicates sampling location with first-time detection of PFOS+PFHxS, PFOS and/or PFOA						

Deviation Type	Sediment sampling location	Sum of PFOS+PFHxS (mg/kg)		PFOA (mg/kg)		PFOS (mg/kg)	
		Apr 2024	Previous maximum	Apr 2024	Previous maximum	Apr 2024	Previous maximum
Notes:	*first time detection reported in inter-laboratory duplicate sample						

5.4 Historical Sampling Data

Historical groundwater, surface water (inclusive of tank water) and sediment sampling data are presented in **Table T8, T9** and **T10** (respectively) in **Appendix B**.

6.0 Summary and Next Sampling Events

6.1 Summary of Monitoring Event

The April 2024 biannual sampling event was completed between 8 and 12 April 2024. The findings and the recommended actions are summarised in **Table 12** below.

Table 12 Summary of Sampling Event

Item	Comment	Recommended Action
Access to sampling locations	The following were accessed and able to be gauged/sampled: • 63 groundwater locations (gauged) • 55 groundwater locations (sampled) • 68 surface water locations • 59 sediment locations • 6 tank water locations	Nil.
Location unable to be located, inaccessible or dry	Surface water locations 0021_SW016, 0021_SW017 and 0021_SW111 were dry and could not be sampled during this event. Co-located surface water and sediment locations 0021_SW018/0021_SD014 were located within a construction area and could not be accessed/sampled during this event. Co-located surface water and sediment locations 0021_SW038/0021_SD032 were inaccessible due to the access path (lake beach) being submerged by high lake water levels and could not be sampled during this event.	Attempt to access and sample locations 0021_SW016, 0021_SW017, 0021_SW018, 0021_SD014, 0021_SW038, 0021_SD032, and 0021_SW111 during the next scheduled sampling event.
	Co-located surface water and sediment locations 0021_SW051/0021_SD043 were inaccessible due to the location being off the coastline and only accessible by boat and was not sampled during this event.	AECOM recommends that locations 0021_SW051/0021_SD043 be removed from the OMP scope.

Item	Comment	Recommended Action
Monitoring well network condition	The majority of monitoring wells accessed were noted to be in good condition, with the exception of the following: - one monitoring well (0020_MW105) with damaged monument and casing. - two monitoring wells (0020_MW104, 0021_MW125) with the well monument padlock or well monument lid destroyed or damaged. - one monitoring well (0021_MW115) with a partly rusted well monument. - six monitoring wells (0020_MW111, 0020_MW112, 0021_MW109, 0021_MW123, 0021_MW150, 0021_MW151) with the well gatic and/or the well gatic footing in poor conditions or damaged. - two monitoring well (0020_MW112, 0021_MW101) with damaged bolts/bolt threads. - one monitoring well (0021_MW061) observed to be potentially blocked at 1.5 mbTOC. - five monitoring wells (0020_MW007, 0021_MW101, 0021_MW121, 0021_MW150, 0021_MW152) with the well gatic full of water above the TOC. The water was removed prior to sampling.	AECOM recommends repairing severely damaged monuments and gatics during or prior to the next scheduled sampling event.
Analytical Results	55 groundwater primary samples, 68 surface water primary samples, 59 sediment primary samples and 6 tank water primary samples were analysed.	Locations will be sampled again during the next scheduled sampling event to continue to monitor concentrations over time.
First-time detections of PFOS+PFHxS, PFOS and/or PFOA	No first-time detections of PFOS+PFHxS, PFOA and/or PFOS were reported in groundwater or tank water locations sampled. First-time detections of PFOS+PFHxS, PFOA and/or PFOS were reported in one (0021_SW037) of 68 surface water locations sampled. First-time detections of PFOS+PFHxS, PFOA and/or PFOS were reported in nine (0020_SD026, 0021_SD028, 0021_SD030, 0021_SD036, 0021_SD047, 0021_SD048, 0021_SD069, 0021_SD110, 0021_SD111) of 59 sediment locations sampled.	Locations will be sampled again during the next scheduled sampling event to continue to monitor concentrations over time.

Item	Comment	Recommended Action
New exceedance of adopted human health screening criteria	No new exceedances of the adopted human health screening criteria for PFOS+PFHxS and/or PFOA were reported in groundwater or tank water locations sampled. New exceedance of the adopted human health screening criteria for PFOS+PFHxS and/or PFOA were reported in one (0020_SW035) of 68 surface water locations sampled.	Locations will be sampled again during the next scheduled sampling event to continue to monitor concentrations over time.
New exceedance of adopted ecological screening criteria	No new exceedances of the adopted ecological screening criteria for PFOS and/or PFOA were reported in groundwater, surface water or tank water locations sampled.	Locations will be sampled again during the next scheduled sampling event to continue to monitor concentrations over time.

6.2 Upcoming Sampling Events

The next OMP sampling event is scheduled for October 2024.

6.3 Upcoming Ongoing Monitoring Report

The next Ongoing Monitoring Report is scheduled to be delivered in 2025, covering data collected within the 12-month sampling period between January 2024 and December 2024.

7.0 References

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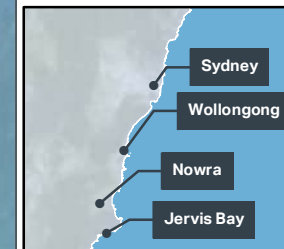
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Appendix A

Figures



Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse

FIGURE F1: STUDY AREA

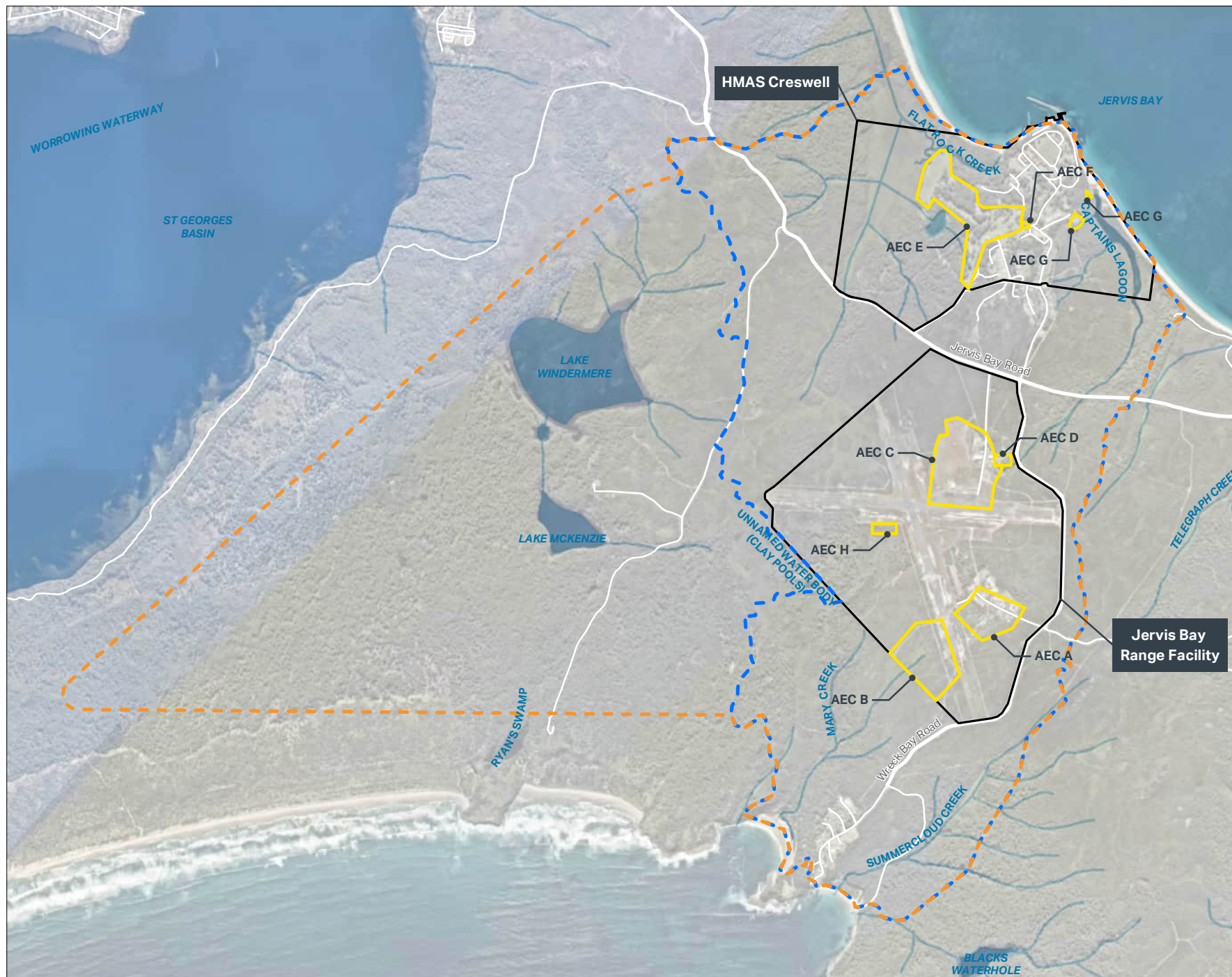
PROJECT NAME:
PFAS OMP
REPORT NAME:
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April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
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0 440 880 m

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Monitoring Well Location (sampled)
- Monitoring Well Location (gauged)

FIGURE F2-1: GROUNDWATER SAMPLE LOCATIONS OVERVIEW

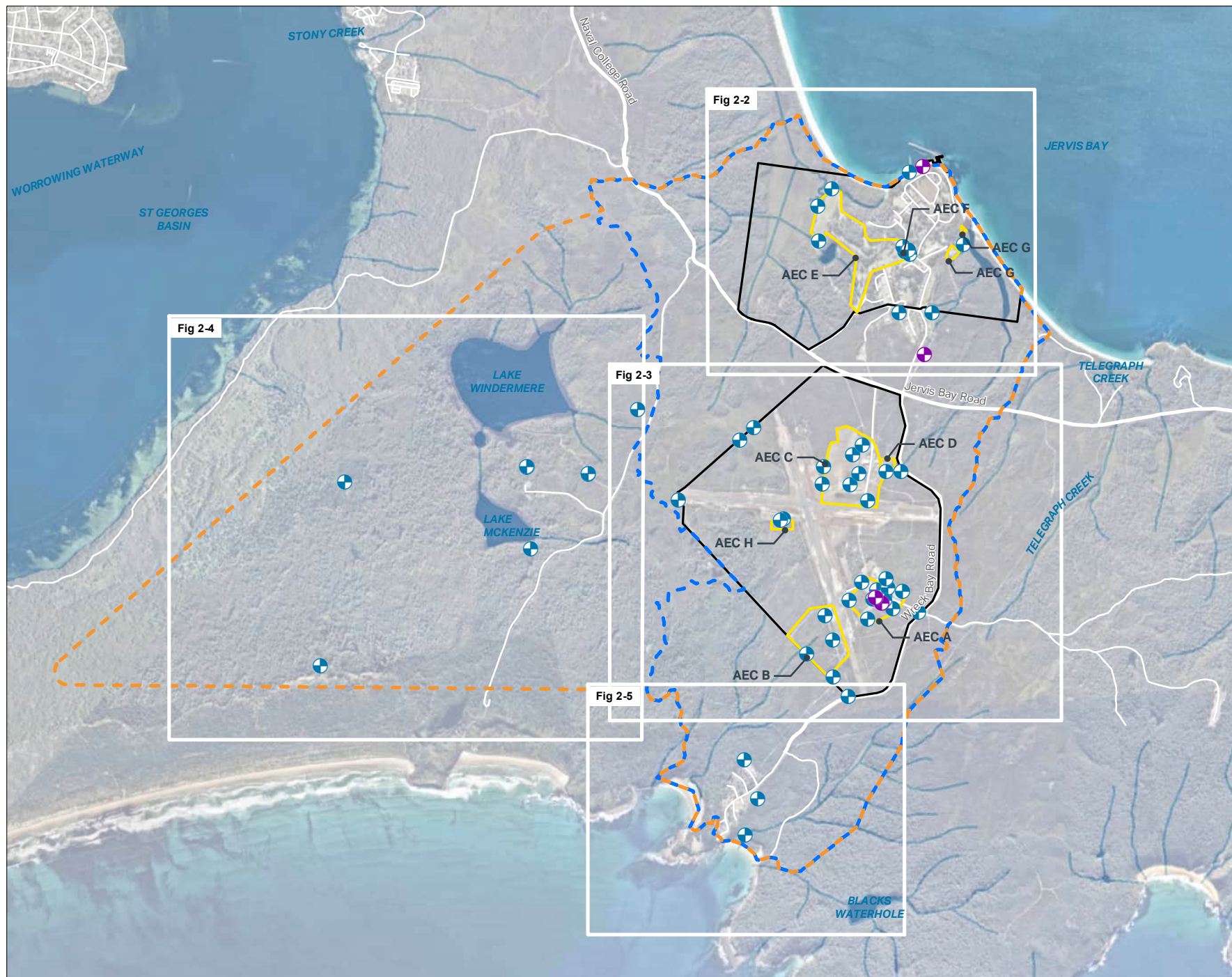
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0 130 260 m

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Monitoring Well Location (sampled)
- Monitoring Well Location (gauged)

FIGURE F2-2: GROUNDWATER SAMPLE LOCATIONS HMAS CRESWELL

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0 160 320 m

Legend

Defence Site Boundary

Monitoring Area

Management Area

Areas of Environmental Concern

Waterbody/Watercourse

Monitoring Well Location (sampled)

Monitoring Well Location (gauged)

**FIGURE F2-3:
GROUNDWATER
SAMPLE LOCATIONS
JBRF**

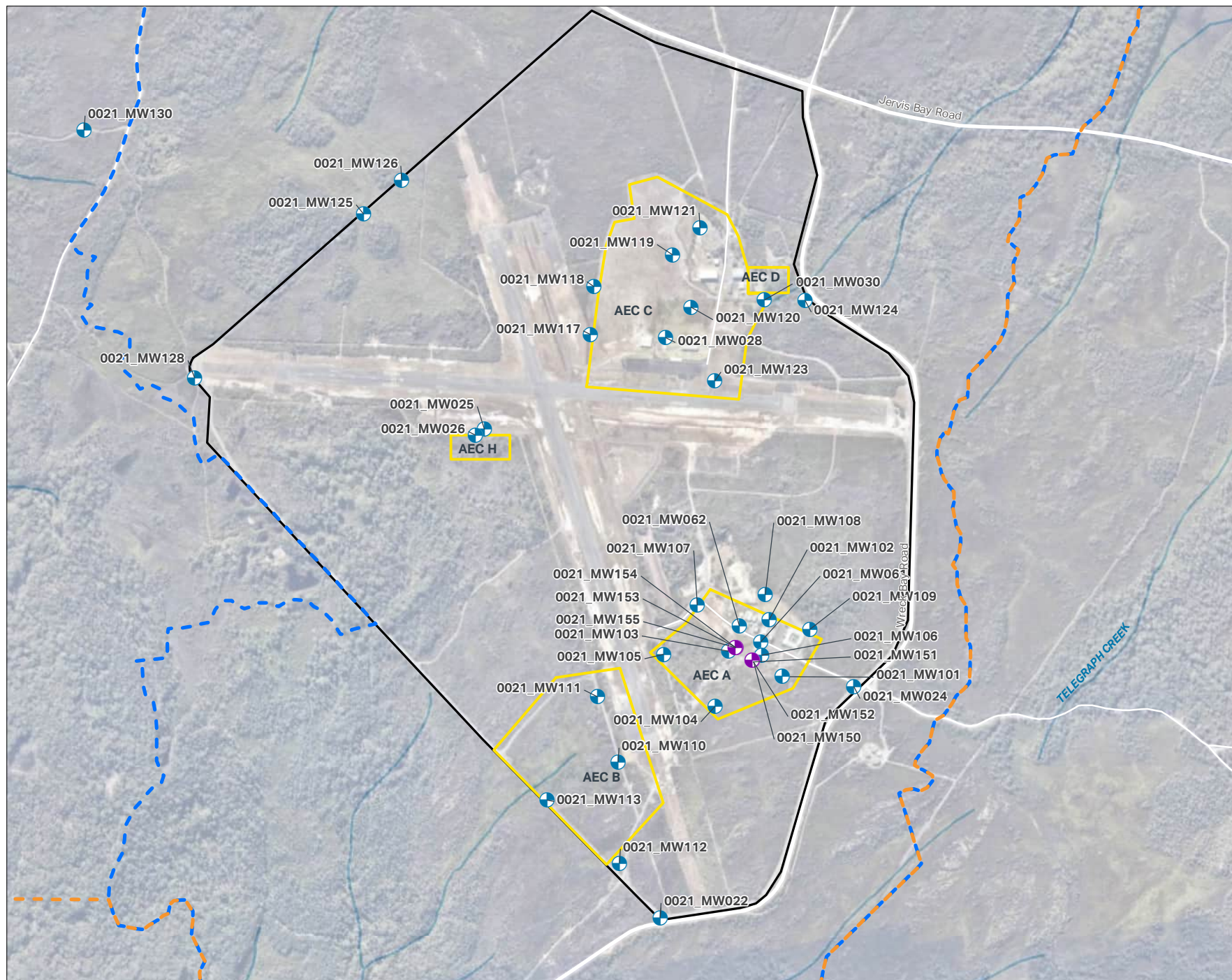
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0 190 380 m

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Monitoring Well Location (sampled)

**FIGURE F2-4:
GROUNDWATER
SAMPLE LOCATIONS
OFFSITE, WEST**

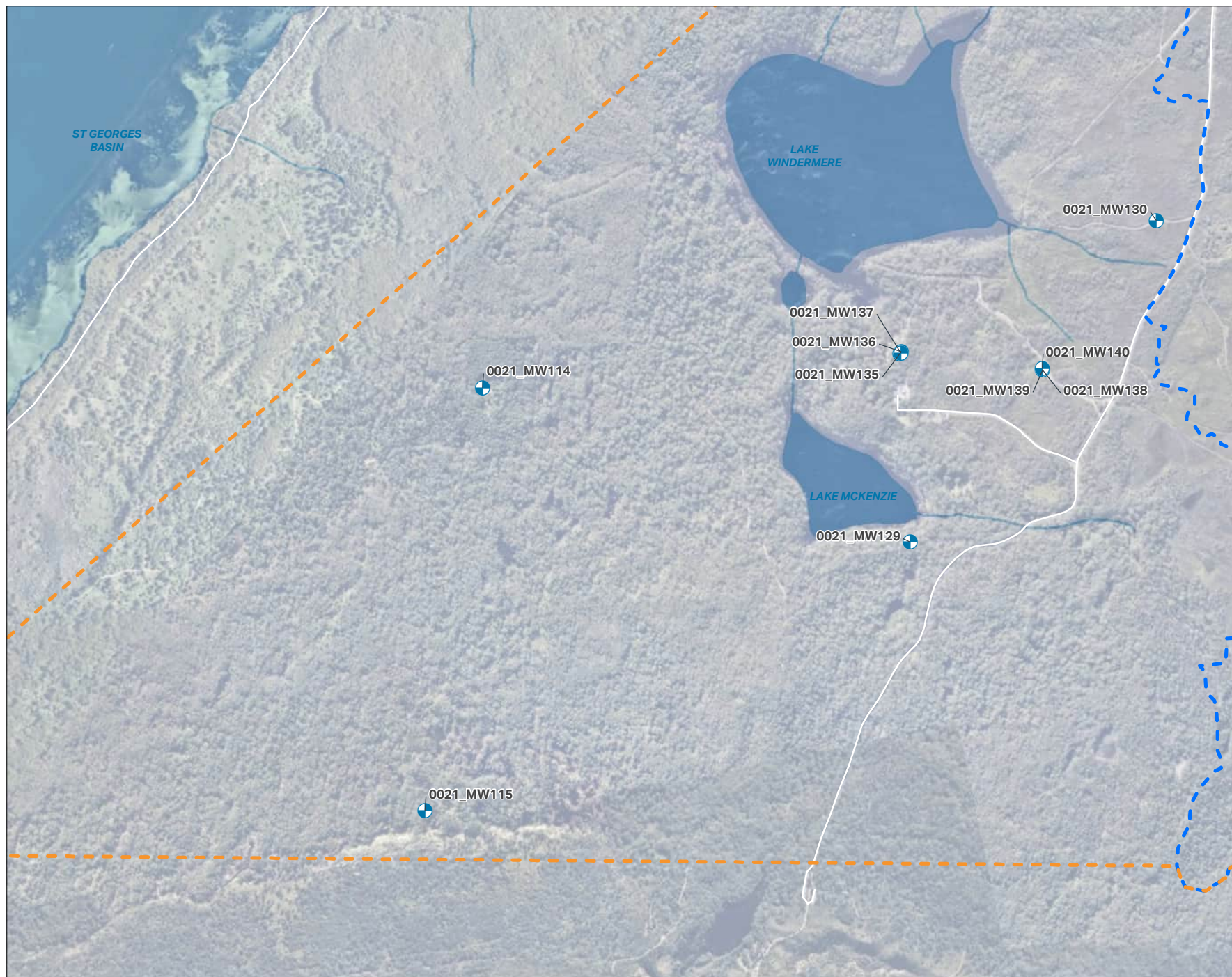
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AECOM



0 110 220 m

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Monitoring Well Location (sampled)

**FIGURE F2-5:
GROUNDWATER
SAMPLE LOCATIONS
OFFSITE, SOUTH**

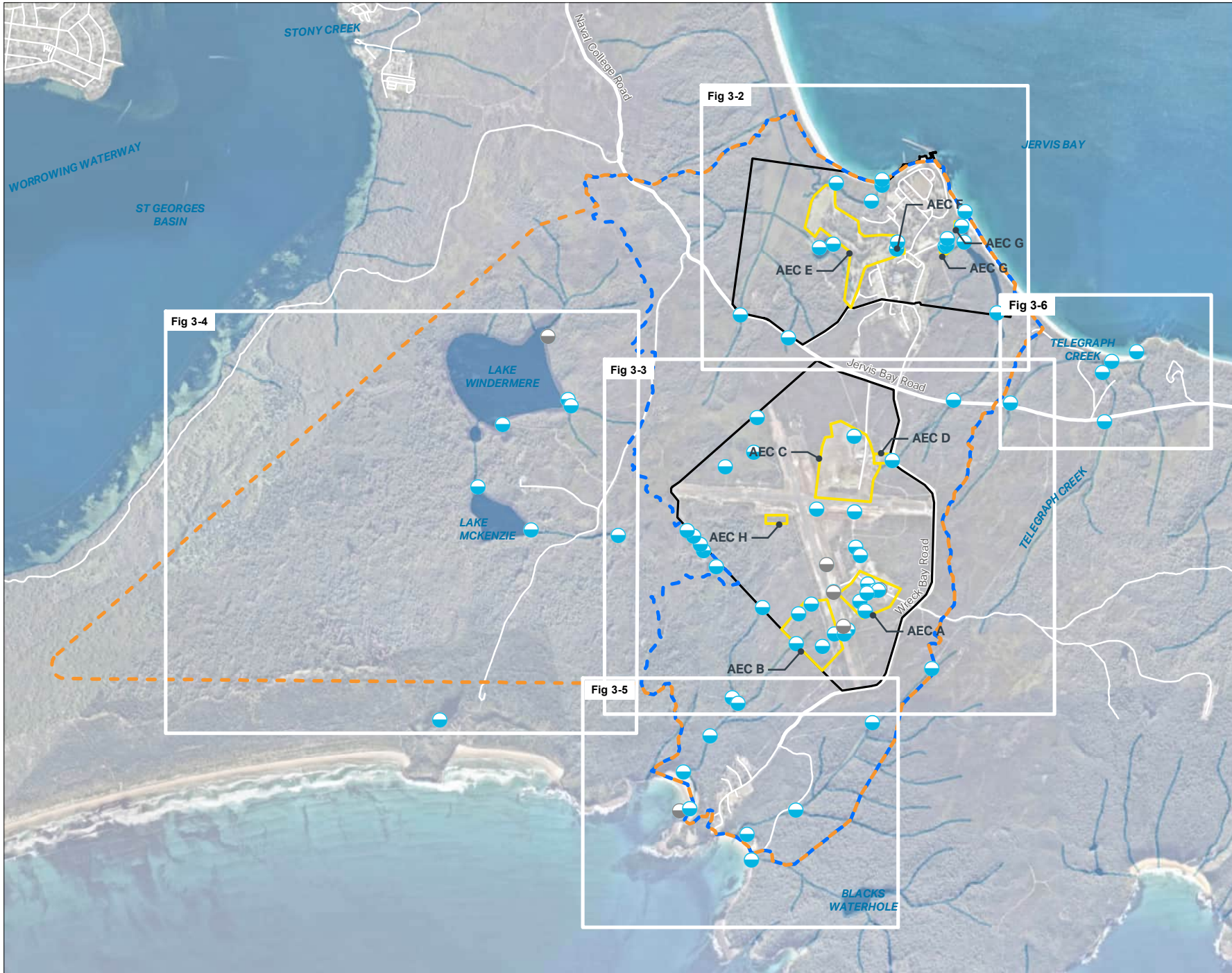
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- Legend
- Defence Site Boundary
 - Monitoring Area
 - Management Area
 - Areas of Environmental Concern
 - Waterbody/Watercourse
 - Surface Water Location (Not Accessed and/or Sampled)
 - Surface Water Location (Sampled)

FIGURE F3-1:
SURFACE WATER SAMPLE
LOCATIONS
OVERVIEW

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REPORT NAME:
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Nearmap Imagery 2024



0 130 260 m

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Surface Water Location



FIGURE F3-2:
SURFACE WATER SAMPLE
LOCATIONS
HMAS CRESWELL

PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
CLIENT NAME:
Department of Defence
PROJECT NUMBER:
60612562

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Source:
Nearmap Imagery 2024

Legend

Defence Site Boundary

Monitoring Area

Management Area

Areas of Environmental Concern

Waterbody/Watercourse

Surface Water Location

Surface Water Location
(Not Accessed and/or
Sampled)

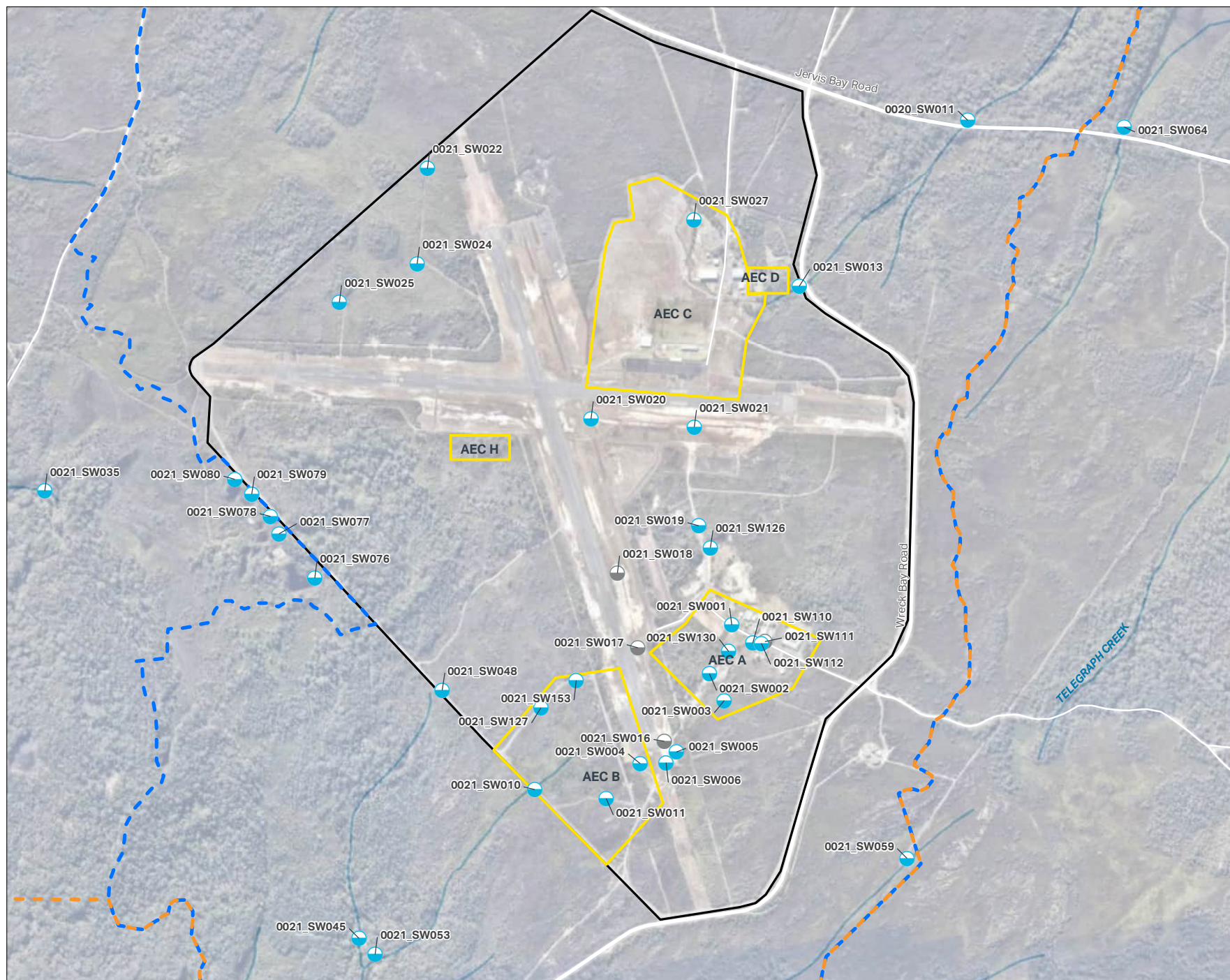


FIGURE F3-3:
SURFACE WATER SAMPLE
LOCATIONS
JBRF

PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
CLIENT NAME:
Department of Defence
PROJECT NUMBER:
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Source:
Nearmap Imagery 2024



0 190 380 m

Legend

Defence Site Boundary

Monitoring Area

Management Area

Areas of Environmental Concern

Waterbody/Watercourse

Surface Water Location

Surface Water Location
(Not Accessed and/or
Sampled)

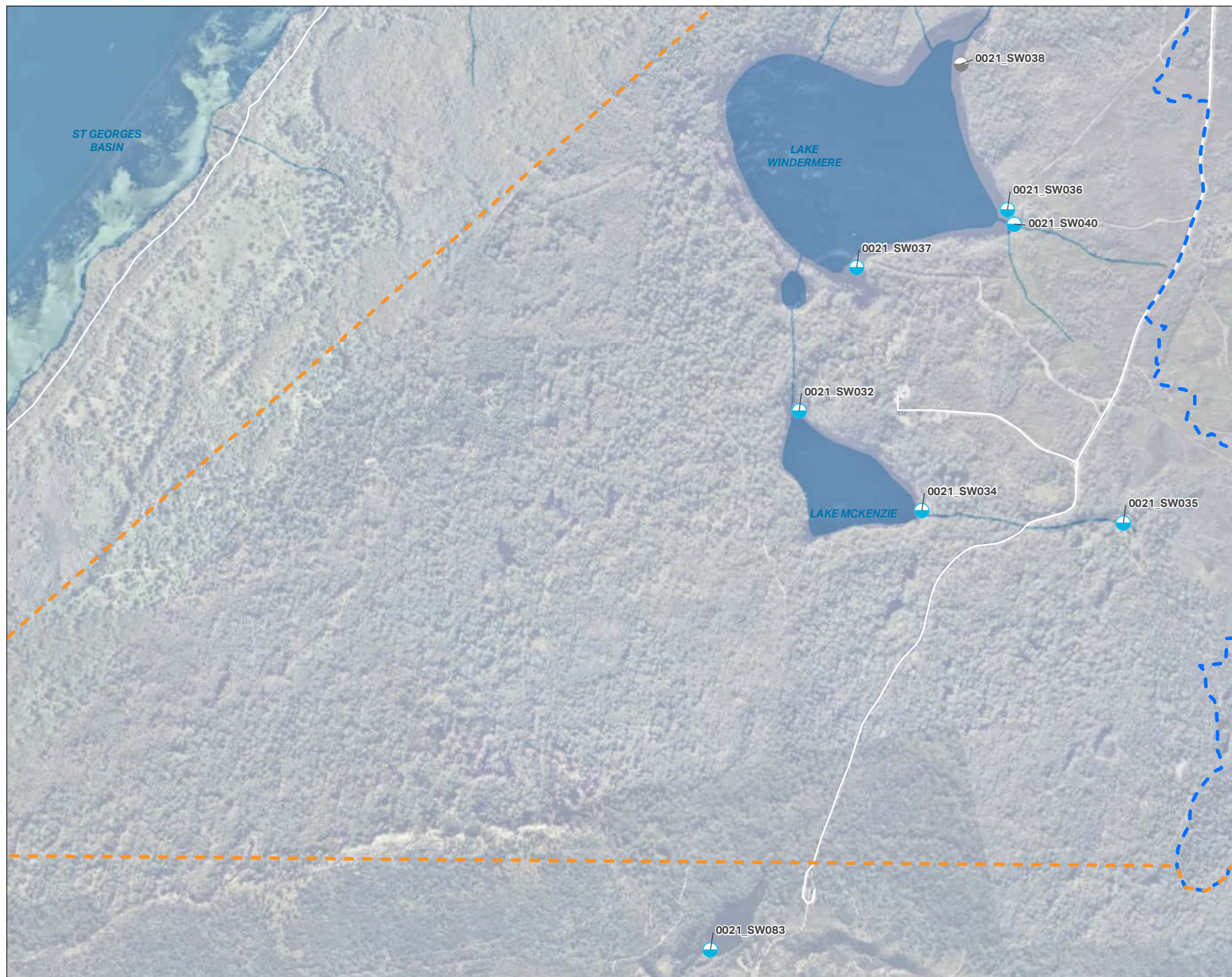


FIGURE F3-4:
SURFACE WATER SAMPLE
LOCATIONS
OFFSITE, WEST

PROJECT NAME:

PFAS OMP

REPORT NAME:

Sampling Event Factual Report

April 2024

HMAS Creswell (0020) and

Jervis Bay Range Facility (0021)

CLIENT NAME:

Department of Defence

PROJECT NUMBER:

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Source:
Nearmap Imagery 2024



0 110 220 m

Legend

Defence Site Boundary

Monitoring Area

Management Area

Areas of Environmental Concern

Waterbody/Watercourse

Surface Water Location

Surface Water Location
(Not Accessed and/or
Sampled)

FIGURE F3-5: SURFACE WATER SAMPLE LOCATIONS OFFSITE, SOUTH

PROJECT NAME:

PFAS OMP

REPORT NAME:

Sampling Event Factual Report
April 2024

HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)

CLIENT NAME:

Department of Defence

PROJECT NUMBER:

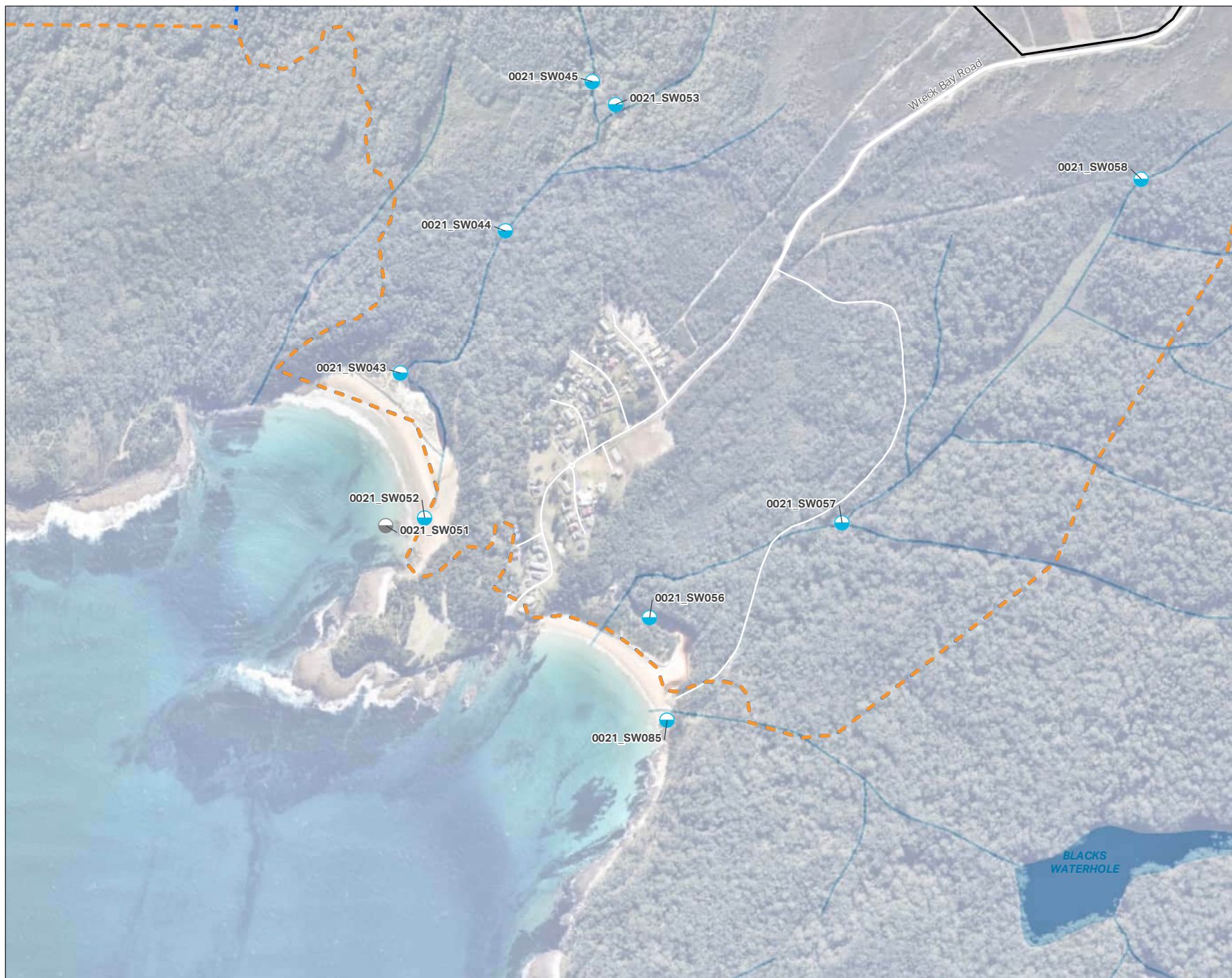
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Source:
Nearmap Imagery 2024





0 75 150 m

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Surface Water Location



FIGURE F3-6:
SURFACE WATER SAMPLE
LOCATIONS
TELEGRAPH CREEK

PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
CLIENT NAME:
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PROJECT NUMBER:
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Source:
Nearmap Imagery 2024

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Sediment Location
- Sediment Location (Not Accessed and/or Sampled)

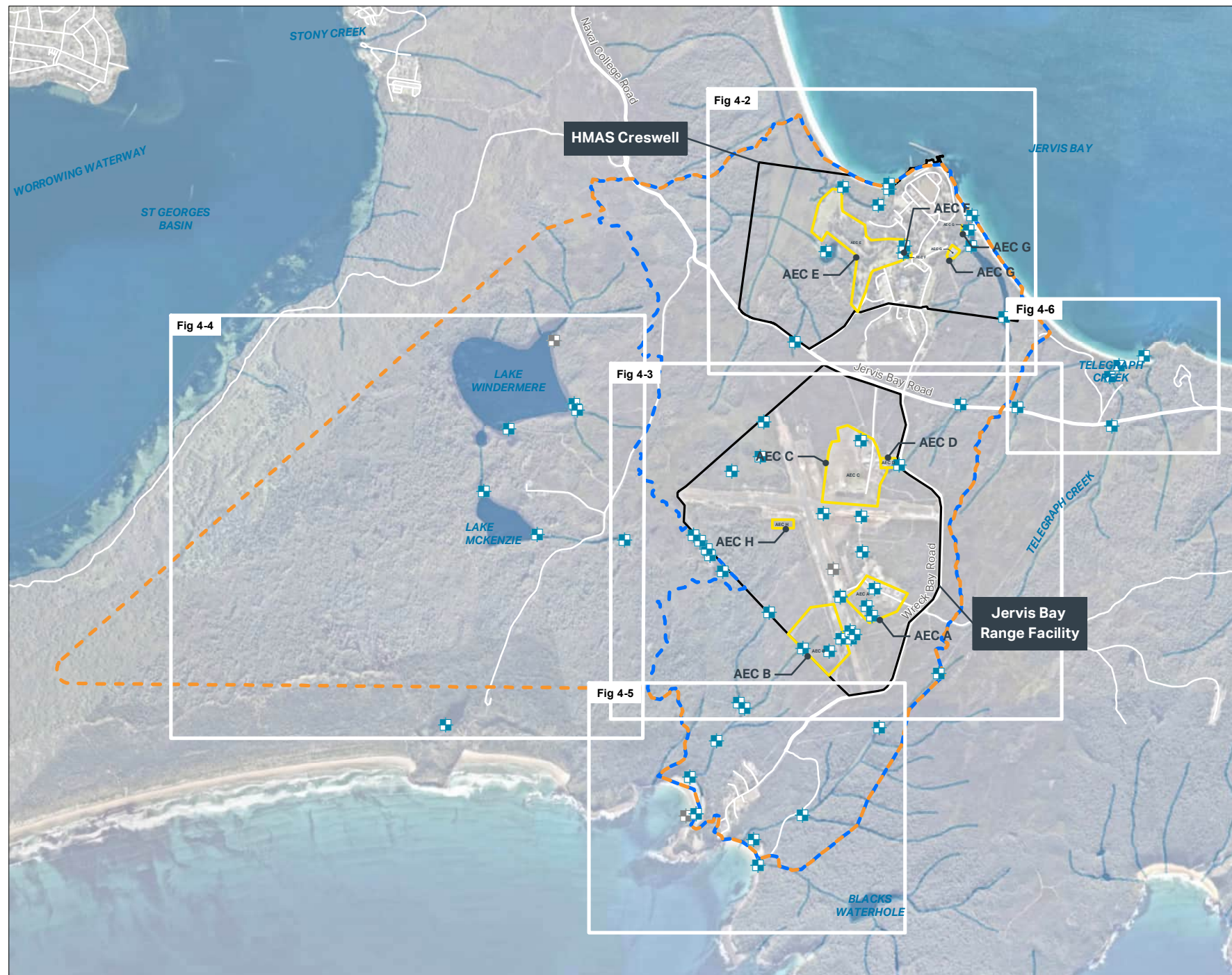


FIGURE F4-1: SEDIMENT SAMPLE LOCATIONS OVERVIEW

PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
CLIENT NAME:
Department of Defence
PROJECT NUMBER:
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Source:
Nearmap Imagery 2024



0 130 260 m

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Sediment Location



FIGURE F4-2:
SEDIMENT SAMPLE
LOCATIONS
HMAS CRESWELL

PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
CLIENT NAME:
Department of Defence
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Source:
Nearmap Imagery 2024

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Sediment Location
- Sediment Location (Not Accessed and/or Sampled)

FIGURE F4-3: SEDIMENT SAMPLE LOCATIONS JBRF

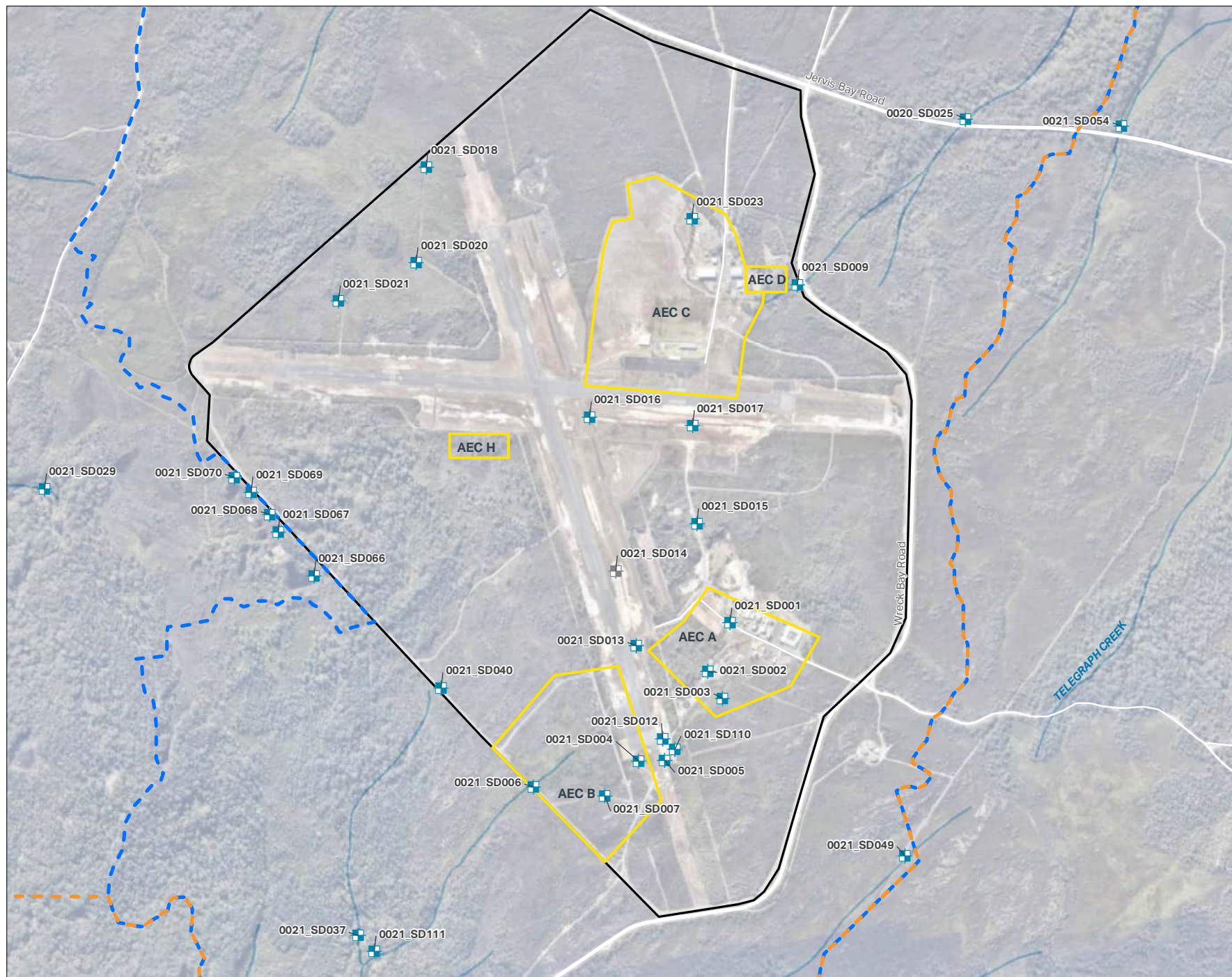
PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
CLIENT NAME:
Department of Defence
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Source:
Nearmap Imagery 2024





0 190 380 m

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Sediment Location
- Sediment Location (Not Accessed and/or Sampled)

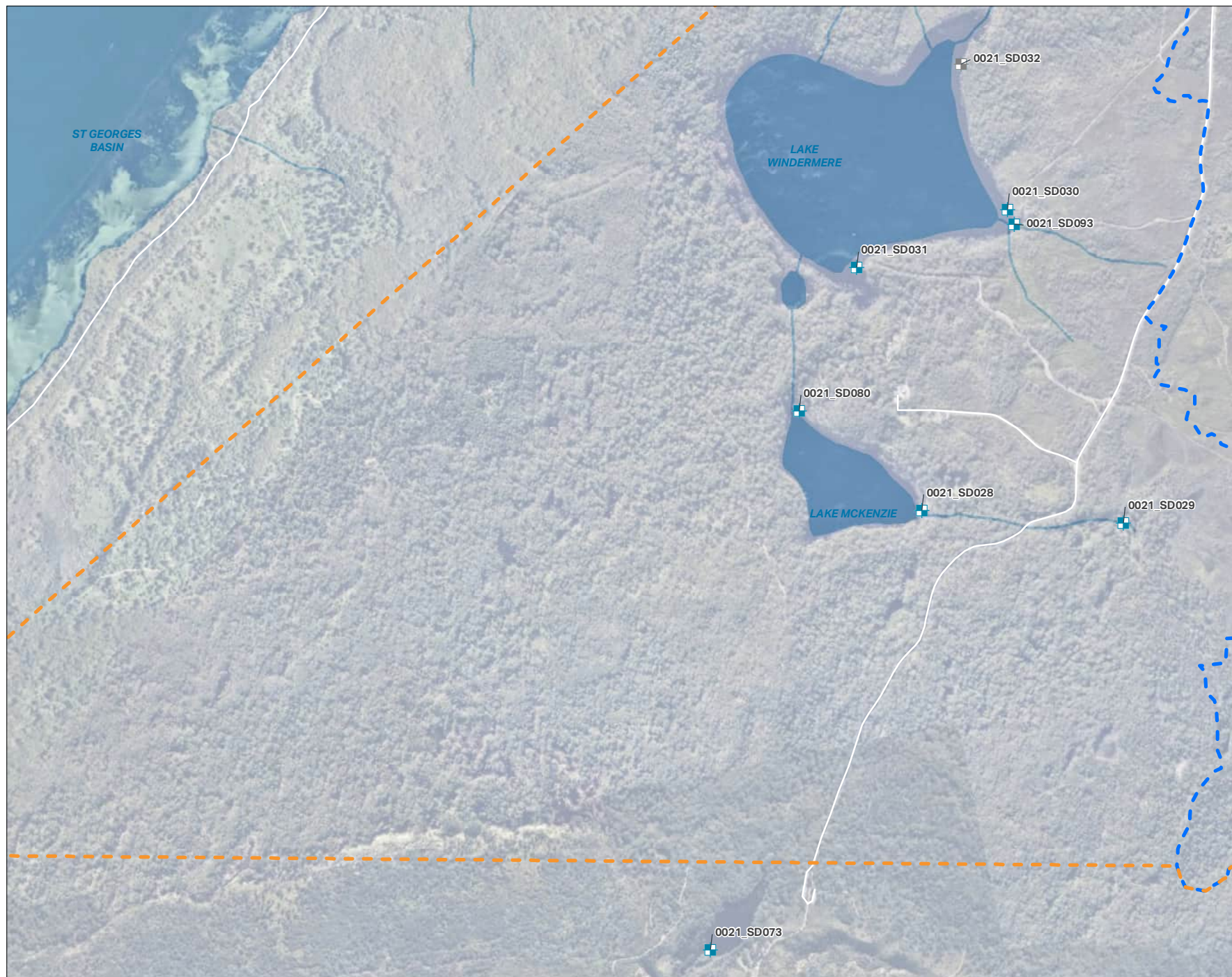


FIGURE F4-4: SEDIMENT SAMPLE LOCATIONS OFFSITE, WEST

PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
CLIENT NAME:
Department of Defence
PROJECT NUMBER:
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Source:
Nearmap Imagery 2024



0 110 220 m

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Sediment Location
- Sediment Location (Not Accessed and/or Sampled)

FIGURE F4-5: SEDIMENT SAMPLE LOCATIONS OFFSITE, SOUTH

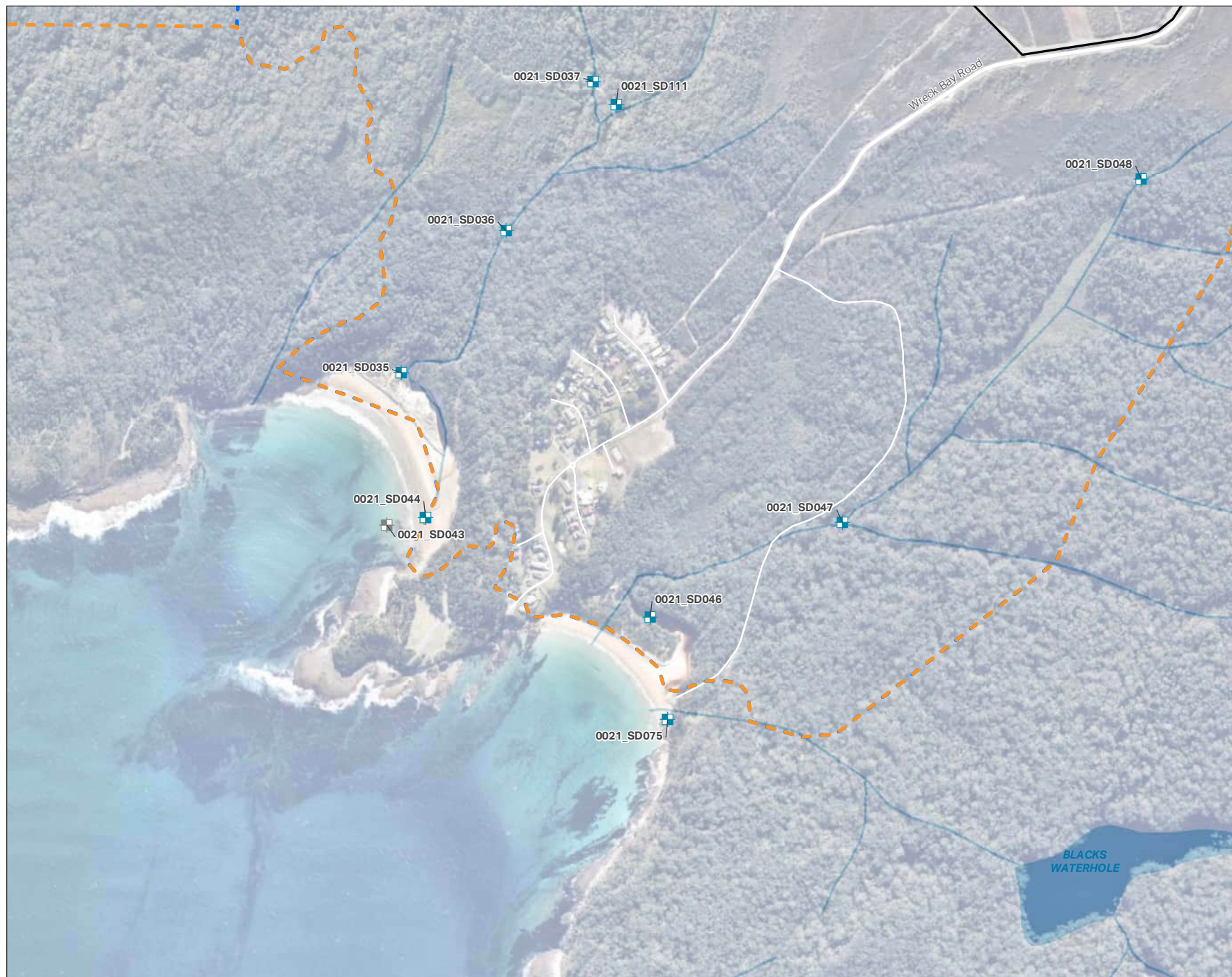
PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
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Department of Defence
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Source:
Nearmap Imagery 2024





0 75 150 m

Legend

- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- Sediment Location



FIGURE F4-6: SEDIMENT SAMPLE LOCATIONS TELEGRAPH CREEK

PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
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Source:
Nearmap Imagery 2024



0 30 60 m

Legend

-  Defence Site Boundary
-  Monitoring Area
-  Management Area
-  Areas of Environmental Concern
-  Waterbody/Watercourse
-  Tank Water Location

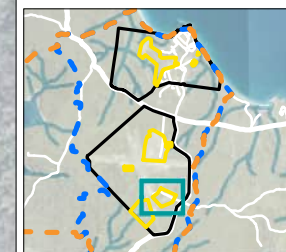


FIGURE F5:
TANK WATER SAMPLE
LOCATIONS JBRF

PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
CLIENT NAME:
Department of Defence
PROJECT NUMBER:
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Source:
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Legend

- Groundwater Contour (mAHD)
- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- 10 mAHD Topographical Contour
- Inferred Groundwater Flow Direction
- Groundwater Contour (mAHD)
- Waterbody/Watercourse
- Groundwater Monitoring Well

FIGURE F6:
GROUNDWATER
ELEVATION PLAN
APRIL 2024

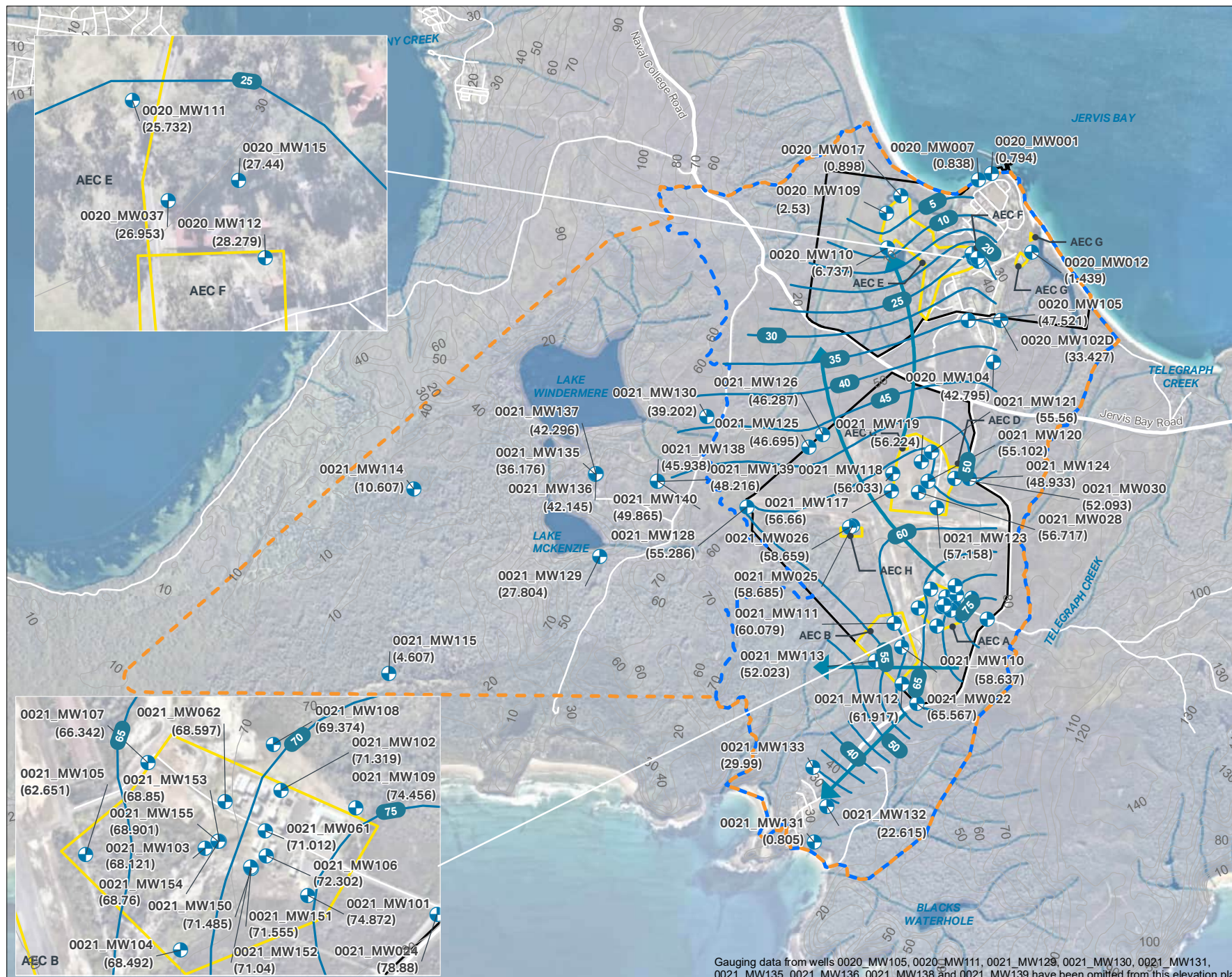
PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
CLIENT NAME:
Department of Defence
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Source:



Legend

Defence Site Boundary

Monitoring Area

Management Area

Areas of Environmental Concern

Waterbody/Watercourse

First-Time Detection of
PFOS+PFHxS, PFOS and/or
PFOA

New Exceedence of Human
Health and/or Ecological
Screening Criteria for PFOS,
PFOS+PFHxS and/or PFOA

Location Not Accessed and/or
Sampled

Sampled, No First-Time
Detection or Exceedence

FIGURE F7 SURFACE WATER ANALYTICAL RESULTS

PROJECT NAME:

PFAS OMP

REPORT NAME:

Sampling Event Factual Report

April 2024

HMAS Creswell (0020) and

Jervis Bay Range Facility (0021)

CLIENT NAME:

Department of Defence

PROJECT NUMBER:

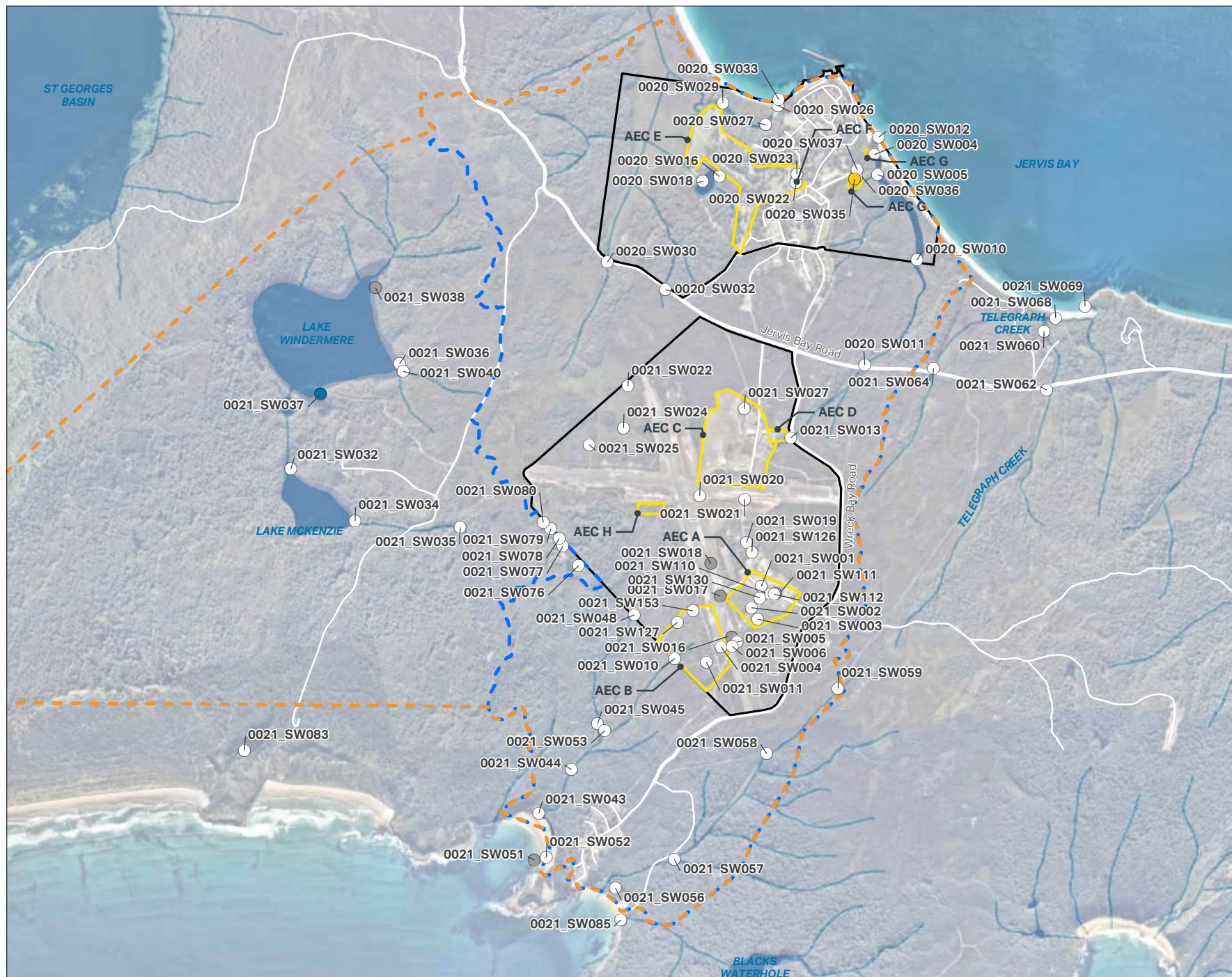
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Source:
Nearmap Imagery 2024



- Defence Site Boundary
- Monitoring Area
- Management Area
- Areas of Environmental Concern
- Waterbody/Watercourse
- First-Time Detection of PFOS+PFHxS, PFOS and/or PFOA
- Location Not Accessed and/or Sampled
- Sampled, No First-Time Detection or Exceedance

FIGURE F8:
SEDIMENT
ANALYTICAL RESULTS

PROJECT NAME:
PFAS OMP
REPORT NAME:
Sampling Event Factual Report
April 2024
HMAS Creswell (0020) and
Jervis Bay Range Facility (0021)
CLIENT NAME:
Department of Defence
PROJECT NUMBER:
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Source:
Nearmap Imagery 2024



Appendix B

Tables

Table T1 Groundwater Gauging and Observations

Site ID	Location Code	Alternative Name	Top of Casing (mAHD)	Top Screen (mbTOC)	Bottom Screen (mbTOC)	HydraSleeve Collar Depth (mbTOC)	Gauging / Visit Date Time	Water Depth (mbTOC)	Water Elevation (mAHD)	Depth to Base of Well (mbTOC)	Visit / Gauging Comment
0020	MW001	CRMW1, CR_MW1	2.91	Unknown	5.99	n/a	8/04/2024 10:11	2.116	0.794	5.54	Good condition. Gauge only visit.
0020	MW007	MW10, 0020_MW10	2.68	0.75	3.75	2.5	8/04/2024 9:55	1.842	0.838	3.47	Gatic full of water above top of casing. Water drained before opening well.
0020	MW012	MW12	3.901	3	6	4.5	8/04/2024 10:00	2.462	1.439	6.29	Good condition.
0020	MW017	0020_MW16, MW16	1.998	2	5	4.5	8/04/2024 10:28	1.100	0.898	4.91	Good condition.
0020	MW037	0020_MW01, MW01	31.099	3	6	5	8/04/2024 11:22	4.146	26.953	6.92	Good condition.
0020	MW102D	CL_MW02	35.392	2.8	8.8	8	8/04/2024 8:16	1.965	33.427	9.59	Good condition.
0020	MW104	CL_MW04	47.422	4	10	n/a	8/04/2024 8:02	4.627	42.795	10.25	Well monument padlock destroyed and monument lid not closed. Gauge only visit.
0020	MW105	CL_MW05	52.044	6	12	10	8/04/2024 8:39	4.523	47.521	11.62	Well monument and casing damaged (knocked over at ground level).
0020	MW109	E_MW04	3.632	1	2	1.5	8/04/2024 10:58	1.102	2.530	2.76	Good condition.
0020	MW110	E_MW05	8.024	1	2	1.5	8/04/2024 13:06	1.287	6.737	3.02	Good condition.
0020	MW111	F_MW01	27.018	1	3	n/a	8/04/2024 11:43	1.286	25.732	3.14	Well gatic in poor condition, full of mud and loose around casing, well gatic footing partly destroyed.
0020	MW112	F_MW02	31.546	1	4	2.3	8/04/2024 11:07	3.267	28.279	3.96	Well gatic lid in poor condition, with bolts rusted in place but well still accessible.
0020	MW115	F_MW03	31.26	1.8	4.8	3.5	8/04/2024 11:23	3.820	27.440	4.73	Good condition.
0021	MW022	MW14	67.159	3.8	6.8	5.5	8/04/2024 14:36	1.592	65.567	7.50	Good condition.
0021	MW024	MW12	80.537	6	9	8	8/04/2024 14:23	1.657	78.880	9.87	Good condition.
0021	MW025	MW11	60.769	2	5	4	12/04/2024 9:04	2.084	58.685	5.78	Good condition.
0021	MW026	MW10	60.795	4.75	7.75	7	12/04/2024 8:49	2.136	58.659	8.71	Good condition.
0021	MW028	0021_MW08, MW8	57.816	3	6	5.5	12/04/2024 9:45	1.099	56.717	6.91	Good condition.
0021	MW030	MW6	52.959	6.8	9.8	9	10/04/2024 11:10	0.866	52.093	10.69	Good condition.
0021	MW061		71.590	0.85	2.85	1	11/04/2024 8:40	0.578	71.012	1.50	Good condition. Potentially blocked at 1.5 mbtoc.
0021	MW062		69.850	1	3	1.5	11/04/2024 9:30	1.253	68.597	2.92	Good condition.
0021	MW101	A_MW01	75.084	1	2	1	10/04/2024 14:15	0.212	74.872	1.99	Gatic full of water above TOC. Water drained before opening well. Bolts unable to be fasted in gatic lid
0021	MW102	A_MW02	72.299	1	1.8	0.8	10/04/2024 13:54	0.980	71.319	1.79	Good condition.
0021	MW103	A_MW03	68.856	1	2	1.7	11/04/2024 8:51	0.735	68.121	2.80	Good condition.
0021	MW104	A_MW04	69.524	1	2	1.75	11/04/2024 9:32	1.032	68.492	2.75	Good condition.
0021	MW105	A_MW05	64.291	1	2	1.8	11/04/2024 10:02	1.640	62.651	3.06	Good condition.
0021	MW106	A_MW06	72.928	1	2.5	1.4	10/04/2024 14:35	0.626	72.302	2.45	Good condition.
0021	MW107	A_MW07	67.191	1	4	3	11/04/2024 9:51	0.849	66.342	4.71	Good condition.
0021	MW108	A_MW08	70.443	1	2.5	2	11/04/2024 10:40	1.069	69.374	3.20	Good condition.
0021	MW109	A_MW09	74.47	1	4	2.5	10/04/2024 13:41	0.014	74.456	3.95	Well gatic concrete footing damaged and gatic partly rusted.
0021	MW110	B_MW01	60.047	1	2	1.5	10/04/2024 12:31	1.410	58.637	2.79	Good condition.
0021	MW111	B_MW02	61.074	1	2	1.5	10/04/2024 12:38	0.995	60.079	2.30	Good condition.
0021	MW112	B_MW03	62.949	1	2.5	1.8	8/04/2024 14:50	1.032	61.917	2.92	Good condition.
0021	MW113	B_MW04	52.815	1	2	1.5	10/04/2024 12:06	0.792	52.023	2.70	Good condition.
0021	MW114	BB_MW01	12.325	4	7	5.5	9/04/2024 12:56	1.718	10.607	7.66	Good condition.
0021	MW115	BB_MW02	5.007	1	4	3	11/04/2024 12:15	0.400	4.607	4.55	Well monument partly rusted due to flooding in surrounding area, well monument full of water below TOC.
0021	MW117	C_MW01	56.91	1	2	0.9	12/04/2024 10:39	0.250	56.660	1.91	Good condition.
0021	MW118	C_MW02	56.183	1	3	1.5	12/04/2024 10:29	0.150	56.033	2.93	Good condition.
0021	MW119	C_MW03	56.601	1	2	0.8	12/04/2024 9:59	0.377	56.224	1.91	Good condition.
0021	MW120	C_MW04	55.585	1	3	1.5	12/04/2024 9:53	0.483	55.102	2.91	Good condition.
0021	MW121	C_MW05	55.68	0.8	2.8	2	10/04/2024 10:40	0.120	55.560	2.68	Gatic full of water above TOC. Water drained before opening well.
0021	MW123	C_MW07	57.968	1	2.8	1.7	12/04/2024 9:31	0.810	57.158	2.87	Well gatic concrete footing partly damaged.
0021	MW124	CL_MW01	49.826	1	2.8	2.2	10/04/2024 11:53	0.893	48.933	3.15	Good condition.
0021	MW125	FC_MW01	48.13	1	3	2.5	10/04/2024 9:28	1.435	46.695	3.70	Well monument lid rusted and unhinged from monument.
0021	MW126	FC_MW02	47.1	6	9	7.5	10/04/2024 9:18	0.813	46.287	9.74	Good condition.
0021	MW128	LM_MW01	57.051	2.3	5.3	5	10/04/2024 10:11	1.765	55.286	6.01	Good condition.
0021	MW129	LM_MW02	47.694	26.1	30.6	28	9/04/2024 12:34	19.890	27.804	31.61	Good condition.
0021	MW130	LW_MW01	56.255	26	35	30	9/04/2024 15:17	17.053	39.202	35.90	Good condition.
0021	MW131	MC_MW02	4.767	4	7	5.0	9/04/2024 10:44	3.962	0.805	7.09	Good condition.
0021	MW132	MC_MW03	26.593	5.5	11.5	10.5	9/04/2024 14:50	3.978	22.615	12.02	Good condition.
0021	MW133	MC_MW04	34.361	4	10	9	9/04/2024 11:40	4.371	29.990	10.56	Good condition.
0021	MW135	LM_MW03A	47.54	31.27	40.27	39	9/04/2024 8:45	11.364	36.176	39.20	Good condition.
0021	MW136	LM_MW03B	47.633	20.05	26.05	24	9/04/2024 9:04	5.488	42.145	26.47	Good condition.
0021	MW137	LM_MW03C	47.708	5.05	11.05	9	9/04/2024 8:55	5.412	42.296	11.72	Good condition.
0021	MW138	LW_MW02A	52.2	31.4	40.4	35	9/04/2024 13:52	6.262	45.938	41.49	Good condition.
0021	MW139	LW_MW02B	52.22	14.6	20.6	20	9/04/2024 13:37	4.004	48.216	21.09	Good condition.
0021	MW140	LW_MW02C	52.07	6	12	10	9/04/2024 13:59	2.205	49.865	12.64	Good condition.
0021	MW150		71.51	3	5	n/a	11/04/2024 9:13	0.025	71.485	5.00	Well gatic partly rusted and full of water above the TOC. Water drained before opening well. Gauge only visit.
0021	MW151		71.58	2	3	n/a	11/04/2024 9:14	0.025	71.555	3.02	Well gatic damaged. Gauge only visit.
0021	MW152		71.54	1	2	n/a	11/04/2024 9:18	0.500	71.040	1.93	Gatic full of water above TOC. Water drained before opening well. Gauge only visit.
0021	MW153		69.36	2.85	4.85	n/a	11/04/2024 8:39	0.510	68.850	4.85	Good condition. Gauge only visit.
0021	MW154		69.35	2	3	n/a	11/04/2024 8:42	0.590	68.760	2.96	Good condition. Gauge only visit.
0021	MW155		69.23	0.75	2	n/a	11/04/2024 8:43	0.329	68.901	2.04	Good condition. Gauge only visit.

Notes
mbTOC meters below top of casing
mAHD meters Australian Height Datum
n/a Not applicable
TOC top of casing

Table T2 Groundwater Quality Parameters and Observations

Site ID	Location Code	Alternative Name	Sampled Date Time	Sample Comment	Water Quality Parameters						
					Dissolved Oxygen	Temperature	Electrical Conductivity	Total Dissolved Solids (Calculated)	pH	Redox Potential Er	Redox Potential Eh (Corrected)
					mg/L	°C	µS/cm	mg/L	pH Units	mV	mV
0020	MW001	CRMW1, CR_MW1	n/a	Not sampled, gauge only location.	n/a	n/a	n/a	n/a	n/a	n/a	n/a
0020	MW007	MW10, 0020_MW10	8/04/2024 9:58	Light brown, low turbidity, no odour, no sheen.	1.75	23.9	671.0	429.4	7.12	112.3	318.1
0020	MW012	MW12	8/04/2024 10:01	Light brown, no turbidity, no odour, no sheen. Some sediment at base of HydraSleeve.	1.41	21.1	260.5	166.7	5.18	20.9	226.7
0020	MW017	0020_MW16, MW16	8/04/2024 10:29	Yellow, no turbidity, no odour, no sheen.	4.12	21.4	317.7	203.3	4.85	102.4	308.2
0020	MW037	0020_MW01, MW01	8/04/2024 11:23	Clear, no turbidity, no odour, no sheen.	0.67	21.6	222.0	142.1	5.87	149.5	355.3
0020	MW102D	CL_MW02	8/04/2024 8:23	Clear, no turbidity, no odour, no sheen.	2.80	18.9	479.8	307.1	4.89	177.6	383.4
0020	MW104	CL_MW04	n/a	Not sampled, gauge only location.	n/a	n/a	n/a	n/a	n/a	n/a	n/a
0020	MW105	CL_MW05	8/04/2024 8:43	Clear, no turbidity, no odour, no sheen.	2.96	19.7	671.0	429.4	3.71	266.0	n/a
0020	MW109	E_MW04	8/04/2024 10:59	Yellow, low turbidity, no odour, no sheen. Suspended organic matter.	3.70	22.4	335.9	215.0	5.11	58.8	264.6
0020	MW110	E_MW05	8/04/2024 13:07	Light brown/grey, low turbidity, no odour, no sheen.	6.77	21.4	428.0	273.9	6.31	56.8	262.6
0020	MW111	F_MW01	8/04/2024 11:44	Clear, low turbidity, no odour, no sheen.	2.7	23.3	189.0	121.0	5.4	117.1	n/a
0020	MW112	F_MW02	8/04/2024 11:15	Clear, no turbidity, no odour, no sheen. Some sediment at base of HydraSleeve.	1.49	21.0	312.4	199.9	3.95	136.7	342.5
0020	MW115	F_MW03	8/04/2024 11:29	Orange/brown, low-medium turbidity, no odour.	0.75	21.5	262.0	167.7	6.13	144.7	350.5
0021	MW022	MW14	8/04/2024 14:40	Light brown/orange, low turbidity, no odour, no sheen.	1.32	20.4	205.8	131.7	3.97	192.2	398.0
0021	MW024	MW12	8/04/2024 14:25	Clear, no turbidity, no odour, no sheen.	2.05	20.8	495.8	317.3	3.90	138.9	344.7
0021	MW025	MW11	12/04/2024 9:05	Light brown, low turbidity, sulfuric odour, no sheen. Some sediment at base of HydraSleeve.	3.45	21.7	91.1	58.3	4.28	31.5	237.3
0021	MW026	MW10	12/04/2024 8:50	Clear, low turbidity, no odour, no sheen. Some sediment at base of HydraSleeve.	6.16	20.3	456.2	292.0	4.99	30.4	236.2
0021	MW028	0021_MW08, MW8	12/04/2024 9:45	Light brown, no turbidity, no odour, no sheen.	2.98	20.3	1,492.0	954.9	5.01	-12.2	193.6
0021	MW030	MW6	10/04/2024 11:10	Clear, no turbidity, no odour, no sheen.	1.84	18.7	1,792.0	1,146.9	6.55	39.6	245.4
0021	MW061		11/04/2024 8:40	Light grey, low turbidity, no odour, no sheen.	1.21	24.2	424.5	271.7	5.98	88.0	293.8
0021	MW062		11/04/2024 9:30	Light yellow, no turbidity, no odour, no sheen.	1.59	21.6	679.0	434.6	6.41	11.0	216.8
0021	MW101	A_MW01	10/04/2024 14:15	Clear, no turbidity, no odour, no sheen.	6.31	20.4	319.8	204.7	6.08	260.8	466.6
0021	MW102	A_MW02	10/04/2024 13:55	Light brown, low turbidity, no odour, no sheen.	3.86	22.6	358.0	229.1	6.32	45.5	251.3
0021	MW103	A_MW03	11/04/2024 8:55	Clear, no turbidity, no odour, no sheen. Suspended solids.	4.51	17.8	346.2	221.6	5.52	12.0	217.8
0021	MW104	A_MW04	11/04/2024 9:36	Clear, low turbidity, no odour, no sheen.	6.11	19.3	248.0	158.7	3.84	58.4	264.2
0021	MW105	A_MW05	11/04/2024 10:06	Pale yellow, low turbidity, organic odour, no sheen.	3.54	19.1	699.0	447.4	5.16	-19.2	186.6
0021	MW106	A_MW06	10/04/2024 14:35	Clear, no turbidity, sulfurous odour, no sheen.	1.26	19.7	403.4	258.2	6.48	176.1	381.9
0021	MW107	A_MW07	11/04/2024 9:46	Pale yellow, low turbidity, no odour, no sheen. Some sediment at base of HydraSleeve.	1.38	20.4	500.0	320.0	5.62	29.4	235.2
0021	MW108	A_MW08	11/04/2024 10:41	Light brown, no turbidity, no odour, no sheen.	3.95	19.7	160.0	102.4	5.72	349.0	554.8
0021	MW109	A_MW09	10/04/2024 13:45	Light orange/yellow, no turbidity, no odour, no sheen.	1.87	21.1	163.8	104.8	5.67	-47.5	158.3
0021	MW110	B_MW01	10/04/2024 12:35	Light yellow, no turbidity, no odour, no sheen.	1.03	19.5	227.2	145.4	5.01	145.6	351.4
0021	MW111	B_MW02	10/04/2024 12:40	Clear, no turbidity, no odour, no sheen.	5.53	19.6	121.0	77.4	6.54	67.4	273.2
0021	MW112	B_MW03	8/04/2024 14:52	Yellow/orange, no turbidity, no odour, no sheen.	4.13	21.5	401.1	256.7	4.38	189.0	394.8
0021	MW113	B_MW04	10/04/2024 12:10	Clear, no turbidity, no odour, no sheen.	1.21	19.2	177.3	113.5	4.42	264.5	470.3
0021	MW114	BB_MW01	9/04/2024 13:00	Clear, low turbidity, no odour, no sheen.	4.27	19.1	412.7	264.1	5.96	-54.9	150.9
0021	MW115	BB_MW02	11/04/2024 12:18	Light brown, low turbidity, no odour, no sheen.	5.68	21.3	398.8	255.2	6.79	-25.0	n/a
0021	MW117	C_MW01	12/04/2024 10:43	Pale yellow, low turbidity, no odour, no sheen.	5.25	22.8	508.0	325.1	6.79	59.4	265.2
0021	MW118	C_MW02	12/04/2024 10:32	light yellow, low turbidity, no odour, no sheen.	1.74	22.1	311.3	199.2	6.65	13.8	219.6
0021	MW119	C_MW03	12/04/2024 10:03	Clear, no turbidity, no odour, no sheen.	4.15	20.6	277.9	177.9	5.48	-52.7	153.1
0021	MW120	C_MW04	12/04/2024 9:56	Light brown, no turbidity, no odour, no sheen.	4.61	21.8	842.0	538.9	5.58	-22.2	183.6
0021	MW121	C_MW05	10/04/2024 10:40	Light brown, low turbidity, no odour, no sheen.	1.72	19.6	185.6	118.8	6.51	129.4	335.2
0021	MW123	C_MW07	12/04/2024 9:35	Light brown, no turbidity, no odour, no sheen.	5.95	20.9	311.0	199.0	5.03	-12.3	193.5
0021	MW124	CL_MW01	10/04/2024 11:58	Grey, low turbidity, no odour, no sheen. Some sediment at base of HydraSleeve.	3.12	21.1	194.6	124.5	4.96	-76.0	129.8
0021	MW125	FC_MW01	10/04/2024 9:33	Grey, moderate turbidity, no odour, no sheen. Suspended solids.	2.04	20.2	171.8	110.0	5.36	-21.4	184.4
0021	MW126	FC_MW02	10/04/2024 9:20	Light yellow, low turbidity, no odour, no sheen. Suspended solids.	3.41	18.9	482.5	308.8	5.75	61.9	267.7
0021	MW128	LM_MW01	10/04/2024 10:12	Grey, low turbidity, no odour, no sheen.	3.47	22.4	884.0	565.8	4.32	117.3	323.1
0021	MW129	LM_MW02	9/04/2024 12:41	Clear, no turbidity, no odour, no sheen.	4.12	16.1	350.6	224.4	5.97	-114.4	91.4
0021	MW130	LW_MW01	9/04/2024 15:21	Light brow, low turbidity, no odour, no sheen. Some sediment at base of HydraSleeve.	3.40	15.7	290.7	186.0	6.25	-18.2	187.6
0021	MW131	MC_MW02	9/04/2024 10:52	Light orange, no turbidity, no odour, no sheen.	3.82	18.4	1,498.0	958.7	6.50	-41.0	n/a
0021	MW132	MC_MW03	9/04/2024 14:50	Clear, no turbidity, no odour, no sheen.	2.12	17.5	395.1	252.9	4.65	39.9	245.7
0021	MW133	MC_MW04	9/04/2024 11:40	Clear, no turbidity, hydrocarbon odour, no sheen.	1.27	17.2	605.0	387.2	4.96	57.3	263.1
0021	MW135	LM_MW03A	9/04/2024 8:49	Light brown, low turbidity, no odour, no sheen.	3.66	17.2	319.2	204.3	5.99	6.4	212.2
0021	MW136	LM_MW03B	9/04/2024 9:09	Light grey, no turbidity, no odour, no sheen.	2.54	17.0	230.8	147.7	5.01	-15.4	190.4
0021	MW137	LM_MW03C	9/04/2024 8:57	Grey, low turbidity, no odour, no sheen.	3.36	17.4	336.1	215.1	4.28	180.9	386.7
0021	MW138	LW_MW02A	9/04/2024 13:53	Clear, no turbidity, no odour, no sheen.	0.67	15.9	743.0	475.5	6.72	-87.1	118.7
0021	MW139	LW_MW02B	9/04/2024 13:38	Grey, low turbidity, no odour, no sheen.	2.12	15.0	287.6	184.1	5.51	39.1	244.9
0021	MW140	LW_MW02C	9/04/2024 14:00	Light brown, low turbidity, no odour, no sheen.	1.46	16.3	263.5	168.6	5.26	-6.0	199.8
0021	MW150		n/a	Not sampled, gauge only location.	n/a	n/a	n/a	n/a	n/a	n/a	n/a
0021	MW151		n/a	Not sampled, gauge only location.	n/a	n/a	n/a	n/a	n/a	n/a	n/a
0021	MW152		n/a	Not sampled, gauge only location.	n/a	n/a	n/a	n/a	n/a	n/a	n/a
0021	MW153		n/a	Not sampled, gauge only location.	n/a	n/a	n/a	n/a	n/a	n/a	n/a

Table T2 Groundwater Quality Parameters and Observations

					Water Quality Parameters						
Site ID	Location Code	Alternative Name	Sampled Date Time	Sample Comment	Dissolved Oxygen	Temperature	Electrical Conductivity	Total Dissolved Solids (Calculated)	pH	Redox Potential Er	Redox Potential Eh (Corrected)
0021	MW 154		n/a	Not sampled, gauge only location.	mg/L	°C	µS/cm	mg/L	pH Units	mV	mV
					n/a	n/a	n/a	n/a	n/a	n/a	n/a
0021	MW 155		n/a	Not sampled, gauge only location.	n/a	n/a	n/a	n/a	n/a	n/a	n/a

Notes
Calculated Total Dissolved Solids TDS = (EC /1000) x 640
Corrected field Redox measurement Eh = Er + 205.8
mg/L = milligrams per Litre
°C = degrees Celsius
µS/cm = microSiemens per centimetre
mV = millivolts
n/a Not applicable

Table T3 - Groundwater Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Salinity	Lab Report #																		
0020	MW007	HMAS Creswell	08 Apr 2024	0020 MW007 240408	Normal	Non-saline	ES2411964	<0.01	0.11	0.14	0.25	0.28	0.03	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	MW012	Captains Lagoon	08 Apr 2024	0020 MW012 240408	Normal	Non-saline	ES2411964	0.07	7.22	1.26	8.48	8.97	0.05	0.09	0.08	<0.02	<0.1	0.02	0.12	0.03	<0.02	<0.02	<0.02	<0.05	
0020	MW012	Captains Lagoon	08 Apr 2024	0020 QC101 240408	Field D	Non-saline	ES2411964	0.06	7.18	1.43	8.61	9.1	0.05	0.08	0.1	<0.02	<0.1	0.03	0.14	0.03	<0.02	<0.02	<0.02	<0.05	
0020	MW012	Captains Lagoon	08 Apr 2024	0020 QC201 240408	Interlab D	Non-saline	348827	0.07	6.5	1.3	7.9	8.3	0.06	0.08	0.08	<0.02	<0.02	0.02	0.15	0.02	<0.01	<0.02	<0.02	<0.5	
0020	MW017	AEC E	08 Apr 2024	0020 MW017 240408	Normal	Non-saline	ES2411964	0.02	1.03	0.32	1.35	1.49	<0.02	0.02	0.03	<0.02	<0.1	<0.02	0.05	0.02	<0.02	<0.02	<0.02	<0.05	
0020	MW037	AEC F	08 Apr 2024	0020 MW037 240408	Normal	Non-saline	ES2411964	0.87	3	7.17	10.2	28.6	1.35	1.8	0.93	<0.02	0.8	2.49	3.36	0.66	<0.02	<0.02	<0.02	<0.05	
0020	MW102D	Captains Lagoon	08 Apr 2024	0020 MW102D 240408	Normal	Non-saline	ES2411964	0.02	1.16	0.43	1.59	1.93	0.02	0.02	0.06	<0.02	<0.1	0.05	0.15	0.02	<0.02	<0.02	<0.02	<0.05	
0020	MW105	Captains Lagoon	08 Apr 2024	0020 MW105 240408	Normal	Non-saline	ES2411964	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0020	MW109	AEC E	08 Apr 2024	0020 MW109 240408	Normal	Non-saline	ES2411964	0.01	0.57	0.31	0.88	1.06	0.04	0.04	0.03	<0.02	<0.1	<0.02	0.06	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	MW109	AEC E	08 Apr 2024	0020 QC100 240408	Field D	Non-saline	ES2411964	0.03	1.21	0.44	1.65	1.97	<0.02	0.02	0.06	<0.02	<0.1	0.02	0.16	0.03	<0.02	<0.02	<0.02	<0.05	
0020	MW109	AEC E	08 Apr 2024	0020 QC200 240408	Interlab D	Non-saline	348827	0.03	0.89	0.39	1.3	1.7	0.02	0.03	0.06	<0.02	0.05	0.05	0.14	0.02	<0.01	<0.02	<0.02	<0.5	
0020	MW110	AEC E	08 Apr 2024	0020 MW110 240408	Normal	Non-saline	ES2411964	0.13	4.36	1.63	5.99	6.78	0.06	0.09	0.14	<0.02	<0.1	0.2	0.11	0.06	<0.02	<0.02	<0.02	<0.05	
0020	MW111	AEC E	08 Apr 2024	0020 MW111 240408	Normal	Non-saline	ES2411964	0.14	14.4	1.31	15.7	17.8	0.09	0.12	0.05	<0.02	0.2	0.53	0.35	0.18	0.05	<0.02	<0.02	<0.05	
0020	MW112	AEC F	08 Apr 2024	0020 MW112 240408	Normal	Non-saline	ES2411964	0.07	0.19	0.74	0.93	1.48	0.13	0.1	<0.02	<0.02	<0.1	0.04	0.14	0.04	<0.02	<0.02	<0.02	<0.05	
0020	MW115	AEC F	08 Apr 2024	0020 MW115 240408	Normal	Non-saline	ES2411964	<0.01	3.26	0.08	3.34	3.34	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW022	JBRF	08 Apr 2024	0021 MW022 240408	Normal	Non-saline	ES2411994	0.04	0.82	0.71	1.53	1.7	<0.02	0.02	0.06	<0.02	<0.1	<0.02	0.05	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW022	JBRF	08 Apr 2024	0021 QC101 240408	Field D	Non-saline	ES2411994	0.05	0.86	0.74	1.6	1.79	<0.02	0.03	0.06	<0.02	<0.1	<0.02	0.05	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW022	JBRF	08 Apr 2024	0021 QC201 240408	Interlab D	Non-saline	348825	0.04	0.66	0.67	1.3	1.5	<0.01	0.02	0.05	<0.02	<0.02	<0.02	0.06	0.01	<0.01	<0.02	<0.02	<0.5	
0021	MW024	AEC A	08 Apr 2024	0021 MW024 240408	Normal	Non-saline	ES2411994	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW025	AEC H	12 Apr 2024	0021 MW025 240412	Normal	Non-saline	ES2411994	<0.01	<0.01	0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW026	AEC H	12 Apr 2024	0021 MW026 240412	Normal	Non-saline	ES2411994	<0.01	<0.01	0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW028	AEC C	12 Apr 2024	0021 MW028 240412	Normal	Non-saline	ES2411994	0.01	0.2	0.24	0.44	0.56	<0.02	0.02	<0.02	<0.02	<0.1	<0.02	0.09	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW030	AEC C	10 Apr 2024	0021 MW030 240410	Normal	Non-saline	ES2411994	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW061	AEC A	11 Apr 2024	0021 MW061 240411	Normal	Non-saline	ES2411994	0.11	5.23	1.75	6.98	7.88	0.08	0.12	0.12	<0.02	<0.1	0.05	0.32	0.05	<0.02	<0.02	<0.02	<0.05	
0021	MW062	AEC A	11 Apr 2024	0021 MW062 240411	Normal	Non-saline	ES2411994	1.37	78.4	18.5	96.9	109	0.98	1.14	1.22	0.11	0.4	0.63	4.62	0.9	0.07	0.05	<0.02	<0.02	<0.05
0021	MW101	AEC A	10 Apr 2024	0021 MW101 240410	Normal	Non-saline	ES2411994	<0.01	0.2	0.13	0.33	0.33	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW102	AEC A	10 Apr 2024	0021 MW102 240410	Normal	Non-saline	ES2411994	0.25	5.73	3.19	8.92	11.6	0.31	0.32	0.34	<0.02	0.1	0.16	0.91	0.14	<0.02	<0.02	<0.02	<0.05	
0021	MW103	AEC A	11 Apr 2024	0021 MW103 240411	Normal	Non-saline	ES2411994	0.18	36.8	3.39	40.2	42.7	0.23	0.29	0.41	0.04	0.1	0.11	0.74	0.09	<0.02	<0.02	<0.02	<0.05	
0021	MW104	AEC A	11 Apr 2024	0021 MW104 240411	Normal	Non-saline	ES2411994	<0.01	0.12	0.12	0.24	0.24	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW105	AEC A	11 Apr 2024	0021 MW105 240411	Normal	Non-saline	ES2411994	0.24	11	6.83	17.8	21.3	0.7	0.8	0.29	0.04	<0.1	0.07	0.86	0.14	<0.02	<0.02	<0.02	<0.05	
0021	MW106	AEC A	10 Apr 2024	0021 MW106 240410	Normal	Non-saline	ES2411994	0.97	78.2	19.8	98	109	0.64	1.41	1.34	0.19	0.2	0.45	4.37	0.4	0.03	<0.02	<0.02	<0.02	<0.05
0021	MW107	AEC A	11 Apr 2024	0021 MW107 240411	Normal	Non-saline	ES2411994	0.1	2.42	3.18	5.6	6.87	0.17	0.23	0.11	<0.02	<0.1	0.08	0.43	0.06	<0.02	<0.02	<0.02	<0.05	
0021	MW107	AEC A	11 Apr 2024	0021 QC112 240411	Field D	Non-saline	ES2411994	0.1	2.76	3.31	6.07	7.39	0.18	0.26	0.08	<0.02	<0.1	0.1	0.47	0.05	<0.02	<0.02	<0.02	<0.05	
0021	MW107	AEC A	11 Apr 2024	0021 QC212 240411	Interlab D	Non-saline	348825	0.09	2.3	3	5.3	6.4	0.17	0.21	0.09	<0.02	0.04	0.08	0.4	0.05	<0.01	<0.02	<0.02	<0.5	
0021	MW108	AEC A	11 Apr 2024	0021 MW108 240411	Normal	Non-saline	ES2411994	0.15	5.87	4.01	9.88	11.4	0.18	0.28	0.16	<0.02	<0.1	0.1	0.52	0.08	<0.02	<0.02	<0.02	<0.05	
0021	MW109	AEC A	10 Apr 2024	0021 MW109 240410	Normal	Non-saline	ES2411994	0.03	1.48	0.67	2.15	2.52	0.04	0.05	0.02	<0.02	<0.1	0.04	0.19	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW110	AEC B	10 Apr 2024	0021 MW110 240410	Normal	Non-saline	ES2411994	<0.01	0.04	0.21	0.25	0.25	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW111	AEC B	10 Apr 2024	0021 MW111 240410	Normal	Non-saline	ES2411994	<0.01	0.02	0.02	0.04	0.04	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW112	JBRF	08 Apr 2024	0021 MW112 240408	Normal	Non-saline	ES2411994	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW113	AEC B	10 Apr 2024	0021 MW113 240410	Normal	Non-saline	ES2411994	<0.01	0.01	<0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	MW114	Lakes	09 Apr 2024	0021 MW114 240409	Normal	Non-saline	ES2411994	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02			

[illegible]

Table T3 - Groundwater Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Salinity	Lab Report #																
0021	MW128	Lakes	10 Apr 2024	0021_QC104_240410	Field_D	Non-saline	ES2411994	<0.01	<0.01	0.03	0.03	0.03	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
0021	MW128	Lakes	10 Apr 2024	0021_QC204_240410	Interlab_D	Non-saline	348825	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.01	<0.01	<0.01	<0.02	<0.02	<0.05
0021	MW129	Lakes	09 Apr 2024	0021_MW129_240409	Normal	Non-saline	ES2411994	<0.0005	0.0066	0.0026	0.0092	0.0103	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	0.0011	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW130	Lakes	09 Apr 2024	0021_MW130_240409	Normal	Non-saline	ES2411994	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW131	Mary Creek	09 Apr 2024	0021_MW131_240409	Normal	Non-saline	ES2411994	<0.01	0.07	0.12	0.19	0.19	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW132	Mary Creek	09 Apr 2024	0021_MW132_240409	Normal	Non-saline	ES2411994	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW133	Mary Creek	09 Apr 2024	0021_MW133_240409	Normal	Non-saline	ES2411994	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW135	Lakes	09 Apr 2024	0021_MW135_240409	Normal	Non-saline	ES2411994	0.002	0.0056	<0.0005	0.0056	0.0085	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW136	Lakes	09 Apr 2024	0021_MW136_240409	Normal	Non-saline	ES2411994	<0.0005	<0.0002	<0.0005	<0.0002	0.0033	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW137	Lakes	09 Apr 2024	0021_MW137_240409	Normal	Non-saline	ES2411994	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW138	Lakes	09 Apr 2024	0021_MW138_240409	Normal	Non-saline	ES2411994	<0.0005	<0.0002	<0.0005	<0.0002	0.0115	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	0.0009	0.0006	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	09 Apr 2024	0021_MW139_240409	Normal	Non-saline	ES2411994	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	09 Apr 2024	0021_QC100_240409	Field_D	Non-saline	ES2411994	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	09 Apr 2024	0021_QC200_240409	Interlab_D	Non-saline	348825	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0004	<0.001	<0.001	<0.002	<0.002	<0.002	<0.0004	<0.0004	<0.001	<0.002	<0.005
0021	MW140	Lakes	09 Apr 2024	0021_MW140_240409	Normal	Non-saline	ES2411994	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005

Notes
LOR Limit of Reporting
Normal Primary sample
Field_D Intra-laboratory duplicate sample
Interlab_D Inter-laboratory duplicate sample
Denotes first-time detection above LOR
Denotes new exceedance of human health and /or ecological screening criteria

Table T3 - Groundwater Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Salinity	Lab Report #											
0021	MW128	Lakes	10 Apr 2024	0021_QC104_240410	Field_D	Non-saline	ES2411994	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW128	Lakes	10 Apr 2024	0021_QC204_240410	Interlab_D	Non-saline	348825	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	MW129	Lakes	09 Apr 2024	0021_MW129_240409	Normal	Non-saline	ES2411994	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW130	Lakes	09 Apr 2024	0021_MW130_240409	Normal	Non-saline	ES2411994	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW131	Mary Creek	09 Apr 2024	0021_MW131_240409	Normal	Non-saline	ES2411994	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW132	Mary Creek	09 Apr 2024	0021_MW132_240409	Normal	Non-saline	ES2411994	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW133	Mary Creek	09 Apr 2024	0021_MW133_240409	Normal	Non-saline	ES2411994	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW135	Lakes	09 Apr 2024	0021_MW135_240409	Normal	Non-saline	ES2411994	<0.001	<0.001	<0.001	<0.001	0.0009	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW136	Lakes	09 Apr 2024	0021_MW136_240409	Normal	Non-saline	ES2411994	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW137	Lakes	09 Apr 2024	0021_MW137_240409	Normal	Non-saline	ES2411994	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW138	Lakes	09 Apr 2024	0021_MW138_240409	Normal	Non-saline	ES2411994	<0.001	0.01	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	09 Apr 2024	0021_MW139_240409	Normal	Non-saline	ES2411994	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	09 Apr 2024	0021_QC100_240409	Field_D	Non-saline	ES2411994	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	09 Apr 2024	0021_QC200_240409	Interlab_D	Non-saline	348825	<0.001	<0.0004	<0.0004	<0.002	<0.01	<0.05	<0.002	<0.05	<0.1	<0.002	<0.5
0021	MW140	Lakes	09 Apr 2024	0021_MW140_240409	Normal	Non-saline	ES2411994	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001

Notes
LOR Limit of Reporting
Normal Primary sample
Field_D Intra-laboratory duplicate sample
Interlab_D Inter-laboratory duplicate sample
Denotes first-time detection above LOR
Denotes new exceedance of human health and /or ecological screening criteria

Table T4 Surface Water and Tank Water Quality Parameters and Observations

Site ID	Location Code	Alternative Name	Sampled Date Time	Location Comments	Sample Comment	Water Quality Parameters						
						Dissolved Oxygen	Temperature	Electrical Conductivity	Total Dissolved Solids (Calculated)	pH	Redox Potential Er	Redox Potential Eh (Corrected)
						mg/L	°C	µS/cm	mg/L	pH_Units	mV	mV
0020	SW004	CL_SW01	8/04/2024 10:48	Lagoon. Waterbody 30 m wide, 0.4 m deep. No water flow observed.	Clear, no turbidity, no odour, no sheen.	5.93	24.4	11,761.0	7,527.0	6.41	2.8	208.6
0020	SW005	CL_SW02	8/04/2024 10:28	Lagoon. Waterbody 20 m wide, 0.2 m deep. No water flow observed.	Light brown, no turbidity, no odour, no sheen.	6.42	19.6	1,804.0	1,154.6	5.89	-32.4	173.4
0020	SW010	CL_SW07	8/04/2024 9:35	Creek. Waterbody 10 m wide, >0.5 m deep. No water flow observed.	Light yellow to brown, low turbidity, organic odour, no sheen.	5.14	22.0	6,817.0	4,362.9	6.26	69.7	275.5
0020	SW011	CL_SW08	8/04/2024 13:45	Creek near culvert. Waterbody 0.5 m wide, 0.05 m deep. Water flow observed.	Light brown, no turbidity, no odour, no sheen.	5.16	20.3	176.3	112.8	5.97	58.4	264.2
0020	SW012	CL_SW12	8/04/2024 13:08	Creek at confluence with ocean. Waterbody 5 m wide, 0.2 m deep. Water flow observed.	Yellow to brown, no turbidity, no odour, no sheen.	6.55	23.9	17,953.0	11,489.9	7.09	-3.6	202.2
0020	SW016	E_IRRIGATION_03	8/04/2024 13:39	Treated effluent tank out-put pipe.	Clear, no turbidity, organic odour, no sheen.	2.29	23.5	528.0	337.9	6.12	81.1	286.9
0020	SW018	E_SW01	8/04/2024 13:23	Settlement pond. Waterbody 20 m, 50 m wide. No water flow observed.	Green, no turbidity, no odour, no sheen. Aquatic vegetation present.	7.93	24.3	392.3	251.1	8.84	51.5	257.3
0020	SW022	F_SW01	8/04/2024 11:10	Stormwater culvert. Waterbody 0.4 m wide, 0.1 m deep. No water flow observed.	Clear, no turbidity, no odour, no sheen.	6.32	22.2	337.4	215.9	6.14	111.7	317.5
0020	SW023	F_SW02	8/04/2024 11:59	Stormwater culvert. Waterbody 0.4 m wide, 0.2 m deep. Water flow observed.	Light brown, low turbidity, no odour, no sheen.	4.67	22.4	361.0	231.0	6.67	115.8	321.6
0020	SW026	FC_SW01	8/04/2024 11:47	Creek at confluence with ocean. Waterbody 5 m wide, 0.3 m deep. Water flow observed.	Light brown, no turbidity, no odour, sheen.	3.74	21.8	13,449.0	8,607.4	6.37	94.1	299.9
0020	SW027	FC_SW02	8/04/2024 11:34	Creek. Waterbody 8 m wide, 0.4 m deep. Water flow observed.	Brown, no turbidity, no odour, no sheen.	3.92	22.8	11,259.0	7,205.8	6.28	93.6	299.4
0020	SW029	FC_SW04	8/04/2024 10:45	Creek with vegetated banks. Waterbody 10 m wide, >0.5 m deep. No water flow observed.	Yellow, low turbidity, no odour, no sheen.	4.45	22.1	4,543.0	2,907.5	4.61	21.6	227.4
0020	SW030	FC_SW05	8/04/2024 8:30	Creek. Waterbody 2.5 m wide, 0.05 m deep. Water flow observed.	Light brown, no turbidity, no odour, no sheen.	7.21	18.4	160.6	102.8	7.27	217.4	423.2
0020	SW032	FC_SW13	8/04/2024 8:48	Creek near culvert. Waterbody 1 m wide, 0.2 m deep. Water flow observed.	Light brown, no turbidity, organic odour, no sheen.	8.11	19.3	169.1	108.2	4.02	211.6	417.4
0020	SW033	FC_SW14	8/04/2024 12:01	Ocean. 0.3 m deep at sampling point. Water flow observed.	Clear, no turbidity, no odour, no sheen.	4.21	23.6	47,395.0	30,332.8	4.22	70.5	276.3
0020	SW035	G_SW01	8/04/2024 9:37	Drain along the northwest perimeter of the settling ponds/sludge pit. No water flow observed.	Clear, no turbidity, no odour, no sheen.	7.66	22.8	1,796.0	1,149.4	5.54	337.2	543.0
0020	SW036	G_SW02	8/04/2024 9:48	Sewerage treatment pond, waterbody 30 m wide, > 1 m deep. No water flow observed.	Clear, no turbidity, no odour, no sheen.	3.91	22.2	383.9	245.7	5.90	242.5	448.3
0020	SW037	G_SW03	8/04/2024 9:55	Sewerage treatment pond, waterbody 20 m wide, > 1 m deep. No water flow observed.	Clear, no turbidity, no odour, no sheen.	3.44	21.7	384.0	245.8	5.86	193.6	399.4
0021	OTH001	A_S415_SW05	11/04/2024 9:45	RAN SSSS - Training Water Holding Tank S415.	Clear, no turbidity, no odour, no sheen.	8.04	19.9	203.8	130.4	7.25	340.7	546.5
0021	OTH002	A_S416_SW02	10/04/2024 14:05	RAN SSSS - Fire Main Water Tank S416.	Clear, no turbidity, no odour, no sheen.	6.38	20.6	586.0	375.0	7.18	222.2	428.0
0021	OTH003	A_S426_SW01	11/04/2024 10:30	RAN SSSS - Oil Separator Reclaim Pit S426.	Clear, no turbidity, no odour, no sheen.	12.84	18.7	271.5	173.8	7.37	394.9	600.7
0021	OTH004	A_S439_SW03	11/04/2024 9:50	RAN SSSS - DCTU Holding Tank S439.	Brown/orange, low turbidity, no odour, no sheen.	8.44	18.7	313.2	200.4	7.48	334.2	540.0
0021	OTH005	A_S440_SW01	10/04/2024 14:27	RAN SSSS - Pit Tank S440.	Clear, no turbidity, no odour, no sheen.	5.28	20.5	65.2	41.7	8.88	150.5	356.3
0021	OTH006	A_S481_SW04	11/04/2024 10:10	RAN SSSS - DLSTRU S481.	Clear, no turbidity, no odour, no sheen.	7.11	22.0	1,384.0	885.8	7.09	669.4	875.2
0021	SW001	AB_SW01	10/04/2024 13:58	Stream near culvert. Waterbody 0.5 m wide, 0.15 m deep. No water flow observed.	Clear, low turbidity, no odour, no sheen.	5.43	23.3	237.7	152.1	6.57	-31.9	173.9
0021	SW002	AB_SW02	11/04/2024 9:05	Small tributary of creek. Waterbody 0.5 m wide, 0.1 m deep. No water flow observed.	Clear, low turbidity, no odour, no sheen.	9.60	17.4	214.9	137.5	5.67	-20.7	185.1
0021	SW003	AB_SW03	11/04/2024 9:35	Drainage line. Waterbody 0.4 m wide, 0.1 m deep. No water flow observed.	Clear, low turbidity, no odour, no sheen.	8.51	19.7	182.2	116.6	4.07	45.1	250.9
0021	SW004	AB_SW04	12/04/2024 8:25	Swale. Waterbody 3 m wide, <0.2 m deep. No water flow observed.	Light brown, no turbidity, no odour, no sheen.	7.22	19.0	173.2	110.8	4.38	62.6	268.4
0021	SW005	AB_SW05	12/04/2024 8:05	Creek. Waterbody 0.5 m wide, 0.2 m deep. Water flow observed.	Light brown, no turbidity, no odour, no sheen.	9.58	18.5	176.7	113.1	4.16	28.7	234.5
0021	SW006	AB_SW06	12/04/2024 8:05	Drainage line. Waterbody 1 m wide, 0.3 m deep. Water flow observed.	Light brown, no turbidity, no odour, no sheen.	10.10	17.7	153.8	98.4	4.04	40.1	245.9
0021	SW010	B_SW01	10/04/2024 12:20	Ford over cobble road-base, water flowing over approximately 20 m section. Water flow observed.	Brown, no turbidity, no odour, no sheen.	3.24	17.5	128.8	82.4	4.50	266.4	472.2
0021	SW011	B_SW02	10/04/2024 11:58	Ephemeral creek / swamp area. Waterbody 0.2 m deep, 0.5 m wide. No water flow observed.	Light yellow, no turbidity, no odour, no sheen.	3.76	19.2	186.5	119.4	4.82	200.4	406.2
0021	SW013	CL_SW09	10/04/2024 11:45	Stream near culvert. Waterbody 1.5 m wide, 0.1 m deep. Water flow observed.	Clear, low turbidity, no odour, no sheen.	7.25	20.7	528.0	337.9	5.53	-46.8	159.0
0021	SW016	DC_SW01	n/a	Drainage line. No water present (location was dry).	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
0021	SW017	DC_SW02	n/a	Drainage line. No water present (location was dry).	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
0021	SW018	DC_SW03	n/a	Culvert. Inaccessible, located within construction area.	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
0021	SW019	DC_SW04	11/04/2024 10:38	Stream/drainage line. Waterbody 0.4 m wide, 0.1 m deep. No water flow observed.	Pale yellow, no turbidity, no odour, no sheen.	6.44	19.3	305.3	195.4	6.45	-38.2	167.6
0021	SW020	DC_SW05	12/04/2024 9:15	Swale. Waterbody 2 m wide, 0.2 m deep. No water flow observed.	Clear, no turbidity, no odour, no sheen.	8.20	20.0	318.5	203.8	4.95	26.1	231.9
0021	SW021	DC_SW06	12/04/2024 9:20	Swale. Waterbody 1.5 m wide, 0.15 m deep. No water flow observed.	Light brown, no turbidity, no odour, no sheen.	11.05	21.6	297.4	190.3	5.63	12.2	218.0
0021	SW022	FC_SW06	10/04/2024 8:47	Drainage line. Waterbody 1 m wide, 0.1 m deep. No water flow observed.	Light brown, low turbidity, organic odour, biosheen.	4.57	14.8	93.2	59.6	4.62	110.5	316.3
0021	SW024	FC_SW08	10/04/2024 8:59	Creek/drainage line. Waterbody 0.5 m wide, 0.1 m deep. No water flow observed.	Pale yellow, low turbidity, no odour, no sheen.	5.87	17.4	134.4	86.0	5.32	72.1	277.9
0021	SW025	FC_SW09	10/04/2024 9:55	Creek/drainage line. Waterbody 1 m wide, 0.1 m deep. No water flow observed.	Clear, low turbidity, no odour, no sheen.	8.75	22.3	175.3	112.2	5.37	71.9	277.7
0021	SW027	FC_SW11	10/04/2024 10:56	Creek. Waterbody 1 m wide, 0.25 m deep. No water flow observed.	Clear, no turbidity, no odour, no sheen.	3.17	17.9	198.9	127.3	5.57	173.8	379.6
0021	SW032	LM_SW01	9/04/2024 9:23	Lake. Waterbody >20 m wide, 0.3 m deep. No water flow observed.	Light yellow, no turbidity, no odour, no sheen.	4.12	19.1	200.7	128.4	5.58	20.4	226.2
0021	SW034	LM_SW03	9/04/2024 9:37	Lake. Waterbody >50 m wide, 0.3 m deep. No water flow observed.	Light yellow, no turbidity, no odour, no sheen.	5.62	19.0	204.8	131.1	5.70	80.8	286.6
0021	SW035	LM_SW04	10/04/2024 8:15	Creek. Waterbody 0.5 m wide, 0.1 m deep. Water flow observed.	Yellow, low turbidity, no odour, no sheen.	7.62	14.6	143.7	92.0	3.80	128.1	333.9
0021	SW036	LW_SW01	9/04/2024 14:17	Lake. Waterbody >50 m wide, 0.3 m deep. No water flow observed.	Clear, low turbidity, no odour, no sheen.	5.89	17.7	110.9	71.0	5.98	48.2	254.0
0021	SW037	LW_SW02	9/04/2024 15:01	Lake. Waterbody >50 m wide, 0.3 m deep. No water flow observed.	Clear, low turbidity, no odour, no sheen.	8.15	16.8	114.5	73.3	5.46	148.8	354.6
0021	SW038	LW_SW03	n/a	Lake. Inaccessible due to the access path (lake beach) being submerged by high lake water levels.	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
0021	SW040	LW_SW05	9/04/2024 14:48	Stream. Waterbody 0.5 m wide, 0.1 m deep. Water flow observed.	Clear, no turbidity, no odour, no sheen.	8.29	15.9	125.0	80.0	4.42	165.0	370.8
0021	SW043	MC_SW01	9/04/2024 14:35	Creek. Waterbody 4 m wide, 0.5 m deep. No water flow observed.	Light brown, low turbidity, no odour, no sheen.	5.05	17.3	359.6	230.1	5.08	108.9	314.7
0021	SW044	MC_SW02	9/04/2024 12:47	Creek. Waterbody 2 m wide, 0.2 m deep. Water flow observed.	Brown, no turbidity, no odour, no sheen.	7.20	19.5	209.6	134.1	4.60	157.6	363.4
0021	SW045	MC_SW03	9/04/2024 12:20	Creek. Waterbody 1 m wide, 0.5 m deep. Water flow observed.	Light orange, no turbidity, no odour, no sheen.	8.60	18.1	249.8	159.9	4.55	162.3	368.1
0021	SW048	MC_SW06	10/04/2024 8:40	Culvert. Waterbody 1 m wide, 0.3 m deep. Water flow observed.	Brown, no turbidity, no odour, no sheen.	8.25	15.1	167.3	107.1	4.88	190.6	396.4
0021	SW051	MC_SW09	n/a	Ocean. Inaccessible due to the location being off the coastline and only accessible by boat.	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
0021	SW052	MC_SW10	9/04/2024 11:20	Beach. 30 m wide, 0.5 m deep. Water flow observed.	Clear, no turbidity, no odour, no sheen.	7.54	16.8	23,213.0	14,856.3	7.51	39.4	245.2
0021	SW053	MC_SW11	9/04/2024 12:03	Creek. Waterbody 12 m wide, 0.5 m deep. Water flow observed.	Light orange, no turbidity, no odour, no sheen.	7.64	16.9	149.2	95.5	4.89	103.6	309.4
0021	SW056	SC_SW01	9/04/2024 11:00	Creek. Waterbody 8 m wide, 1 m deep. Water flow observed.	Light brown, no turbidity, no odour, no sheen.	10.81	17.3	13,023.0	8,334.7	6.52	18.4	224.2
0021	SW057	SC_SW02	9/04/2024 15:10	Creek. Waterbody 2 m wide, 0.5 m deep. Water flow observed.	Light brown, no turbidity, no odour, no sheen.	10.21	16.9	149.7	95.8	4.07	97.8	303.6
0021	SW058	SC_SW03	9/04/2024 15:45	Creek. Waterbody 1.5 m wide, 0.3 m deep. Water flow observed.	Light brown, no turbidity, no odour, no sheen.	10.02	15.3	147.0	94.1	3.55	217.4	423.2
0021	SW059	SC_SW04	10/04/2024 13:24	Puddle in drainage line. Waterbody 0.2 m wide, 0.05 m deep. No water flow observed.	Clear, low turbidity, no odour, no sheen.	8.42	23.7	246.4	157.7	6.59	15.7	221.5
0021	SW060	TC_SW01	10/04/2024 10:44	Bedrock creek. Waterbody 10 m wide, 0.1 m deep. Water flow observed.	Brown, no turbidity, organic odour, no sheen.	5.31	20.1	150.4	96.3	4.34	105.2	311.0
0021	SW062	TC_SW03	8/04/2024 14:47	Creek near culvert. Waterbody 5 m wide, 0.2 m deep. Water flow observed. Trace foam on surface of water.	Clear, low turbidity, no odour, no sheen.	5.87	19.7	120.1	76.9	6.09	186.0	391.8
0021	SW064	TC_SW05	8/04/2024 14:34	Creek near culvert. Waterbody 3 m wide, 0.3 m deep. Water flow observed.	Yellow/brown, no turbidity, no odour, no sheen.	4.20	20.2	131.0	83.8	4.82	194.2	400.0
0021	SW068	TC_SW09	10/04/2024 10:58	Creek with highly vegetated banks. Waterbody 10 m wide, 0.4 m deep. Waterbody 5 m wide, 1.0 m deep. No water flow observed.	Light brown, low turbidity, organic odour, no sheen.	6.31	19.7	3,271.0	2,093.4	5.51	33.1	238.9
0021	SW069	TC_SW10	10/04/2024 11:14	Creek mouth near bay beach. Waterbody 15 m wide, 0.3 m deep. Water flow observed.	Brown, no turbidity, organic odour, no sheen.	9.05	19.1	23,731.0	15,187.8	7.00	29.5	235.3
0021	SW076	UN2_SW01	10/04/2024 9:00	Pond. Waterbody 40 m, >1.5m deep. No water flow observed.	Light brown, no turbidity, no odour, no sheen.	2.40	17.8	181.3	116.0	5.77	181.3	387.1

Table T4 Surface Water and Tank Water Quality Parameters and Observations

Site ID	Location Code	Alternative Name	Sampled Date Time	Location Comments	Sample Comment	Water Quality Parameters						
						Dissolved Oxygen	Temperature	Electrical Conductivity	Total Dissolved Solids (Calculated)	pH	Redox Potential Er	Redox Potential Eh (Corrected)
						mg/L	°C	µS/cm	mg/L	pH_Units	mV	mV
0021	SW077	UN2_SW02	10/04/2024 9:15	Pond. Waterbody 30 m, >1.5m deep. No water flow observed.	Clear, no turbidity, no odour, no sheen.	2.41	16.5	178.4	114.2	5.35	197.8	403.6
0021	SW078	UN2_SW03	10/04/2024 9:30	Pond. Waterbody 30 m, >0.3m deep. No water flow observed.	Clear, no turbidity, no odour, no sheen.	5.08	16.2	185.3	118.6	5.83	185.8	391.6
0021	SW079	UN2_SW04	10/04/2024 9:45	Pond. Waterbody 40 m, 40 m. No water flow observed.	Clear, no turbidity, no odour, no sheen.	5.16	15.7	234.5	150.1	5.42	187.6	393.4
0021	SW080	UN2_SW05	10/04/2024 10:00	Pond. Waterbody 50 m, 40 m, >1m deep. No water flow observed.	Clear, no turbidity, no odour, no sheen.	9.17	16.9	176.8	113.2	5.54	182.4	388.2
0021	SW083	UN3_SW03	9/04/2024 15:45	Swamp. Waterbody >30 m wide, 0.5 m deep. No water flow observed.	Yellow, no turbidity, no odour, no sheen.	4.98	16.3	347.6	222.5	6.38	51.4	257.2
0021	SW085	UN3_SW05	9/04/2024 10:30	Beach in bay. Waterbody 20 m wide, 0.3 m deep at sampling point. Water flow observed.	Clear, no turbidity, no odour, no sheen.	6.81	17.7	44,340.0	28,377.6	7.73	29.0	234.8
0021	SW110	-	10/04/2024 14:12	Drainage line near culvert. Waterbody 0.4 m wide, 0.1 m deep. Water flow observed. Minor foam on surface.	Clear, no turbidity, no odour, no sheen.	6.78	21.3	227.6	145.7	6.59	14.7	220.5
0021	SW111	-	n/a	Drainage line. No water present (location was dry).	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
0021	SW112	-	10/04/2024 14:23	Drain. Waterbody 0.5 m wide, 0.05 m deep. Water flow observed.	Clear, no turbidity, no odour, no sheen.	8.91	20.7	213.7	136.8	6.65	24.7	230.5
0021	SW126	-	11/04/2024 10:26	Stream/drainage line. Waterbody 0.6 m wide, 0.2 m deep. No water flow observed.	Clear, no turbidity, no odour, no sheen.	5.84	19.5	192.3	123.1	7.14	-39.5	166.3
0021	SW127	-	10/04/2024 12:55	Stormwater drain. Waterbody 1 m wide, <0.05 m deep. Water flow observed.	Light yellow, no turbidity, no odour, no sheen.	6.91	20.8	193.3	123.7	6.33	67.8	273.6
0021	SW130	-	11/04/2024 8:50	Small creek. 1 m wide, 0.1 m deep. No water flow observed.	Clear, no turbidity, no odour, no sheen.	5.68	16.5	235.0	150.4	6.80	4.0	209.8
0021	SW153	-	10/04/2024 12:47	Stormwater culvert. Waterbody 1 m wide, <0.15 m deep. Water flow observed.	Light yellow, no turbidity, no odour, no sheen.	7.50	19.4	181.1	115.9	5.95	91.8	297.6

Notes
Calculated Total Dissolved Solids TDS = (EC /1000) x 640
Corrected field Redox measurement Eh = Er + 205.8
mg/L = milligrams per Litre
°C = degrees Celsius
µS/cm = microSiemens per centimetre
mV = millivolts
n/a Not applicable

[illegible]

Table T5 - Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
LOR	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Salinity	Lab Report #										
0020	SW004	Captains Lagoon	08 Apr 2024	0020_SW004_240408	Normal	Saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW005	Captains Lagoon	08 Apr 2024	0020_SW005_240408	Normal	Non-saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW010	Captains Lagoon	08 Apr 2024	0020_SW010_240408	Normal	Saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW011	Captains Lagoon	08 Apr 2024	0020_SW011_240408	Normal	Non-saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW012	Captains Lagoon	08 Apr 2024	0020_QC104_240408	Field_D	Saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW012	Captains Lagoon	08 Apr 2024	0020_QC204_240408	Interlab_D	Saline	348827	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0020	SW012	Captains Lagoon	08 Apr 2024	0020_SW012_240408	Normal	Saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW016	AEC E	08 Apr 2024	0020_SW016_240408	Normal	Non-saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW018	AEC E	08 Apr 2024	0020_SW018_240408	Normal	Non-saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW022	AEC F	08 Apr 2024	0020_SW022_240408	Normal	Non-saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW023	AEC F	08 Apr 2024	0020_SW023_240408	Normal	Non-saline	ES2411964	<0.05	0.15	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW026	Flat Rock Creek	08 Apr 2024	0020_SW026_240408	Normal	Saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW027	Flat Rock Creek	08 Apr 2024	0020_SW027_240408	Normal	Saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW029	Flat Rock Creek	08 Apr 2024	0020_SW029_240408	Normal	Saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW030	Flat Rock Creek	08 Apr 2024	0020_SW030_240408	Normal	Non-saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW032	Flat Rock Creek	08 Apr 2024	0020_SW032_240408	Normal	Non-saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW033	Flat Rock Creek	08 Apr 2024	0020_SW033_240408	Normal	Saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW035	AEC G	08 Apr 2024	0020_SW035_240408	Normal	Non-saline	ES2411964	<0.05	<0.05	<0.05	<0.05	0.08	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW036	AEC G	08 Apr 2024	0020_SW036_240408	Normal	Non-saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW037	AEC G	08 Apr 2024	0020_SW037_240408	Normal	Non-saline	ES2411964	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	OTH001	AEC A	11 Apr 2024	0021_OTH001_240411	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	OTH002	AEC A	10 Apr 2024	0021_OTH002_240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	OTH003	AEC A	11 Apr 2024	0021_OTH003_240411	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	OTH004	AEC A	11 Apr 2024	0021_OTH004_240411	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	OTH005	AEC A	10 Apr 2024	0021_OTH005_240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	OTH006	AEC A	11 Apr 2024	0021_OTH006_240411	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW001	AEC A	10 Apr 2024	0021_SW001_240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW002	AEC A	11 Apr 2024	0021_SW002_240411	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW003	AEC A	11 Apr 2024	0021_SW003_240411	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW004	AEC B	12 Apr 2024	0021_SW004_240412	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW005	Site drainage channels	12 Apr 2024	0021_SW005_240412	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW006	Site drainage channels	12 Apr 2024	0021_SW006_240412	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW010	AEC B	10 Apr 2024	0021_SW010_240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW011	AEC B	10 Apr 2024	0021_SW011_240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW013	Captains Lagoon	10 Apr 2024	0021_QC106_240410	Field_D	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW013	Captains Lagoon	10 Apr 2024	0021_QC206_240410	Interlab_D	Non-saline	348825	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	SW013	Captains Lagoon	10 Apr 2024	0021_SW013_240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW019	Site drainage channels	11 Apr 2024	0021_SW019_240411	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW020	Site drainage channels	12 Apr 2024	0021_SW020_240412	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW021	Site drainage channels	12 Apr 2024	0021_SW021_240412	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW022	Flat Rock Creek	10 Apr 2024	0021_SW022_240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW024	Flat Rock Creek	10 Apr 2024	0021_SW024_240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW025	Flat Rock Creek	10 Apr 2024	0021_SW025_240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW027	AEC C	10 Apr 2024	0021_SW027_240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW032	Lake McKenzie	09 Apr 2024	0021_SW032_240409	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW034	Lake McKenzie	09 Apr 2024	0021_SW034_240409	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW035	Lake McKenzie	10 Apr 2024	0021_SW035_240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW036	Lake Windermere	09 Apr 2024	0021_SW036_240409	Normal	Non-saline	ES2412012	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	SW037	Lake Windermere	09 Apr 2024	0021_SW037_240409	Normal	Non-saline	ES2412012	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	SW040	Lake Windermere	09 Apr 2024	0021_SW040_240409	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW043	Mary Creek	09 Apr 2024	0021_SW043_240409	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	SW044	Mary Creek	09 Apr 2024	0021_QC203_240409	Interlab_D	Non-saline	348825	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	SW044	Mary Creek	09 Apr 2024	0021_SW044_240409	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02

[illegible]

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Table T5 - Surface Water Analytical Results

								PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
								4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
								µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR								0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)																		
PFAS NEMP 2020 Recreational Water																		
PFAS NEMP 2020 Freshwater 99%																		
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)																		

Site ID	Location Code	Area	Date	Field ID	Sample Type	Salinity	Lab Report #											
0021	SW045	Mary Creek	09 Apr 2024	0021 SW045 240409	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW048	Mary Creek	10 Apr 2024	0021 SW048 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW052	Mary Creek	09 Apr 2024	0021 SW052 240409	Normal	Saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	09 Apr 2024	0021 QC103 240409	Field_D	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	09 Apr 2024	0021 SW053 240409	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW056	Summercloud Creek	09 Apr 2024	0021 SW056 240409	Normal	Saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW057	Summercloud Creek	09 Apr 2024	0021 SW057 240409	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW058	Summercloud Creek	09 Apr 2024	0021 SW058 240409	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW059	Summercloud Creek	10 Apr 2024	0021 SW059 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW060	Telegraph Creek	10 Apr 2024	0021 SW060 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW062	Telegraph Creek	08 Apr 2024	0021 SW062 240408	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW064	Telegraph Creek	08 Apr 2024	0021 SW064 240408	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW068	Telegraph Creek	10 Apr 2024	0021 SW068 240410	Normal	Saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW069	Telegraph Creek	10 Apr 2024	0021 SW069 240410	Normal	Saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW076	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 QC105 240410	Field_D	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW076	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 QC205 240410	Interlab_D	Non-saline	348825	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW076	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SW076 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW077	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SW077 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW078	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SW078 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW079	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SW079 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW080	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 QC109 240410	Field_D	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW080	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 QC209 240410	Interlab_D	Non-saline	348825	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW080	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SW080 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW083	Ryan's Swamp	09 Apr 2024	0021 SW083 240409	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW085	Summercloud Creek	09 Apr 2024	0021 SW085 240409	Normal	Saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	10 Apr 2024	0021 QC110 240410	Field_D	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	10 Apr 2024	0021 QC210 240410	Interlab_D	Non-saline	348825	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW110	AEC A	10 Apr 2024	0021 SW110 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW112	AEC A	10 Apr 2024	0021 SW112 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW126	Site drainage channels	11 Apr 2024	0021 QC114 240411	Field_D	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW126	Site drainage channels	11 Apr 2024	0021 QC214 240411	Interlab_D	Non-saline	348825	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW126	Site drainage channels	11 Apr 2024	0021 SW126 240411	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	10 Apr 2024	0021 SW127 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW130	AEC A	11 Apr 2024	0021 SW130 240411	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	10 Apr 2024	0021 SW153 240410	Normal	Non-saline	ES2412012	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05

Notes
LOR Limit of Reporting
Normal Primary sample
Field_D Intra-laboratory duplicate sample
Interlab_D Inter-laboratory duplicate sample
 Denotes first-time detection above LOR
 Denotes new exceedance of human health and /or ecological screening criteria

Table T6 Sediment Observations

Site ID	Location Code	Alternative Name	Sampled Date Time	Location Comments	Sample Comment
0020	SD001	FC SD01	8/04/2024 11:47	Co-located SW/SD: 0020 SW026 and 0020 SD001.	SAND: white to brown, fine to medium grain. No odour, no staining.
0020	SD002	FC SD02	8/04/2024 11:36	Co-located SW/SD: 0020 SW027 and 0020 SD002.	SAND: light brown, fine to coarse grain, with trace gravels. No odour, no staining.
0020	SD004	FC SD04	8/04/2024 10:43	Co-located SW/SD: 0020 SW029 and 0020 SD004.	Clayey SAND: light brown, fine to coarse grain sand, with gravels and organic inclusions (roots). No odour, no staining.
0020	SD006	FC SD13	8/04/2024 8:54	Co-located SW/SD: 0020 SW032 and 0020 SD006.	Gravelly SAND: yellow to light brown, fine to coarse grain sand, saturated. No odour, no staining.
0020	SD007	FC SD14	8/04/2024 12:06	Co-located SW/SD: 0020 SW033 and 0020 SD007.	SAND: white to brown, fine to coarse grain. No odour, no staining.
0020	SD018	CL SD01	8/04/2024 10:42	Co-located SW/SD: 0020 SW004 and 0020 SD018.	SAND: yellow, fine to medium grain. No odour, no staining.
0020	SD019	CL SD02	8/04/2024 10:32	Co-located SW/SD: 0020 SW005 and 0020 SD019.	Silty SAND: brown, medium grain sand, well sorted, saturated. No odour, no staining.
0020	SD024	CL SD07	8/04/2024 9:36	Co-located SW/SD: 0020 SW010 and 0020 SD024.	SAND: grey with yellow mottling, medium to coarse grain, with trace gravels and organic inclusions (rootlets). Organic odour, no staining.
0020	SD025	CL SD08	8/04/2024 13:46	Co-located SW/SD: 0020 SW011 and 0020 SD025.	Gravelly SAND: grey to brown, fine to coarse grain sand, saturated. No odour, no staining.
0020	SD026	CL SD12	8/04/2024 13:06	Co-located SW/SD: 0020 SW012 and 0020 SD026.	SAND: white to brown, fine to coarse grain, saturated. No odour, no staining.
0020	SD028	E SD01	8/04/2024 13:19	Co-located SW/SD: 0020 SW018 and 0020 SD028.	SAND: light brown, medium grain, with organic inclusions (rootlets). No odour, no staining.
0020	SD032	F SD01	8/04/2024 11:10	Co-located SW/SD: 0020 SW022 and 0020 SD032.	Silty SAND: dark grey with white sand, medium grain sand, poorly graded, saturated, with organic inclusions (rootlets and lead litter). No odour, no staining.
0020	SD033	F SD02	8/04/2024 11:47	Co-located SW/SD: 0020 SW023 and 0020 SD033.	SAND: dark brown, medium grain, saturated, with organic inclusions (leaf litter). No odour, no staining.
0021	SD001	AB SD01	10/04/2024 13:57	Co-located SW/SD: 0021 SW001 and 0021 SD001.	SAND: light brown, fine to medium grain, with trace gravels. No odour, no staining.
0021	SD002	AB SD02	11/04/2024 9:07	Co-located SW/SD: 0021 SW002 and 0021 SD002.	Sandy GRAVEL: light grey to brown, fine to medium grain sand, saturated. No odour, no staining.
0021	SD003	AB SD03	11/04/2024 9:35	Co-located SW/SD: 0021 SW003 and 0021 SD003.	SAND: light grey, fine to coarse grain, with trace gravel and organic inclusions (rootlets). No odour, no staining.
0021	SD004	AB SD04	12/04/2024 8:25	Co-located SW/SD: 0021 SW004 and 0021 SD004.	Silty SAND: dark brown, coarse grain sand, with organic inclusions (rootlets). No odour, no staining.
0021	SD005	AB SD06	12/04/2024 8:05	Co-located SW/SD: 0021 SW006 and 0021 SD005.	SAND: light grey, fine to coarse grain, with trace gravels. No odour, no staining.
0021	SD006	B SD01	10/04/2024 12:20	Co-located SW/SD: 0021 SW010 and 0021 SD006.	Silty CLAY: dark brown, low plasticity, saturated. No odour, no staining.
0021	SD007	B SD02	10/04/2024 11:58	Co-located SW/SD: 0021 SW011 and 0021 SD007.	Sandy CLAY: dark brown clay with white sand, low plasticity, medium grain sand, saturated, with organic inclusions (rootlets). No odour, no staining.
0021	SD009	CL SD09	10/04/2024 11:50	Co-located SW/SD: 0021 SW013 and 0021 SD009.	Gravelly SAND: light brown, fine to coarse grain sand, saturated, with trace organic inclusions (rootlets). No odour, no staining.
0021	SD012	DC SD01	12/04/2024 8:05	Co-located SW/SD: 0021 SW016 and 0021 SD012.	SAND: light yellow to brown, fine to medium grain, with coarse gravels. No odour, no staining.
0021	SD013	DC SD02	12/04/2024 7:55	Co-located SW/SD: 0021 SW017 and 0021 SD013.	SAND: light brown, medium to coarse grain, with trace gravels. No odour, no staining.
0021	SD014	DC_SD03	n/a	Co-located SW/SD: 0021_SW018 and 0021_SD014. Inaccessible, located within construction area.	na
0021	SD015	DC SD04	11/04/2024 10:43	Co-located SW/SD: 0021 SW019 and 0021 SD015.	SAND: orange to light brown, coarse grain, with trace coarse gravels. No odour, no staining.
0021	SD016	DC SD05	12/04/2024 9:15	Co-located SW/SD: 0021 SW020 and 0021 SD016.	Clayey SAND: dark grey to brown, fine to medium grain sand, moist. No odour, no staining.
0021	SD017	DC SD06	12/04/2024 9:20	Co-located SW/SD: 0021 SW021 and 0021 SD017.	SAND: brown, coarse grain, with gravels, moist, trace organic inclusions (rootlets). No odour, no staining.
0021	SD018	FC SD06	10/04/2024 8:48	Co-located SW/SD: 0021 SW022 and 0021 SD018.	SILT: dark grey, fine grain, with high organic inclusions (rootlets and grass). No odour, no staining.
0021	SD020	FC SD08	10/04/2024 9:12	Co-located SW/SD: 0021 SW024 and 0021 SD020.	Silty SAND: dark brown, fine grain sand, with organic inclusions (rootlets and grass). No odour, no staining.
0021	SD021	FC SD09	10/04/2024 9:59	Co-located SW/SD: 0021 SW025 and 0021 SD021.	SAND: dark grey to brown, fine to medium grain. No odour, no staining.
0021	SD023	FC SD11	10/04/2024 10:57	Co-located SW/SD: 0021 SW027 and 0021 SD023.	Silty SAND: brown, fine grain, saturated, with organic inclusions (rootlets). No odour, no staining.
0021	SD028	LM SD03	9/04/2024 9:43	Co-located SW/SD: 0021 SW034 and 0021 SD028.	SAND: brown to grey, fine to coarse grain, with high organic inclusions (roots, leaves and bark). No odour, no staining.
0021	SD029	LM SD04	10/04/2024 8:14	Co-located SW/SD: 0021 SW035 and 0021 SD029.	SAND: dark grey to brown, fine to medium grain, saturated, with organic inclusions (rootlets and leaves). No odour, no staining.
0021	SD030	LW SD01	9/04/2024 14:18	Co-located SW/SD: 0021 SW036 and 0021 SD030.	Gravelly SAND: orange to grey, fine to coarse grain sand. No odour, no staining.
0021	SD031	LW SD02	9/04/2024 15:07	Co-located SW/SD: 0021 SW037 and 0021 SD031.	Sandy GRAVEL: light brown, fine to coarse grain sand, trace organic inclusions. No odour, no staining.
0021	SD032	LW_SD03	n/a	Co-located SW/SD: 0021_SW038 and 0021_SD032. Inaccessible due to the access path (lake beach) being submerged by high lake water levels.	n/a
0021	SD035	MC SD01	9/04/2024 14:35	Co-located SW/SD: 0021 SW043 and 0021 SD035.	Sandy silty SAND: fine grain sand and silt, saturated, with organic inclusions (rootlets). No odour, no staining.
0021	SD036	MC SD02	9/04/2024 12:30	Co-located SW/SD: 0021 SW044 and 0021 SD036.	Sandy CLAY: dark brown, low plasticity, medium grain sand, saturated, with organic inclusions (rootlets). No odour, no staining.
0021	SD037	MC SD03	9/04/2024 12:20	Co-located SW/SD: 0021 SW045 and 0021 SD037.	SAND: white and light brown, medium to coarse grain, poorly graded, saturated, with organic inclusions. No odour, no staining.
0021	SD040	MC SD06	10/04/2024 8:30	Co-located SW/SD: 0021 SW048 and 0021 SD040.	Sandy SILT: brown, low plasticity, fine grain sand, saturated, with organic inclusions (rootlets). No odour, no staining.
0021	SD043	MC_SD09	n/a	Co-located SW/SD: 0021_SW051 and 0021_SD043. Inaccessible due to the location being off the coastline and only accessible by boat.	n/a
0021	SD044	MC SD10	9/04/2024 11:20	Co-located SW/SD: 0021 SW052 and 0021 SD044.	SAND: light brown colour, medium grain. No odour, no staining.
0021	SD046	SC SD01	9/04/2024 11:00	Co-located SW/SD: 0021 SW056 and 0021 SD046.	SAND: brown, medium grain. No odour, no staining.
0021	SD047	SC SD02	9/04/2024 15:10	Co-located SW/SD: 0021 SW057 and 0021 SD047.	Silty SAND: dark brown with white sand, low plasticity, coarse grain sand, with heavy organic inclusions (rootlets). No odour, no staining.
0021	SD048	SC SD03	9/04/2024 15:10	Co-located SW/SD: 0021 SW058 and 0021 SD048.	Clayey SAND: dark brown with white sand, low to medium plasticity, coarse grain sand, poorly graded, with heavy organic inclusions (rootlets). No odour, no staining.
0021	SD049	SC SD04	10/04/2024 13:23	Co-located SW/SD: 0021 SW059 and 0021 SD049.	SILT: dark brown, low plasticity, with high organic inclusions (rootlets and grass). No odour, no staining.
0021	SD050	TC SD01	10/04/2024 10:35	Co-located SW/SD: 0021 SW060 and 0021 SD050.	Silty SAND: dark brown, fine to coarse grained, with roots and leaves. No odour or staining.
0021	SD052	TC SD03	8/04/2024 14:40	Co-located SW/SD: 0021 SW062 and 0021 SD052.	Sandy GRAVEL: white to grey, coarse grain sand, saturated, with trace organic inclusions. No odour, no staining.
0021	SD054	TC SD05	8/04/2024 14:22	Co-located SW/SD: 0021 SW064 and 0021 SD054.	SILT: dark brown, fine grain, with high organic inclusions (roots and leaves). No odour, no staining.
0021	SD058	TC SD09	10/04/2024 10:56	Co-located SW/SD: 0021 SW068 and 0021 SD058.	SILT: dark brown, low plasticity, with high organic inclusions (rootlets, leaves and reeds). Organic odour, no staining.
0021	SD059	TC SD10	10/04/2024 11:15	Co-located SW/SD: 0021 SW069 and 0021 SD059.	SAND: white to brown, medium to coarse grain, with trace gravels, saturated. No odour, no staining.
0021	SD066	UN2 SD01	10/04/2024 8:50	Co-located SW/SD: 0021 SW076 and 0021 SD066.	Sandy silty CLAY: dark brown with white sand, low plasticity, fine grain sand, with heavy organic inclusions (rootlets). No odour, no staining.
0021	SD067	UN2 SD02	10/04/2024 9:10	Co-located SW/SD: 0021 SW077 and 0021 SD067.	Sandy CLAY: dark brown, medium plasticity, saturated, with organic inclusions (rootlets and leaf litter). No odour, no staining.
0021	SD068	UN2 SD03	10/04/2024 9:20	Co-located SW/SD: 0021 SW078 and 0021 SD068.	CLAY: light brown, high plasticity, wet, with organic inclusions (small rootlets). No odour, no staining.
0021	SD069	UN2 SD04	10/04/2024 9:35	Co-located SW/SD: 0021 SW079 and 0021 SD069.	CLAY: dark brown, low plasticity, saturated, with heavy organic inclusions (rootlets and leaf litter). No odour, no staining.
0021	SD070	UN2 SD05	10/04/2024 9:50	Co-located SW/SD: 0021 SW080 and 0021 SD070.	CLAY: brown, low plasticity, wet, with organic inclusions (rootlets and leaf litter). No odour, no staining.
0021	SD073	UN3 SD03	9/04/2024 15:42	Co-located SW/SD: 0021 SW083 and 0021 SD073.	SAND: dark grey to brown, fine grain, with organic inclusions, trace gravels. No odour, no staining.
0021	SD075	UN3 SD05	9/04/2024 10:30	Co-located SW/SD: 0021 SW085 and 0021 SD075.	SAND: light brown, medium grain. No odour, no staining.
0021	SD080	LM SD01	9/04/2024 9:21	Co-located SW/SD: 0021 SW032 and 0021 SD080.	SAND: light grey to brown, fine to coarse grain, with trace organic inclusions (rootlets). No odour, no staining.
0021	SD093	LW SD05	9/04/2024 14:41	Co-located SW/SD: 0021 SW040 and 0021 SD093.	Gravelly SAND: grey, medium to coarse grain sand, saturated. No odour, no staining.
0021	SD110	-	12/04/2024 8:00	Co-located SW/SD: 0021 SW005 and 0021 SD110.	SAND: light brown, fine to coarse grain, with trace gravels. No odour, no staining.
0021	SD111	-	9/04/2024 12:00	Co-located SW/SD: 0021 SW053 and 0021 SD111.	Sandy CLAY: dark brown, low to medium plasticity, coarse grain sand, poorly graded, with cobbles and organic inclusions (rootlets). No odour, no staining.

Notes
n/a Not applicable

Table T7 - Sediment Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
LOR	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0002	0.0005

Site ID	Location Code	Area	Date	Field ID	Sample Type	Lab Report #																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																															

LOR	0.0001	0.0001	0.0001	0.0001	0.0002	0.0005	0.0002	0.0005	0.0005	0.0002	0.0005

[illegible]

Table T7 - Sediment Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTrDA)	Perfluorotetradecanoic acid (PFTeDA)
	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
LOR	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0002	0.0005

Site ID	Location Code	Area	Date	Field ID	Sample Type	Lab Report #																	
0021	SD059	Telegraph Creek	10 Apr 2024	0021 SD059 240410	Normal	ES2411995	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD066	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD066 240410	Normal	ES2411995	<0.0002	0.0028	<0.0002	0.0028	0.0028	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD067	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD067 240410	Normal	ES2411995	<0.0002	0.0004	<0.0002	0.0004	0.0004	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD068	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD068 240410	Normal	ES2411995	<0.0002	0.0049	0.0003	0.0052	0.0052	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 QC107 240410	Field_D	ES2411995	<0.0002	0.046	0.0052	0.0512	0.0512	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0006
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 QC207 240410	Interlab_D	348825	0.0002	0.043	0.0044	0.047	0.048	0.0001	<0.0001	<0.0001	<0.0002	<0.0002	0.0004	0.0001	0.0001	<0.002	<0.002	<0.0050	<0.0005
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD069 240410	Normal	ES2411995	<0.0002	0.0404	0.0044	0.0448	0.0457	<0.0002	<0.0002	<0.0002	0.0009	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD070	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD070 240410	Normal	ES2411995	<0.0002	0.0039	0.001	0.0049	0.0049	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD073	Ryan's Swamp	09 Apr 2024	0021 SD073 240409	Normal	ES2411995	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD075	Summercloud Creek	09 Apr 2024	0021 SD075 240409	Normal	ES2411995	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD080	Lake McKenzie	09 Apr 2024	0021 SD080 240409	Normal	ES2411995	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD093	Lake Windermere	09 Apr 2024	0021 SD093 240409	Normal	ES2411995	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD110	Site drainage channels	12 Apr 2024	0021 SD110 240412	Normal	ES2411995	0.0005	0.0005	0.0046	0.0051	0.006	<0.0002	0.0002	0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD111	Mary Creek	09 Apr 2024	0021 SD111 240409	Normal	ES2411995	0.0005	0.17	0.0181	0.188	0.196	0.0005	0.001	0.002	0.0021	<0.001	0.0002	0.0009	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005

Notes
LOR Limit of Reporting
Normal Primary sample
Field_D Intra-laboratory duplicate sample
Interlab_D Inter-laboratory duplicate sample
Denotes first-time detection above LOR

Table T7 - Sediment Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
LOR	0.0001	0.0001	0.0001	0.0001	0.0002	0.0005	0.0002	0.0005	0.0005	0.0002	0.0005

Site ID	Location Code	Area	Date	Field ID	Sample Type											
0021	SD059	Telegraph Creek	10 Apr 2024	0021 SD059 240410	Normal	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD066	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD066 240410	Normal	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD067	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD067 240410	Normal	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD068	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD068 240410	Normal	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 QC107 240410	Field_D	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 QC207 240410	Interlab_D	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.01	<0.0002	<0.005	<0.005	<0.0002	<0.02
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD069 240410	Normal	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD070	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD070 240410	Normal	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD073	Ryan's Swamp	09 Apr 2024	0021 SD073 240409	Normal	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD075	Summercloud Creek	09 Apr 2024	0021 SD075 240409	Normal	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD080	Lake McKenzie	09 Apr 2024	0021 SD080 240409	Normal	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD093	Lake Windermere	09 Apr 2024	0021 SD093 240409	Normal	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD110	Site drainage channels	12 Apr 2024	0021 SD110 240412	Normal	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD111	Mary Creek	09 Apr 2024	0021 SD111 240409	Normal	<0.0005	<0.0005	<0.0005	<0.0005	0.0003	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005

Notes
LOR Limit of Reporting
Normal Primary sample
Field_D Intra-laboratory duplicate sample
Interlab_D Inter-laboratory duplicate sample
 Denotes first-time detection above LOR

Table T8 - Historical Groundwater Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56				0.07														
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																			</

Table T8 - Historical Groundwater Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
LOR	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0020	MW007	HMAS Creswell	08 Feb 2018	0020 MW10 2.7 20180208	Normal	ACTNSW Hist 202012-3	<0.05	<0.05	<0.05	<0.05	-	-	-	-	-	-	-
0020	MW007	HMAS Creswell	11 Apr 2018	0020 MW007 180411	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001
0020	MW007	HMAS Creswell	15 May 2018	0020 MW10 2.8 180515	Normal	ACTNSW Hist 202012-3	<0.05	<0.05	<0.05	<0.05	-	-	-	-	-	-	-
0020	MW007	HMAS Creswell	15 Oct 2021	0020 MW007 211015	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW007	HMAS Creswell	15 Oct 2021	0020 QC100 211015	Field D	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW007	HMAS Creswell	04 Apr 2022	0020 MW007 220404	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW007	HMAS Creswell	10 Oct 2022	0020 MW007 221010	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW007	HMAS Creswell	31 Jan 2023	0020 MW007 230131	Normal	ACT 0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW007	HMAS Creswell	17 Apr 2023	0020 MW007 230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW007	HMAS Creswell	16 Oct 2023	0020 MW007 231016	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW007	HMAS Creswell	08 Apr 2024	0020 MW007 240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW012	Captains Lagoon	27 Sep 2019	0020 MW012 190927	Normal	ACT 0020 Stage2	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW012	Captains Lagoon	27 Sep 2019	0020 QC107 190927	Field D	ACT 0020 Stage2	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW012	Captains Lagoon	27 Sep 2019	0020 QC207 190927	Field D	ACT 0020 Stage2	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW012	Captains Lagoon	15 Oct 2021	0020 MW012 211015	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW012	Captains Lagoon	04 Apr 2022	0020 MW012 220404	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW012	Captains Lagoon	10 Oct 2022	0020 MW012 221010	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW012	Captains Lagoon	17 Apr 2023	0020 MW012 230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW012	Captains Lagoon	16 Oct 2023	0020 MW012 231016	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW012	Captains Lagoon	08 Apr 2024	0020 MW012 240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW012	Captains Lagoon	08 Apr 2024	0020 QC101 240408	Field D	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW012	Captains Lagoon	08 Apr 2024	0020 QC201 240408	Interlab D	ACT 0020 PFASOMP 24	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0020	MW017	AEC E	01 May 2017	MW017	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001
0020	MW017	AEC E	08 Feb 2018	0020 MW16 4.0 20180208	Normal	ACTNSW Hist 202012-3	<0.05	<0.05	<0.05	<0.05	-	-	-	-	-	-	-
0020	MW017	AEC E	27 Sep 2019	0020 MW016 190927	Normal	ACT 0020 Stage2	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW017	AEC E	15 Oct 2021	0020 MW017 211015	Normal	ACT 0020 PFASOMP 21	<0.05	0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW017	AEC E	04 Apr 2022	0020 MW017 220404	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW017	AEC E	11 Oct 2022	0020 MW017 221011	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW017	AEC E	01 Feb 2023	0020 MW017 230201	Normal	ACT 0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW017	AEC E	17 Apr 2023	0020 MW017 230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW017	AEC E	17 Apr 2023	0020 QC104 230417	Field D	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW017	AEC E	17 Apr 2023	0020 QC204 230417	Interlab D	ACT 0020 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0020	MW017	AEC E	16 Oct 2023	0020 MW017 231016	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW017	AEC E	08 Apr 2024	0020 MW017 240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW037	AEC F	06 Feb 2017	0020 MW01 S 170206	Normal	ACTNSW Hist 202012-3	-	<0.01	<0.01	-	-	-	-	-	-	-	-
0020	MW037	AEC F	01 May 2017	MW037	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001
0020	MW037	AEC F	07 Feb 2018	0020 MW01 6.0 20180207	Normal	ACTNSW Hist 202012-3	<0.05	0.08	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW037	AEC F	18 Oct 2021	0020 MW037 211018	Normal	ACT 0020 PFASOMP 21	0.06	1.78	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW037	AEC F	04 Apr 2022	0020 MW037 220404	Normal	ACT 0020 PFASOMP 21	<0.05	0.36	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW037	AEC F	10 Oct 2022	0020 MW037 221010	Normal	ACT 0020 PFASOMP 21	0.05	3.16	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW037	AEC F	10 Oct 2022	0020 QC100 221010	Field D	ACT 0020 PFASOMP 21	<0.05	2.62	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW037	AEC F	17 Apr 2023	0020 MW037 230417	Normal	ACT 0020 PFASOMP 23	<0.05	1.18	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW037	AEC F	16 Oct 2023	0020 MW037 231016	Normal	ACT 0020 PFASOMP 23	<0.05	4.19	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW037	AEC F	08 Apr 2024	0020 MW037 240408	Normal	ACT 0020 PFASOMP 24	<0.05	5.6	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW102D	Captains Lagoon	10 Apr 2018	CL MW02 180410	Normal	JBT 0021 PFAS	<0.002	<0.002	<0.002	<0.002	<0.002	<0.005	<0.002	<0.005	<0.005	<0.002	<0.005
0020	MW102D	Captains Lagoon	10 Apr 2018	CL QC211 180410	Interlab D	JBT 0021 PFAS	<0.001	<0.005	0.001	<0.001	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
0020	MW102D	Captains Lagoon	02 May 2018	CL MW02 180502	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW102D	Captains Lagoon	18 Oct 2021	0020 MW102 211018	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW102D	Captains Lagoon	04 Apr 2022	0020 MW102 220404	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW102D	Captains Lagoon	10 Oct 2022	0020 MW102 221010	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW102D	Captains Lagoon	10 Oct 2022	0020 QC201 221010	Interlab D	ACT 0020 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0020	MW102D	Captains Lagoon	17 Apr 2023	0020 MW102D 230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW102D	Captains Lagoon	16 Oct 2023	0020 MW102D 231016	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	MW102D	Captains Lagoon	16 Oct 2023	0020 QC100 231016	Field D	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05

Table T8 - Historical Groundwater Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56				0.07														
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																			
0020	MW102D	Captains Lagoon	16 Oct 2023	0020 QC200 231016	Interlab D	ACT 0020 PFASOMP 23	<0.01	0.11	0.18	0.29	0.37	0.02	0.03	<0.01	<0.02	<0.02	<0.02	0.03	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1	<0.5
0020	MW102D	Captains Lagoon	08 Apr 2024	0020 MW102D 240408	Normal	ACT 0020 PFASOMP 24	0.02	1.16	0.43	1.59	1.93	0.02	0.02	0.06	<0.02	<0.1	0.05	0.15	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW105	Captains Lagoon	10 Apr 2018	CL MW05 180410	Normal	JBT 0021 PFAS	<0.0005	<0.0003	<0.0005	<0.0003	<0.0003	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0020	MW105	Captains Lagoon	15 Oct 2021	0020 MW105 211015	Normal	ACT 0020 PFASOMP 21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW105	Captains Lagoon	04 Apr 2022	0020 MW105 220404	Normal	ACT 0020 PFASOMP 21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW105	Captains Lagoon	10 Oct 2022	0020 MW105 221010	Normal	ACT 0020 PFASOMP 21	<0.01	0.01	<0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW105	Captains Lagoon	17 Apr 2023	0020 MW105 230417	Normal	ACT 0020 PFASOMP 23	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW105	Captains Lagoon	16 Oct 2023	0020 MW105 231016	Normal	ACT 0020 PFASOMP 23	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW105	Captains Lagoon	08 Apr 2024	0020 MW105 240408	Normal	ACT 0020 PFASOMP 24	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	01 May 2017	E MW04	Normal	JBT 0021 PFAS	0.0057	0.228	0.146	0.374	0.449	0.0087	0.0121	0.0231	<0.0005	<0.002	0.0037	0.0192	0.0021	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0020	MW109	AEC E	03 May 2018	E MW04 180503	Normal	JBT 0021 PFAS	0.06	4.46	1.3	5.76	6.23	0.04	0.08	0.06	<0.02	<0.1	0.03	0.18	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	15 Oct 2021	0020 MW109 211015	Normal	ACT 0020 PFASOMP 21	0.01	0.62	0.48	1.1	1.45	0.03	0.03	0.05	<0.02	<0.1	<0.02	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	04 Apr 2022	0020 MW109 220404	Normal	ACT 0020 PFASOMP 21	0.02	0.53	0.3	0.83	1.04	0.02	<0.02	0.03	<0.02	<0.1	0.02	0.12	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	04 Apr 2022	0020 QC100 220404	Field D	ACT 0020 PFASOMP 21	0.02	0.51	0.3	0.81	1	<0.02	<0.02	0.03	<0.02	<0.1	0.02	0.12	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	04 Apr 2022	0020 QC200 220404	Interlab D	ACT 0020 PFASOMP 21	0.02	0.62	0.32	0.95	1.2	0.02	0.02	0.03	<0.02	0.03	0.02	0.11	0.01	<0.01	<0.02	<0.02	<0.05	<0.1	<0.5
0020	MW109	AEC E	11 Oct 2022	0020 MW109 221011	Normal	ACT 0020 PFASOMP 21	0.03	0.84	0.22	1.06	1.29	<0.02	<0.02	0.02	<0.02	<0.1	0.04	0.14	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	31 Jan 2023	0020 MW109 230131	Normal	ACT 0020 PFASMGMT	0.03	0.78	0.42	1.2	1.55	<0.02	0.02	0.05	<0.02	<0.1	0.07	0.15	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	31 Jan 2023	0020 QC101 230131	Field D	ACT 0020 PFASMGMT	0.04	0.85	0.41	1.26	1.6	<0.02	<0.02	0.05	<0.02	<0.1	0.07	0.15	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	17 Apr 2023	0020 MW109 230417	Normal	ACT 0020 PFASOMP 23	0.06	1.26	0.7	1.96	2.43	0.02	0.04	0.09	<0.02	<0.1	0.05	0.17	0.04	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	16 Oct 2023	0020 MW109 231016	Normal	ACT 0020 PFASOMP 23	0.02	0.69	0.28	0.97	1.24	<0.02	<0.02	0.04	<0.02	<0.1	0.05	0.14	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	08 Apr 2024	0020 MW109 240408	Normal	ACT 0020 PFASOMP 24	0.01	0.57	0.31	0.88	1.06	0.04	0.04	0.03	<0.02	<0.1	<0.02	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	08 Apr 2024	0020 QC100 240408	Field D	ACT 0020 PFASOMP 24	0.03	1.21	0.44	1.65	1.97	<0.02	0.02	0.06	<0.02	<0.1	0.02	0.16	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW109	AEC E	08 Apr 2024	0020 QC200 240408	Interlab D	ACT 0020 PFASOMP 24	0.03	0.89	0.39	1.3	1.7	0.02	0.03	0.06	<0.02	0.05	0.05	0.14	0.02	<0.01	<0.02	<0.02	<0.05	<0.1	<0.5
0020	MW110	AEC E	01 May 2017	E MW05	Normal	JBT 0021 PFAS	0.0299	0.292	0.86	1.15	1.43	0.036	0.0582	0.0782	<0.0005	<0.002	0.0251	0.0409	0.0089	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0020	MW110	AEC E	11 Oct 2019	0020 MW110 191011	Normal	ACT 0020 Stage2	0.15	2.17	3.56	5.73	6.93	0.18	0.26	0.21	<0.02	<0.1	0.05	0.29	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW110	AEC E	15 Oct 2021	0020 MW110 211015	Normal	ACT 0020 PFASOMP 21	0.13	2.23	4.08	6.31	8.28	0.3	0.52	0.18	<0.02	0.1	0.16	0.45	0.08	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW110	AEC E	04 Apr 2022	0020 MW110 220404	Normal	ACT 0020 PFASOMP 21	0.13	1.51	4.29	5.8	8.03	0.27	0.34	0.21	<0.02	0.2	0.4	0.61	0.07	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW110	AEC E	04 Apr 2022	0020 QC102 220404	Field D	ACT 0020 PFASOMP 21	0.12	1.67	4.4	6.07	8.26	0.26	0.35	0.22	<0.02	0.2	0.38	0.59	0.07	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW110	AEC E	04 Apr 2022	0020 QC202 220404	Interlab D	ACT 0020 PFASOMP 21	0.15	2.1	4.7	6.8	9.2	0.27	0.38	0.22	<0.02	0.28	0.42	0.56	0.08	<0.01	<0.02	<0.02	<0.05	<0.1	<0.5
0020	MW110	AEC E	11 Oct 2022	0020 MW110 221011	Normal	ACT 0020 PFASOMP 21	0.17	3.21	1.78	4.99	6.81	0.03	0.07	0.23	<0.02	0.3	0.69	0.22	0.11	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW110	AEC E	11 Oct 2022	0020 QC104 221011	Field D	ACT 0020 PFASOMP 21	0.17	2.97	2.17	5.14	7.04	0.04	0.09	0.23	<0.02	0.3	0.73	0.22	0.12	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW110	AEC E	31 Jan 2023	0020 MW110 230131	Normal	ACT 0020 PFASMGMT	0.15	4.27	1.53	5.8	7.56	0.03	0.07	0.16	<0.02	0.3	0.77	0.18	0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW110	AEC E	17 Apr 2023	0020 MW110 230417	Normal	ACT 0020 PFASOMP 23	0.16	5.2	1.35	6.55	7.92	0.04	0.07	0.16	<0.02	0.2	0.48	0.16	0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW110	AEC E	16 Oct 2023	0020 MW110 231016	Normal	ACT 0020 PFASOMP 23	0.09	4.56	0.97	5.53	6.09	0.04	0.05	0.09	<0.02	<0.1	0.16	0.08	0.05	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW110	AEC E	08 Apr 2024	0020 MW110 240408	Normal	ACT 0020 PFASOMP 24	0.13	4.36	1.63	5.99	6.78	0.06	0.09	0.14	<0.02	<0.1	0.2	0.11	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW111	AEC E	01 May 2017	F MW01	Normal	JBT 0021 PFAS	0.0863	2.36	0.808	3.17	4.71	0.125	0.125	0.0532	<0.0005	0.004	0.572	0.325	0.108	0.0016	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0020	MW111	AEC E	18 Oct 2021	0020 MW111 211018	Normal	ACT 0020 PFASOMP 21	0.21	13.2	1.62	14.8	18.4	0.1	0.13	0.05	<0.02	0.3	1.22	0.76	0.47	0.04	<0.02	<0.02	<0.02	<0.02	<0.05
0020	MW111	AEC E	18 Oct 2021	0020 QC200 211018	Interlab D	ACT 0020 PFASOMP 21	0.26	14	1.7	16	20	0.13	0.12	0.06	<0.02	0.34	1.3	0.79	0.59	0.03	<0.02	<0.02	<0.05	<0.1	<0.5
0020	MW111	AEC E	08 Apr 2022	0020 MW111 220408</																					

Table T8 - Historical Groundwater Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
LOR	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID												
0020	MW102D	Captains Lagoon	16 Oct 2023	0020 QC200 231016	Interlab D	ACT 0020 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5	
0020	MW102D	Captains Lagoon	08 Apr 2024	0020 MW102D 240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW105	Captains Lagoon	10 Apr 2018	CL MW05 180410	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001	
0020	MW105	Captains Lagoon	15 Oct 2021	0020 MW105 211015	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW105	Captains Lagoon	04 Apr 2022	0020 MW105 220404	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW105	Captains Lagoon	10 Oct 2022	0020 MW105 221010	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW105	Captains Lagoon	17 Apr 2023	0020 MW105 230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW105	Captains Lagoon	16 Oct 2023	0020 MW105 231016	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW105	Captains Lagoon	08 Apr 2024	0020 MW105 240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	01 May 2017	E MW04	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001	
0020	MW109	AEC E	03 May 2018	E MW04 180503	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	15 Oct 2021	0020 MW109 211015	Normal	ACT 0020 PFASOMP 21	<0.05	0.17	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	04 Apr 2022	0020 MW109 220404	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	04 Apr 2022	0020 QC100 220404	Field D	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	04 Apr 2022	0020 QC200 220404	Interlab D	ACT 0020 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5	
0020	MW109	AEC E	11 Oct 2022	0020 MW109 221011	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	31 Jan 2023	0020 MW109 230131	Normal	ACT 0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	31 Jan 2023	0020 QC101 230131	Field D	ACT 0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	17 Apr 2023	0020 MW109 230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	16 Oct 2023	0020 MW109 231016	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	08 Apr 2024	0020 MW109 240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	08 Apr 2024	0020 QC100 240408	Field D	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW109	AEC E	08 Apr 2024	0020 QC200 240408	Interlab D	ACT 0020 PFASOMP 24	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5	
0020	MW110	AEC E	01 May 2017	E MW05	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001	
0020	MW110	AEC E	11 Oct 2019	0020 MW110 191011	Normal	ACT 0020 Stage2	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW110	AEC E	15 Oct 2021	0020 MW110 211015	Normal	ACT 0020 PFASOMP 21	<0.05	0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW110	AEC E	04 Apr 2022	0020 MW110 220404	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW110	AEC E	04 Apr 2022	0020 QC102 220404	Field D	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW110	AEC E	04 Apr 2022	0020 QC202 220404	Interlab D	ACT 0020 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5	
0020	MW110	AEC E	11 Oct 2022	0020 MW110 221011	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW110	AEC E	11 Oct 2022	0020 QC104 221011	Field D	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW110	AEC E	31 Jan 2023	0020 MW110 230131	Normal	ACT 0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW110	AEC E	17 Apr 2023	0020 MW110 230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW110	AEC E	16 Oct 2023	0020 MW110 231016	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW110	AEC E	08 Apr 2024	0020 MW110 240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW111	AEC E	01 May 2017	F MW01	Normal	JBT 0021 PFAS	<0.001	0.144	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001	
0020	MW111	AEC E	18 Oct 2021	0020 MW111 211018	Normal	ACT 0020 PFASOMP 21	<0.05	0.31	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW111	AEC E	18 Oct 2021	0020 QC200 211018	Interlab D	ACT 0020 PFASOMP 21	<0.01	0.35	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5	
0020	MW111	AEC E	08 Apr 2022	0020 MW111 220408	Normal	ACT 0020 PFASOMP 21	<0.05	0.08	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW111	AEC E	10 Oct 2022	0020 MW111 221010	Normal	ACT 0020 PFASOMP 21	<0.05	0.08	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW111	AEC E	17 Apr 2023	0020 MW111 230417	Normal	ACT 0020 PFASOMP 23	<0.05	0.08	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW111	AEC E	08 Apr 2024	0020 MW111 240408	Normal	ACT 0020 PFASOMP 24	<0.05	0.21	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW112	AEC F	01 May 2017	F MW02	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001	
0020	MW112	AEC F	18 Oct 2021	0020 MW112 211018	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW112	AEC F	04 Apr 2022	0020 MW112 220404	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW112	AEC F	10 Oct 2022	0020 MW112 221010	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW112	AEC F	17 Apr 2023	0020 MW112 230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW112	AEC F	16 Oct 2023	0020 MW112 231016	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW112	AEC F	08 Apr 2024	0020 MW112 240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW115	AEC F	11 Aug 2020	0020 MW115 200811	Normal	ACT 0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW115	AEC F	19 Oct 2021	0020 MW115 211019	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW115	AEC F	04 Apr 2022	0020 MW115 220404	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW115	AEC F	10 Oct 2022	0020 MW115 221010	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05	
0020	MW115	AEC F	17 Apr 2023	0020 MW115 230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.	

[illegible]

Table T8 - Historical Groundwater Analytical Results

						PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
						4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
						µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR						0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)																
PFAS NEMP 2020 Freshwater 99%																
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)																
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID										
0020	MW115	AEC F	16 Oct 2023	0020 MW115_231016	Normal	ACT_0020 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	MW115	AEC F	08 Apr 2024	0020 MW115_240408	Normal	ACT_0020 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW022	JBRF	04 May 2017	MW022	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW022	JBRF	20 Oct 2021	0021 MW022_211020	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW022	JBRF	21 Dec 2021	0021 MW022_211221	Normal	ACT_0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW022	JBRF	07 Apr 2022	0021 MW022_220407	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW022	JBRF	07 Apr 2022	0021 QC110_220407	Field_D	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW022	JBRF	12 Oct 2022	0021 MW022_221012	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW022	JBRF	12 Oct 2022	0021 QC108_221012	Field_D	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW022	JBRF	12 Oct 2022	0021 QC208_221012	Interlab_D	ACT_0021 PFASOMP_21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW022	JBRF	17 Apr 2023	0021 MW022_230417	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW022	JBRF	16 Oct 2023	0021 MW022_231016	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW022	JBRF	08 Apr 2024	0021 MW022_240408	Normal	ACT_0021 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW022	JBRF	08 Apr 2024	0021 QC101_240408	Field_D	ACT_0021 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW022	JBRF	08 Apr 2024	0021 QC201_240408	Interlab_D	ACT_0021 PFASOMP_24	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW024	AEC A	04 May 2017	MW024	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW024	AEC A	20 Oct 2021	0021 MW024_211020	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW024	AEC A	06 Apr 2022	0021 MW024_220406	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW024	AEC A	12 Oct 2022	0021 MW024_221012	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW024	AEC A	17 Apr 2023	0021 MW024_230417	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW024	AEC A	16 Oct 2023	0021 MW024_231016	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW024	AEC A	08 Apr 2024	0021 MW024_240408	Normal	ACT_0021 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW025	AEC H	27 Apr 2017	JCQA09	Field_D	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW025	AEC H	27 Apr 2017	MW025	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW025	AEC H	14 Feb 2019	0021 MW025_190214	Normal	JBT_0021 PFAS	<0.001	0.003	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW025	AEC H	14 Feb 2019	0021 QC209_190214	Interlab_D	JBT_0021 PFAS	<0.001	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
0021	MW025	AEC H	29 May 2019	0021 MW025_190529	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW025	AEC H	20 Oct 2021	0021 MW025_211020	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW025	AEC H	06 Apr 2022	0021 MW025_220406	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW025	AEC H	14 Oct 2022	0021 MW025_221014	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW025	AEC H	21 Apr 2023	0021 MW025_230421	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW025	AEC H	19 Oct 2023	0021 MW025_231019	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW025	AEC H	12 Apr 2024	0021 MW025_240412	Normal	ACT_0021 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW026	AEC H	28 Apr 2017	MW026	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW026	AEC H	14 Feb 2019	0021 MW026_190214	Normal	JBT_0021 PFAS	<0.001	0.019	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW026	AEC H	14 Feb 2019	0021 QC110_190214	Field_D	JBT_0021 PFAS	<0.001	0.016	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW026	AEC H	29 May 2019	0021 MW026_190529	Normal	JBT_0021 PFAS	<0.001	0.004	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW026	AEC H	20 Oct 2021	0021 MW026_211020	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW026	AEC H	06 Apr 2022	0021 MW026_220406	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW026	AEC H	14 Oct 2022	0021 MW026_221014	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW026	AEC H	21 Apr 2023	0021 MW026_230421	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW026	AEC H	19 Oct 2023	0021 MW026_231019	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW026	AEC H	12 Apr 2024	0021 MW026_240412	Normal	ACT_0021 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW028	AEC C	03 May 2017	MW028	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW028	AEC C	20 Oct 2021	0021 MW028_211020	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW028	AEC C	20 Oct 2021	0021 QC103_211020	Field_D	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW028	AEC C	06 Apr 2022	0021 MW028_220406	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW028	AEC C	06 Apr 2022	0021 QC204_220406	Interlab_D	ACT_0021 PFASOMP_21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW028	AEC C	14 Oct 2022	0021 MW028_221014	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW028	AEC C	21 Apr 2023	0021 MW028_230421	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW028	AEC C	19 Oct 2023	0021 MW028_231019	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW028	AEC C	12 Apr 2024	0021 MW028_240412	Normal	ACT_0021 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW030	AEC C	03 May 2017	MW030	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW030	AEC C	21 Oct 2021	0021 MW030_211021	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02

Table T8 - Historical Groundwater Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56				0.07														
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																		
0021	MW030	AEC C	06 Apr 2022	0021 MW030 220406	Normal	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW030	AEC C	14 Oct 2022	0021 MW030 221014	Normal	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW030	AEC C	19 Apr 2023	0021 MW030 230419	Normal	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW030	AEC C	18 Oct 2023	0021 MW030 231018	Normal	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW030	AEC C	10 Apr 2024	0021 MW030 240410	Normal	ACT 0021 PFASOMP 24	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW061	AEC A	21 Jun 2021	0021 MW061 210621	Normal	ACT 0021 PFASMGMT	0.16	5.51	3.36	8.87	10.5	0.18	0.29	0.16	<0.02	<0.1	0.1	0.62	0.08	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW061	AEC A	23 Jun 2021	0021 QC211 210623	Interlab D	ACT 0021 PFASMGMT	0.19	4.7	3.6	8.3	10.03	0.18	0.23	0.15	<0.01	0.06	0.11	0.65	0.1	<0.01	<0.01	<0.01	<0.01	<0.01
0021	MW061	AEC A	11 Apr 2024	0021 MW061 240411	Normal	ACT 0021 PFASOMP 24	0.11	5.23	1.75	6.98	7.88	0.08	0.12	0.12	<0.02	<0.1	0.05	0.32	0.05	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW062	AEC A	21 Jun 2021	0021 MW062 210621	Normal	ACT 0021 PFASMGMT	3.26	456	36.2	492	517	1.9	2.59	3.21	0.06	0.8	1.44	9.48	2.08	0.04	<0.02	<0.02	<0.02	<0.05
0021	MW062	AEC A	21 Jun 2021	0021 QC113 210621	Field D	ACT 0021 PFASMGMT	3.22	435	37.4	472	499	1.83	2.7	3.46	0.05	0.8	1.42	10.7	2.2	0.04	<0.02	<0.02	<0.02	<0.05
0021	MW062	AEC A	11 Apr 2024	0021 MW062 240411	Normal	ACT 0021 PFASOMP 24	1.37	78.4	18.5	96.9	109	0.98	1.14	1.22	0.11	0.4	0.63	4.62	0.9	0.07	0.05	<0.02	<0.02	<0.05
0021	MW101	AEC A	28 Apr 2017	A MW01	Normal	JBT 0021 PFAS	0.0048	0.044	0.277	0.321	0.386	0.0116	0.0135	0.004	<0.0005	<0.002	0.0044	0.0241	0.0023	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW101	AEC A	09 Sep 2020	0021 MW101 200909	Normal	ACT 0021 PFASMGMT	0.003	0.208	0.156	0.364	0.412	0.0035	0.0073	0.0122	<0.0005	0.003	0.0029	0.0149	0.0011	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW101	AEC A	19 Oct 2021	0021 MW101 211019	Normal	ACT 0021 PFASOMP 21	<0.01	0.18	0.11	0.29	0.29	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW101	AEC A	05 Apr 2022	0021 MW101 220405	Normal	ACT 0021 PFASOMP 21	<0.01	0.22	0.12	0.34	0.34	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW101	AEC A	13 Oct 2022	0021 MW101 221013	Normal	ACT 0021 PFASOMP 21	<0.01	0.32	0.18	0.5	0.5	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW101	AEC A	13 Oct 2022	0021 QC109 221013	Field D	ACT 0021 PFASOMP 21	<0.01	0.39	0.23	0.62	0.62	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW101	AEC A	20 Apr 2023	0021 MW101 230420	Normal	ACT 0021 PFASOMP 23	<0.01	0.39	0.2	0.59	0.59	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW101	AEC A	19 Oct 2023	0021 MW101 231019	Normal	ACT 0021 PFASOMP 23	<0.01	0.09	0.08	0.17	0.17	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW101	AEC A	10 Apr 2024	0021 MW101 240410	Normal	ACT 0021 PFASOMP 24	<0.01	0.2	0.13	0.33	0.33	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW102	AEC A	01 May 2017	A MW02	Normal	JBT 0021 PFAS	0.844	0.243	6.06	6.3	12.1	1.27	1.36	0.796	<0.0005	<0.002	0.234	1.17	0.153	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW102	AEC A	19 Oct 2021	0021 MW102 211019	Normal	ACT 0021 PFASOMP 21	0.23	7.07	3.82	10.9	13.8	0.31	0.35	0.47	<0.02	0.1	0.18	1.13	0.12	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW102	AEC A	19 Oct 2021	0021 QC201 211019	Interlab D	ACT 0021 PFASOMP 21	0.26	8.8	3.9	13	16	0.33	0.37	0.58	<0.02	0.1	0.2	1	0.15	<0.01	<0.02	<0.02	<0.05	<0.5
0021	MW102	AEC A	05 Apr 2022	0021 MW102 220405	Normal	ACT 0021 PFASOMP 21	0.37	13.9	5.31	19.2	23.4	0.67	0.65	0.76	<0.02	0.1	0.16	1.34	0.13	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW102	AEC A	13 Oct 2022	0021 MW102 221013	Normal	ACT 0021 PFASOMP 21	0.16	8	2.29	10.3	11.8	0.17	0.2	0.27	<0.02	<0.1	0.1	0.54	0.06	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW102	AEC A	20 Apr 2023	0021 MW102 230420	Normal	ACT 0021 PFASOMP 23	0.45	10.3	5.98	16.3	20.8	0.49	0.63	0.62	<0.02	0.2	0.32	1.56	0.23	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW102	AEC A	20 Apr 2023	0021 QC109 230420	Field D	ACT 0021 PFASOMP 23	0.24	6.16	3.16	9.32	11.7	0.2	0.48	0.35	<0.02	0.2	0.2	0.51	0.18	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW102	AEC A	20 Apr 2023	0021 QC209 230420	Interlab D	ACT 0021 PFASOMP 23	0.3	6.8	4.6	11	15	0.31	0.41	0.46	<0.02	0.1	0.25	1.2	0.13	0.01	<0.02	<0.02	<0.05	<0.5
0021	MW102	AEC A	19 Oct 2023	0021 MW102 231019	Normal	ACT 0021 PFASOMP 23	0.32	10.2	3.17	13.4	16.2	0.29	0.26	0.4	<0.02	0.1	0.19	1.16	0.13	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW102	AEC A	10 Apr 2024	0021 MW102 240410	Normal	ACT 0021 PFASOMP 24	0.25	5.73	3.19	8.92	11.6	0.31	0.32	0.34	<0.02	0.1	0.16	0.91	0.14	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW103	AEC A	28 Apr 2017	A MW03	Normal	JBT 0021 PFAS	1.92	22.1	37.5	59.6	80.3	4.06	4.37	1.86	<0.02	<0.02	0.972	6.71	0.836	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW103	AEC A	02 May 2018	A MW03 180502	Normal	JBT 0021 PFAS	2.07	139	29.6	169	188	2.32	4.6	3.45	<0.02	0.5	0.84	5.27	0.75	0.03	<0.02	<0.02	<0.02	<0.05
0021	MW103	AEC A	22 Jun 2021	0021 MW103 210622	Normal	ACT 0021 PFASMGMT	0.1	13.9	2.55	16.4	17.7	0.15	0.2	0.2	<0.02	<0.1	0.08	0.47	0.05	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW103	AEC A	22 Jun 2021	0021 QC114 210622	Field D	ACT 0021 PFASMGMT	0.12	16	3.12	19.1	20.6	0.19	0.25	0.2	<0.02	<0.1	0.1	0.57	0.06	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW103	AEC A	19 Oct 2021	0021 MW103 211019	Normal	ACT 0021 PFASOMP 21	0.14	14.7	3.42	18.1	20	0.19	0.24	0.21	<0.02	0.1	0.15	0.79	0.07	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW103	AEC A	22 Nov 2021	0021 MW103 211122	Normal	ACT 0021 PFASMGMT	0.23	20	3.59	23.6	26.1	0.26	0.32	0.28	<0.02	0.1	0.16	1.05	0.09	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW103	AEC A	06 Apr 2022	0021 MW103 220406	Normal	ACT 0021 PFASOMP 21	0.18	20.7	3.76	24.5	26.8	0.36	0.38	0.26	<0.02	<0.1	0.13	0.96	0.07	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW103	AEC A	13 Oct 2022	0021 MW103 221013	Normal	ACT 0021 PFASOMP 21	0.14	26.9	2.55	29.4	30.8	0.15	0.23	0.19	<0.02	<0.1	0.1	0.52	0.06	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW103	AEC A	20 Apr 2023	0021 MW103 230420	Normal	ACT 0021 PFASOMP 23	0.24	48.4	4.21	52.6	55.1	0.24	0.35	0.42	0.03	0.1	0.18	0.83	0.09	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW103	AEC A	18 Oct 2023	0021 MW103 231018	Normal	ACT 0021 PFASOMP 23	0.15	41.6	2.07	43.7	45.2	0.15	0.15	0.29	<0.02	<0.1	0.1	0.6	0.05	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW103	AEC A	11 Apr 2024	0021 MW103 240411																				

Table T8 - Historical Groundwater Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
LOR	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	MW030	AEC C	06 Apr 2022	0021 MW030 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW030	AEC C	14 Oct 2022	0021 MW030 221014	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW030	AEC C	19 Apr 2023	0021 MW030 230419	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW030	AEC C	18 Oct 2023	0021 MW030 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW030	AEC C	10 Apr 2024	0021 MW030 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW061	AEC A	21 Jun 2021	0021 MW061 210621	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW061	AEC A	23 Jun 2021	0021 QC211 210623	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	MW061	AEC A	11 Apr 2024	0021 MW061 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW062	AEC A	21 Jun 2021	0021 MW062 210621	Normal	ACT 0021 PFASMGMT	<0.05	0.16	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW062	AEC A	21 Jun 2021	0021 QC113 210621	Field D	ACT 0021 PFASMGMT	<0.05	0.18	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW062	AEC A	11 Apr 2024	0021 MW062 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW101	AEC A	28 Apr 2017	A MW01	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW101	AEC A	09 Sep 2020	0021 MW101 200909	Normal	ACT 0021 PFASMGMT	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW101	AEC A	19 Oct 2021	0021 MW101 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW101	AEC A	05 Apr 2022	0021 MW101 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW101	AEC A	13 Oct 2022	0021 MW101 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW101	AEC A	13 Oct 2022	0021 QC109 221013	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW101	AEC A	20 Apr 2023	0021 MW101 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW101	AEC A	19 Oct 2023	0021 MW101 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW101	AEC A	10 Apr 2024	0021 MW101 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW102	AEC A	01 May 2017	A MW02	Normal	JBT 0021 PFAS	<0.001	0.003	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW102	AEC A	19 Oct 2021	0021 MW102 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW102	AEC A	19 Oct 2021	0021 QC201 211019	Interlab D	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	MW102	AEC A	05 Apr 2022	0021 MW102 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW102	AEC A	13 Oct 2022	0021 MW102 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW102	AEC A	20 Apr 2023	0021 MW102 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW102	AEC A	20 Apr 2023	0021 QC109 230420	Field D	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW102	AEC A	20 Apr 2023	0021 QC209 230420	Interlab D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	MW102	AEC A	19 Oct 2023	0021 MW102 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW102	AEC A	10 Apr 2024	0021 MW102 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW103	AEC A	28 Apr 2017	A MW03	Normal	JBT 0021 PFAS	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW103	AEC A	02 May 2018	A MW03 180502	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW103	AEC A	22 Jun 2021	0021 MW103 210622	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW103	AEC A	22 Jun 2021	0021 QC114 210622	Field D	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW103	AEC A	19 Oct 2021	0021 MW103 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW103	AEC A	22 Nov 2021	0021 MW103 211122	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW103	AEC A	06 Apr 2022	0021 MW103 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW103	AEC A	13 Oct 2022	0021 MW103 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW103	AEC A	20 Apr 2023	0021 MW103 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW103	AEC A	18 Oct 2023	0021 MW103 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW103	AEC A	11 Apr 2024	0021 MW103 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW104	AEC A	28 Apr 2017	A MW04	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW104	AEC A	22 Jun 2021	0021 MW104 210622	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW104	AEC A	19 Oct 2021	0021 MW104 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW104	AEC A	22 Nov 2021	0021 MW104 211122	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW104	AEC A	06 Apr 2022	0021 MW104 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW104	AEC A	13 Oct 2022	0021 MW104 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW104	AEC A	20 Apr 2023	0021 MW104 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW104	AEC A	18 Oct 2023	0021 MW104 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW104	AEC A	11 Apr 2024	0021 MW104 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW105	AEC A	28 Apr 2017	A MW05	Normal	JBT 0021 PFAS	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW105	AEC A	19 Oct 2021	0021 MW105 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW105	AEC A	19 Oct 2021	0021 QC200 211019	Interlab D	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	MW105	AEC A	06 Apr 2022	0021 MW105 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																												

Table T8 - Historical Groundwater Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	MW105	AEC A	13 Oct 2022	0021 MW105 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW105	AEC A	20 Apr 2023	0021 MW105 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW105	AEC A	19 Oct 2023	0021 MW105 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW105	AEC A	11 Apr 2024	0021 MW105 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW106	AEC A	27 Apr 2017	A MW06	Normal	JBT 0021 PFAS	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW106	AEC A	09 Sep 2020	0021 MW106 200909	Normal	ACT 0021 PFASMGMT	<0.002	0.021	<0.002	<0.002	0.004	<0.004	<0.0016	<0.004	<0.004	<0.0016	<0.004
0021	MW106	AEC A	09 Sep 2020	0021 QC123 200909	Field D	ACT 0021 PFASMGMT	<0.002	0.025	<0.002	<0.002	0.0054	<0.004	<0.0016	<0.004	<0.004	<0.0016	<0.004
0021	MW106	AEC A	19 Oct 2021	0021 MW106 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW106	AEC A	05 Apr 2022	0021 MW106 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW106	AEC A	05 Apr 2022	0021 QC104 220405	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW106	AEC A	13 Oct 2022	0021 MW106 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW106	AEC A	13 Oct 2022	0021 QC110 221013	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW106	AEC A	13 Oct 2022	0021 QC210 221013	Interlab D	ACT 0021 PFASOMP 21	<0.01	0.03	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	MW106	AEC A	20 Apr 2023	0021 MW106 230420	Normal	ACT 0021 PFASOMP 23	<0.05	0.08	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW106	AEC A	19 Oct 2023	0021 MW106 231019	Normal	ACT 0021 PFASOMP 23	<0.05	0.06	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW106	AEC A	10 Apr 2024	0021 MW106 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	08 May 2017	A MW07	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	0.0008	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW107	AEC A	22 Jun 2021	0021 MW107 210622	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	19 Oct 2021	0021 MW107 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	19 Oct 2021	0021 QC100 211019	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	22 Nov 2021	0021 MW107 211122	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	06 Apr 2022	0021 MW107 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	13 Oct 2022	0021 MW107 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	20 Apr 2023	0021 MW107 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	20 Apr 2023	0021 QC110 230420	Field D	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	20 Apr 2023	0021 QC210 230420	Interlab D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	MW107	AEC A	18 Oct 2023	0021 MW107 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	11 Apr 2024	0021 MW107 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	11 Apr 2024	0021 QC112 240411	Field D	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW107	AEC A	11 Apr 2024	0021 QC212 240411	Interlab D	ACT 0021 PFASOMP 24	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	MW108	AEC A	08 May 2017	A MW08	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW108	AEC A	19 Oct 2021	0021 MW108 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW108	AEC A	06 Apr 2022	0021 MW108 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW108	AEC A	13 Oct 2022	0021 MW108 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW108	AEC A	20 Apr 2023	0021 MW108 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW108	AEC A	18 Oct 2023	0021 MW108 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW108	AEC A	11 Apr 2024	0021 MW108 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW109	AEC A	08 May 2017	A MW09	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW109	AEC A	19 Oct 2021	0021 MW109 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW109	AEC A	06 Apr 2022	0021 MW109 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW109	AEC A	13 Oct 2022	0021 MW109 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW109	AEC A	13 Oct 2022	0021 QC209 221013	Interlab D	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	MW109	AEC A	20 Apr 2023	0021 MW109 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW109	AEC A	18 Oct 2023	0021 MW109 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW109	AEC A	10 Apr 2024	0021 MW109 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW110	AEC B	28 Apr 2017	B MW01	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW110	AEC B	22 Jun 2021	0021 MW110 210622	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW110	AEC B	20 Oct 2021	0021 MW110 211020	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW110	AEC B	22 Nov 2021	0021 MW110 211122	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW110	AEC B	07 Apr 2022	0021 MW110 220407	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW110	AEC B	13 Oct 2022	0021 MW110 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW110	AEC B	20 Apr 2023	0021 MW110 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW110	AEC B	18 Oct 2023	0021 MW110 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW110	AEC B	10 Apr 2024	0021 MW110 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																								

Table T8 - Historical Groundwater Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID										
0021	MW111	AEC B	28 Apr 2017	B_MW02	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW111	AEC B	22 Jun 2021	0021_MW111_210622	Normal	ACT_0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW111	AEC B	20 Oct 2021	0021_MW111_211020	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW111	AEC B	22 Nov 2021	0021_MW111_211122	Normal	ACT_0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW111	AEC B	07 Apr 2022	0021_MW111_220407	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW111	AEC B	13 Oct 2022	0021_MW111_221013	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW111	AEC B	20 Apr 2023	0021_MW111_230420	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW111	AEC B	18 Oct 2023	0021_MW111_231018	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW111	AEC B	10 Apr 2024	0021_MW111_240410	Normal	ACT_0021 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW112	JBRF	28 Apr 2017	B_MW03	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW112	JBRF	24 Jun 2021	0021_MW112_210624	Normal	ACT_0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW112	JBRF	20 Oct 2021	0021_MW112_211020	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW112	JBRF	23 Nov 2021	0021_MW112_211123	Normal	ACT_0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW112	JBRF	07 Apr 2022	0021_MW112_220407	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW112	JBRF	07 Apr 2022	0021_QC210_220407	Interlab_D	ACT_0021 PFASOMP_21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.5
0021	MW112	JBRF	12 Oct 2022	0021_MW112_221012	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW112	JBRF	18 Apr 2023	0021_MW112_230418	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW112	JBRF	16 Oct 2023	0021_MW112_231016	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW112	JBRF	08 Apr 2024	0021_MW112_240408	Normal	ACT_0021 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW113	AEC B	28 Apr 2017	B_MW04	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW113	AEC B	02 May 2018	B_MW04_180502	Normal	JBT_0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW113	AEC B	23 Jun 2021	0021_MW113_210623	Normal	ACT_0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW113	AEC B	20 Oct 2021	0021_MW113_211020	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW113	AEC B	23 Nov 2021	0021_MW113_211123	Normal	ACT_0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW113	AEC B	07 Apr 2022	0021_MW113_220407	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW113	AEC B	13 Oct 2022	0021_MW113_221013	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW113	AEC B	19 Apr 2023	0021_MW113_230419	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW113	AEC B	18 Oct 2023	0021_MW113_231018	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW113	AEC B	10 Apr 2024	0021_MW113_240410	Normal	ACT_0021 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW114	Lakes	12 Apr 2018	BB_MW01_180412	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW114	Lakes	15 May 2018	BB_MW01_180515	Normal	JBT_0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW114	Lakes	12 Feb 2019	BB_MW01_190212	Normal	JBT_0021 PFAS	<0.001	0.01	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW114	Lakes	29 May 2019	BB_MW01_190529	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW114	Lakes	22 Oct 2021	0021_MW114_211022	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW114	Lakes	06 Apr 2022	0021_MW114_220406	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW114	Lakes	06 Apr 2022	0021_QC107_220406	Field_D	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW114	Lakes	10 Oct 2022	0021_MW114_221010	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW114	Lakes	18 Apr 2023	0021_MW114_230418	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW114	Lakes	17 Oct 2023	0021_MW114_231017	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW114	Lakes	09 Apr 2024	0021_MW114_240409	Normal	ACT_0021 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW115	Lakes	12 Apr 2018	BB_MW02_180412	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW115	Lakes	16 May 2018	BB_MW02_180516	Normal	JBT_0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW115	Lakes	16 May 2018	BB_QC116_180516	Field_D	JBT_0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW115	Lakes	16 May 2018	BB_QC217_180516	Interlab_D	JBT_0021 PFAS	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	MW115	Lakes	12 Feb 2019	BB_MW02_190212	Normal	JBT_0021 PFAS	<0.001	0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW115	Lakes	30 May 2019	0021_QC101_190530	Field_D	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW115	Lakes	30 May 2019	BB_MW02_190530	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW115	Lakes	22 Oct 2021	0021_MW115_211022	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW115	Lakes	17 Oct 2023	0021_MW115_231017	Normal	ACT_0021 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW115	Lakes	11 Apr 2024	0021_MW115_240411	Normal	ACT_0021 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW117	AEC C	03 May 2017	C_MW01	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW117	AEC C	20 Oct 2021	0021_MW117_211020	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05
0021	MW117	AEC C	20 Oct 2021	0021_QC203_211020	Interlab_D	ACT_0021 PFASOMP_21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.5
0021	MW117	AEC C	14 Oct 2022	0021_MW117_221014	Normal	ACT_0021 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.05

Table T8 - Historical Groundwater Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56				0.07														
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																		
0021	MW117	AEC C	21 Apr 2023	0021 MW117 230421	Normal	ACT 0021 PFASOMP 23	<0.01	0.1	0.28	0.38	0.44	0.02	0.04	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW117	AEC C	19 Oct 2023	0021 MW117 231019	Normal	ACT 0021 PFASOMP 23	<0.01	0.14	0.26	0.4	0.46	<0.02	0.02	<0.02	<0.02	<0.1	<0.02	0.04	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW117	AEC C	12 Apr 2024	0021 MW117 240412	Normal	ACT 0021 PFASOMP 24	<0.01	0.06	0.17	0.23	0.23	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW118	AEC C	03 May 2017	C MW02	Normal	JBT 0021 PFAS	0.0009	0.0139	0.0306	0.0445	0.0589	0.004	0.0058	<0.0005	<0.0005	<0.002	<0.0005	0.0037	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW118	AEC C	26 Oct 2021	0021 MW118 211026	Normal	ACT 0021 PFASOMP 21	0.02	0.87	1.35	2.22	2.58	0.06	0.13	0.03	<0.02	<0.1	0.02	0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW118	AEC C	11 Oct 2022	0021 MW118 221011	Normal	ACT 0021 PFASOMP 21	0.01	0.8	1.14	1.94	2.16	0.05	0.09	<0.02	<0.02	<0.1	<0.02	0.07	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW118	AEC C	03 Feb 2023	0021 MW118 230203	Normal	ACT 0021 PFASMGMT	0.02	0.94	1.05	1.99	2.19	0.03	0.07	0.02	<0.02	<0.1	<0.02	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW118	AEC C	21 Apr 2023	0021 MW118 230421	Normal	ACT 0021 PFASOMP 23	0.03	1.43	1.8	3.23	3.56	0.05	0.13	0.04	<0.02	<0.1	<0.02	0.08	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW118	AEC C	19 Oct 2023	0021 MW118 231019	Normal	ACT 0021 PFASOMP 23	0.01	0.82	0.5	1.32	1.4	<0.02	0.04	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW118	AEC C	12 Apr 2024	0021 MW118 240412	Normal	ACT 0021 PFASOMP 24	<0.01	0.26	0.45	0.71	0.73	<0.02	0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW119	AEC C	03 May 2017	C MW03	Normal	JBT 0021 PFAS	<0.0005	<0.0003	0.0006	0.0006	0.0006	<0.0005	<0.0005	<0.0005	<0.0005	<0.002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW119	AEC C	20 Oct 2021	0021 MW119 211020	Normal	ACT 0021 PFASOMP 21	<0.01	0.02	<0.01	0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW119	AEC C	20 Oct 2021	0021 QC202 211020	Interlab D	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.01	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1
0021	MW119	AEC C	06 Apr 2022	0021 MW119 220406	Normal	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW119	AEC C	11 Oct 2022	0021 MW119 221011	Normal	ACT 0021 PFASOMP 21	<0.01	0.01	<0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW119	AEC C	03 Feb 2023	0021 MW119 230203	Normal	ACT 0021 PFASMGMT	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW119	AEC C	21 Apr 2023	0021 MW119 230421	Normal	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW119	AEC C	19 Oct 2023	0021 MW119 231019	Normal	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW119	AEC C	12 Apr 2024	0021 MW119 240412	Normal	ACT 0021 PFASOMP 24	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW120	AEC C	03 May 2017	C MW04	Normal	JBT 0021 PFAS	0.0027	0.0092	0.221	0.23	0.416	0.0591	0.0706	0.0026	<0.0005	<0.002	0.0075	0.0402	0.0032	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW120	AEC C	20 Oct 2021	0021 MW120 211020	Normal	ACT 0021 PFASOMP 21	0.01	0.48	0.61	1.09	1.34	0.06	0.06	<0.02	<0.02	<0.1	0.02	0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW120	AEC C	20 Oct 2021	0021 QC102 211020	Field D	ACT 0021 PFASOMP 21	0.01	0.46	0.64	1.1	1.34	0.05	0.06	<0.02	<0.02	<0.1	0.02	0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW120	AEC C	14 Oct 2022	0021 MW120 221014	Normal	ACT 0021 PFASOMP 21	<0.01	0.22	0.24	0.46	0.56	0.03	0.04	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW120	AEC C	21 Apr 2023	0021 MW120 230421	Normal	ACT 0021 PFASOMP 23	0.03	0.91	2.02	2.93	3.95	0.14	0.3	0.04	<0.02	<0.1	0.06	0.41	0.04	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW120	AEC C	19 Oct 2023	0021 MW120 231019	Normal	ACT 0021 PFASOMP 23	0.07	1.66	2.77	4.43	5.4	0.14	0.22	0.09	<0.02	<0.1	0.07	0.34	0.04	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW120	AEC C	12 Apr 2024	0021 MW120 240412	Normal	ACT 0021 PFASOMP 24	0.02	0.43	0.89	1.32	1.92	0.14	0.16	<0.02	<0.02	<0.1	0.05	0.18	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW121	AEC C	03 May 2017	C MW05	Normal	JBT 0021 PFAS	0.0015	0.0102	0.118	0.128	0.17	0.0142	0.0157	0.0019	<0.0005	<0.002	0.002	0.006	0.0006	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW121	AEC C	22 Oct 2021	0021 MW121 211022	Normal	ACT 0021 PFASOMP 21	<0.01	0.02	0.02	0.04	0.04	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW121	AEC C	14 Oct 2022	0021 MW121 221014	Normal	ACT 0021 PFASOMP 21	<0.01	0.04	0.3	0.34	0.39	<0.02	0.02	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW121	AEC C	31 Jan 2023	0021 QC202 230201	Interlab D	ACT 0021 PFASMGMT	<0.01	0.06	0.25	0.31	0.4	0.02	0.02	<0.01	<0.01	<0.05	0.01	0.04	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
0021	MW121	AEC C	01 Feb 2023	0021 MW121 230201	Normal	ACT 0021 PFASMGMT	<0.01	0.06	0.28	0.34	0.4	<0.02	0.02	<0.02	<0.02	<0.1	<0.02	0.04	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW121	AEC C	20 Apr 2023	0021 MW121 230420	Normal	ACT 0021 PFASOMP 23	<0.01	0.05	0.14	0.19	0.19	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW121	AEC C	18 Oct 2023	0021 MW121 231018	Normal	ACT 0021 PFASOMP 23	<0.01	0.02	0.1	0.12	0.12	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW121	AEC C	18 Oct 2023	0021 QC112 231018	Field D	ACT 0021 PFASOMP 23	<0.01	0.02	0.09	0.11	0.11	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW121	AEC C	18 Oct 2023	0021 QC212 231018	Interlab D	ACT 0021 PFASOMP 23	<0.01	0.03	0.05	0.08	0.19	<0.01	<0.01	<0.01	<0.02	<0.02	0.07	0.04	0.01	<0.01	<0.02	<0.02	<0.05	<0.1
0021	MW121	AEC C	10 Apr 2024	0021 MW121 240410	Normal	ACT 0021 PFASOMP 24	<0.01	0.02	0.02	0.04	0.04	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW121	AEC C	10 Apr 2024	0021 QC111 240410	Field D	ACT 0021 PFASOMP 24	<0.01	0.03	0.03	0.06	0.06	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW121	AEC C	10 Apr 2024	0021 QC211 240410	Interlab D	ACT 0021 PFASOMP 24	<0.01	0.02	0.02	0.05	0.05	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.01	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1
0021	MW123	AEC C	08 May 2017	C MW07	Normal	JBT 0021 PFAS	0.0697	0.227	2.8	3.03	4.62	0.322	0.486	0.0724	<0.0005	<0.002	0.0805	0.524	0.0395	<0.0005	<0.0005			

Table T8 - Historical Groundwater Analytical Results

						PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
						4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
						µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR						0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)																
PFAS NEMP 2020 Freshwater 99%																
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)																
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID										
0021	MW117	AEC C	21 Apr 2023	0021 MW117 230421	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW117	AEC C	19 Oct 2023	0021 MW117 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW117	AEC C	12 Apr 2024	0021 MW117 240412	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW118	AEC C	03 May 2017	C MW02	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW118	AEC C	26 Oct 2021	0021 MW118 211026	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW118	AEC C	11 Oct 2022	0021 MW118 221011	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW118	AEC C	03 Feb 2023	0021 MW118 230203	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW118	AEC C	21 Apr 2023	0021 MW118 230421	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW118	AEC C	19 Oct 2023	0021 MW118 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW118	AEC C	12 Apr 2024	0021 MW118 240412	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW119	AEC C	03 May 2017	C MW03	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW119	AEC C	20 Oct 2021	0021 MW119 211020	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW119	AEC C	20 Oct 2021	0021 QC202 211020	Interlab D	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW119	AEC C	06 Apr 2022	0021 MW119 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW119	AEC C	11 Oct 2022	0021 MW119 221011	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW119	AEC C	03 Feb 2023	0021 MW119 230203	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW119	AEC C	21 Apr 2023	0021 MW119 230421	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW119	AEC C	19 Oct 2023	0021 MW119 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW119	AEC C	12 Apr 2024	0021 MW119 240412	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW120	AEC C	03 May 2017	C MW04	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW120	AEC C	20 Oct 2021	0021 MW120 211020	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW120	AEC C	20 Oct 2021	0021 QC102 211020	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW120	AEC C	14 Oct 2022	0021 MW120 221014	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW120	AEC C	21 Apr 2023	0021 MW120 230421	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW120	AEC C	19 Oct 2023	0021 MW120 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW120	AEC C	12 Apr 2024	0021 MW120 240412	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW121	AEC C	03 May 2017	C MW05	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW121	AEC C	22 Oct 2021	0021 MW121 211022	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW121	AEC C	14 Oct 2022	0021 MW121 221014	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW121	AEC C	31 Jan 2023	0021 QC202 230201	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	MW121	AEC C	01 Feb 2023	0021 MW121 230201	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW121	AEC C	20 Apr 2023	0021 MW121 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW121	AEC C	18 Oct 2023	0021 MW121 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW121	AEC C	18 Oct 2023	0021 QC112 231018	Field D	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW121	AEC C	18 Oct 2023	0021 QC212 231018	Interlab D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW121	AEC C	10 Apr 2024	0021 MW121 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW121	AEC C	10 Apr 2024	0021 QC111 240410	Field D	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW121	AEC C	10 Apr 2024	0021 QC211 240410	Interlab D	ACT 0021 PFASOMP 24	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW123	AEC C	08 May 2017	C MW07	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW123	AEC C	26 Oct 2021	0021 MW123 211026	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW123	AEC C	06 Apr 2022	0021 MW123 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW123	AEC C	14 Oct 2022	0021 MW123 221014	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW123	AEC C	21 Apr 2023	0021 MW123 230421	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW123	AEC C	19 Oct 2023	0021 MW123 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW123	AEC C	12 Apr 2024	0021 MW123 240412	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW124	AEC C	04 May 2017	CL MW01	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW124	AEC C	03 May 2018	CL MW01 180503	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW124	AEC C	03 May 2018	CL QC114 180503	Field D	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW124	AEC C	20 Oct 2021	0021 MW124 211020	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW124	AEC C	06 Apr 2022	0021 MW124 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW124	AEC C	11 Oct 2022	0021 MW124 221011	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW124	AEC C	01 Feb 2023	0021 MW124 230201	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW124	AEC C	17 Apr 2023	0021 MW124 230417	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW124	AEC C	16 Oct 2023	0021 MW124 231016	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02

[illegible]

Table T8 - Historical Groundwater Analytical Results

						PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
						4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
						µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR						0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)																
PFAS NEMP 2020 Freshwater 99%																
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)																
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID										
0021	MW124	AEC C	10 Apr 2024	0021 MW124 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW125	JBRF	04 May 2017	FC MW01	Normal	JBT 0021 PFAS	<0.001	0.003	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW125	JBRF	03 May 2018	FC MW01 180503	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW125	JBRF	14 Feb 2019	FC MW01 190214	Normal	JBT 0021 PFAS	<0.001	0.002	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW125	JBRF	29 May 2019	FC MW01 190529	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW125	JBRF	20 Oct 2021	0021 MW125 211020	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW125	JBRF	20 Oct 2021	0021 QC207 211020	Interlab D	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW125	JBRF	07 Apr 2022	0021 MW125 220407	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW125	JBRF	14 Oct 2022	0021 MW125 221014	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW125	JBRF	31 Jan 2023	0021 QC203 230202	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	MW125	JBRF	02 Feb 2023	0021 MW125 230202	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW125	JBRF	19 Apr 2023	0021 MW125 230419	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW125	JBRF	19 Apr 2023	0021 QC104 230419	Field D	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW125	JBRF	19 Apr 2023	0021 QC204 230419	Interlab D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW125	JBRF	18 Oct 2023	0021 MW125 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW125	JBRF	10 Apr 2024	0021 MW125 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW126	JBRF	04 May 2017	FC MW02	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW126	JBRF	20 Oct 2021	0021 MW126 211020	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW126	JBRF	20 Oct 2021	0021 QC108 211020	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW126	JBRF	07 Apr 2022	0021 MW126 220407	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW126	JBRF	07 Apr 2022	0021 QC209 220407	Interlab D	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW126	JBRF	13 Oct 2022	0021 MW126 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW126	JBRF	02 Feb 2023	0021 MW126 230202	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW126	JBRF	19 Apr 2023	0021 MW126 230419	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW126	JBRF	18 Oct 2023	0021 MW126 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW126	JBRF	18 Oct 2023	0021 QC105 231018	Field D	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW126	JBRF	18 Oct 2023	0021 QC205 231018	Interlab D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW126	JBRF	10 Apr 2024	0021 MW126 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	04 May 2017	LM MW01	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW128	Lakes	03 May 2018	LM MW01 180503	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	14 Feb 2019	LM MW01 190214	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW128	Lakes	29 May 2019	0021 QC100 190529	Field D	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW128	Lakes	29 May 2019	LM MW01 190529	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW128	Lakes	20 Oct 2021	0021 MW128 211020	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	20 Oct 2021	0021 QC107 211020	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	21 Dec 2021	0021 MW128 211221	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	21 Dec 2021	0021 QC112 211221	Field D	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	21 Dec 2021	0021 QC212 211221	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	MW128	Lakes	06 Apr 2022	0021 MW128 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	14 Oct 2022	0021 MW128 221014	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	01 Feb 2023	0021 MW128 230201	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	19 Apr 2023	0021 MW128 230419	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	18 Oct 2023	0021 MW128 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	10 Apr 2024	0021 MW128 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	10 Apr 2024	0021 QC104 240410	Field D	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW128	Lakes	10 Apr 2024	0021 QC204 240410	Interlab D	ACT 0021 PFASOMP 24	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW129	Lakes	13 Apr 2018	LM MW02 180413	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW129	Lakes	13 Apr 2018	LM MW02 PRE 180413	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW129	Lakes	03 May 2018	LM MW02 180503	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0021	MW129	Lakes	13 Feb 2019	LM MW02 190213	Normal	JBT 0021 PFAS	<0.001	0.003	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW129	Lakes	31 May 2019	LM MW02 190531	Normal	JBT 0021 PFAS	<0.001	0.029	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW129	Lakes	22 Oct 2021	0021 MW129 211022	Normal	ACT 0021 PFASOMP 21	<0.001	0.005	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW129	Lakes	06 Apr 2022	0021 MW129 220406	Normal	ACT 0021 PFASOMP 21	<0.001	0.002	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005
0021	MW129	Lakes	10 Oct 2022	0021 MW129 221010	Normal	ACT 0021 PFASOMP 21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005

[illegible]

Table T8 - Historical Groundwater Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
LOR	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID										
0021	MW129	Lakes	18 Apr 2023	0021 MW129 230418	Normal	ACT 0021 PFASOMP 23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW129	Lakes	17 Oct 2023	0021 MW129 231017	Normal	ACT 0021 PFASOMP 23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW129	Lakes	09 Apr 2024	0021 MW129 240409	Normal	ACT 0021 PFASOMP 24	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW130	Lakes	12 Apr 2018	LW MW01 180412	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW130	Lakes	15 May 2018	LW MW01 180515	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW130	Lakes	13 Feb 2019	LW MW01 190213	Normal	JBT 0021 PFAS	<0.001	0.002	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW130	Lakes	30 May 2019	LW MW01 190530	Normal	JBT 0021 PFAS	<0.001	0.004	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW130	Lakes	21 Oct 2021	0021 MW130 211021	Normal	ACT 0021 PFASOMP 21	<0.05	0.07	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW130	Lakes	06 Apr 2022	0021 MW130 220406	Normal	ACT 0021 PFASOMP 21	<0.001	0.002	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW130	Lakes	06 Apr 2022	0021 QC105 220406	Field D	ACT 0021 PFASOMP 21	<0.001	0.002	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW130	Lakes	10 Oct 2022	0021 MW130 221010	Normal	ACT 0021 PFASOMP 21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW130	Lakes	18 Apr 2023	0021 MW130 230418	Normal	ACT 0021 PFASOMP 23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW130	Lakes	17 Oct 2023	0021 MW130 231017	Normal	ACT 0021 PFASOMP 23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW130	Lakes	09 Apr 2024	0021 MW130 240409	Normal	ACT 0021 PFASOMP 24	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW131	Mary Creek	11 Apr 2018	MC MW02 180411	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW131	Mary Creek	02 May 2018	MC MW02 180502	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.05	<0.12	<0.05	<0.12	<0.12	<0.05
0021	MW131	Mary Creek	18 Oct 2023	0021 MW131 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW131	Mary Creek	09 Apr 2024	0021 MW131 240409	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW132	Mary Creek	11 Apr 2018	MC MW03 180411	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW132	Mary Creek	12 Oct 2022	0021 MW132 221012	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW132	Mary Creek	12 Oct 2022	0021 QC203 221012	Interlab D	ACT 0021 PFASOMP 21	<0.01	0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW132	Mary Creek	18 Apr 2023	0021 MW132 230418	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW132	Mary Creek	17 Oct 2023	0021 MW132 231017	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW132	Mary Creek	17 Oct 2023	0021 QC104 231017	Field D	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW132	Mary Creek	17 Oct 2023	0021 QC204 231017	Interlab D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02
0021	MW132	Mary Creek	09 Apr 2024	0021 MW132 240409	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW133	Mary Creek	11 Apr 2018	MC MW04 180411	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW133	Mary Creek	02 May 2018	MC MW04 180502	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW133	Mary Creek	11 Oct 2022	0021 MW133 221012	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW133	Mary Creek	12 Oct 2022	0021 QC103 221012	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW133	Mary Creek	18 Apr 2023	0021 MW133 230418	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW133	Mary Creek	17 Oct 2023	0021 MW133 231017	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW133	Mary Creek	09 Apr 2024	0021 MW133 240409	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05
0021	MW135	Lakes	30 May 2019	LM MW03A 190530	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW135	Lakes	21 Oct 2021	0021 MW135 211021	Normal	ACT 0021 PFASOMP 21	<0.001	0.014	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW135	Lakes	21 Oct 2021	0021 QC112 211021	Field D	ACT 0021 PFASOMP 21	<0.001	0.014	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW135	Lakes	06 Apr 2022	0021 MW135 220406	Normal	ACT 0021 PFASOMP 21	<0.001	0.005	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW135	Lakes	10 Oct 2022	0021 MW135 221010	Normal	ACT 0021 PFASOMP 21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW135	Lakes	18 Apr 2023	0021 MW135 230418	Normal	ACT 0021 PFASOMP 23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW135	Lakes	17 Oct 2023	0021 MW135 231017	Normal	ACT 0021 PFASOMP 23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW135	Lakes	17 Oct 2023	0021 QC103 231017	Field D	ACT 0021 PFASOMP 23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW135	Lakes	17 Oct 2023	0021 QC203 231017	Interlab D	ACT 0021 PFASOMP 23	<0.001	0.0005	<0.0004	<0.002	<0.01	<0.05	<0.002	<0.05	<0.1	<0.002
0021	MW135	Lakes	09 Apr 2024	0021 MW135 240409	Normal	ACT 0021 PFASOMP 24	<0.001	<0.001	<0.001	<0.001	0.0009	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW136	Lakes	30 May 2019	LM MW03B 190530	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW136	Lakes	21 Oct 2021	0021 MW136 211021	Normal	ACT 0021 PFASOMP 21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW136	Lakes	06 Apr 2022	0021 MW136 220406	Normal	ACT 0021 PFASOMP 21	<0.001	0.012	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW136	Lakes	10 Oct 2022	0021 MW136 221010	Normal	ACT 0021 PFASOMP 21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW136	Lakes	10 Oct 2022	0021 QC100 221010	Field D	ACT 0021 PFASOMP 21	<0.001	0.01	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW136	Lakes	18 Apr 2023	0021 MW136 230418	Normal	ACT 0021 PFASOMP 23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW136	Lakes	17 Oct 2023	0021 MW136 231017	Normal	ACT 0021 PFASOMP 23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW136	Lakes	09 Apr 2024	0021 MW136 240409	Normal	ACT 0021 PFASOMP 24	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW137	Lakes	30 May 2019	0021 QC201 190530	Interlab D	JBT 0021 PFAS	<0.001	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
0021	MW137	Lakes	30 May 2019	LM MW03C 190530	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0021	MW137	Lakes	21 Oct 2021	0021 MW137 211021	Normal	ACT 0021 PFASOMP 21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001

Table T8 - Historical Groundwater Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56				0.07														
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																			
0021	MW137	Lakes	21 Oct 2021	0021_QC212_211021	Interlab_D	ACT_0021_PFASOMP_21	<0.0002	0.0003	<0.0002	0.0003	0.0003	<0.0004	<0.001	<0.001	<0.002	<0.02	<0.002	<0.0004	<0.0004	<0.001	<0.002	<0.002	<0.005	<0.01	<0.05
0021	MW137	Lakes	06 Apr 2022	0021_MW137_220406	Normal	ACT_0021_PFASOMP_21	<0.0005	0.0002	<0.0005	0.0002	0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW137	Lakes	10 Oct 2022	0021_MW137_221010	Normal	ACT_0021_PFASOMP_21	<0.0005	0.0013	0.0008	0.0021	0.0021	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW137	Lakes	18 Apr 2023	0021_MW137_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0002	<0.0005	<0.0002	0.0012	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW137	Lakes	17 Oct 2023	0021_MW137_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW137	Lakes	09 Apr 2024	0021_MW137_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW138	Lakes	30 May 2019	LW_MW02A_190530	Normal	JBT_0021_PFAS	<0.0005	<0.0003	<0.0005	<0.0003	<0.0003	<0.0005	<0.0005	<0.0005	<0.0005	<0.002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW138	Lakes	21 Oct 2021	0021_MW138_211021	Normal	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW138	Lakes	05 Apr 2022	0021_MW138_220405	Normal	ACT_0021_PFASOMP_21	<0.0005	0.0006	<0.0005	0.0006	0.0222	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	0.0006	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW138	Lakes	05 Apr 2022	0021_QC200_220405	Interlab_D	ACT_0021_PFASOMP_21	<0.0002	0.0007	<0.0002	0.0007	0.039	<0.0004	<0.001	<0.001	<0.002	<0.002	<0.002	<0.0004	0.001	<0.001	<0.002	<0.002	<0.005	<0.01	<0.05
0021	MW138	Lakes	10 Oct 2022	0021_MW138_221010	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0002	<0.0005	<0.0002	0.011	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW138	Lakes	10 Oct 2022	0021_QC200_221010	Interlab_D	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.01	<0.01	0.03	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.01	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1	<0.5
0021	MW138	Lakes	18 Apr 2023	0021_MW138_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0002	<0.0005	<0.0002	0.014	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW138	Lakes	17 Oct 2023	0021_MW138_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0002	<0.0005	<0.0002	0.0127	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	0.0007	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW138	Lakes	09 Apr 2024	0021_MW138_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0002	<0.0005	<0.0002	0.0115	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	0.0009	0.0006	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	30 May 2019	LW_MW02B_190530	Normal	JBT_0021_PFAS	<0.0005	<0.0003	<0.0005	<0.0003	<0.0003	<0.0005	<0.0005	<0.0005	<0.0005	<0.002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	21 Oct 2021	0021_MW139_211021	Normal	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW139	Lakes	05 Apr 2022	0021_MW139_220405	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	05 Apr 2022	0021_QC100_220405	Field_D	ACT_0021_PFASOMP_21	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	10 Oct 2022	0021_MW139_221010	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	18 Apr 2023	0021_MW139_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	18 Apr 2023	0021_QC100_230418	Field_D	ACT_0021_PFASOMP_23	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	18 Apr 2023	0021_QC200_230418	Interlab_D	ACT_0021_PFASOMP_23	<0.0002	0.0003	<0.0002	0.0002	0.0002	<0.0004	<0.001	<0.001	<0.002	<0.002	<0.002	<0.0004	<0.0004	<0.001	<0.002	<0.002	<0.005	<0.01	<0.05
0021	MW139	Lakes	17 Oct 2023	0021_MW139_231017	Normal	ACT_0021_PFASOMP_23	0.0008	0.0009	<0.0005	0.0009	0.0028	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	0.0011	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	09 Apr 2024	0021_MW139_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	09 Apr 2024	0021_QC100_240409	Field_D	ACT_0021_PFASOMP_24	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW139	Lakes	09 Apr 2024	0021_QC200_240409	Interlab_D	ACT_0021_PFASOMP_24	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0004	<0.001	<0.001	<0.002	<0.002	<0.002	<0.0004	<0.0004	<0.001	<0.002	<0.002	<0.005	<0.01	<0.05
0021	MW140	Lakes	30 May 2019	LW_MW02C_190530	Normal	JBT_0021_PFAS	<0.0005	<0.0003	<0.0005	<0.0003	<0.0003	<0.0005	<0.0005	<0.0005	<0.0005	<0.002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW140	Lakes	21 Oct 2021	0021_MW140_211021	Normal	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	MW140	Lakes	05 Apr 2022	0021_MW140_220405	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW140	Lakes	10 Oct 2022	0021_MW140_221010	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW140	Lakes	18 Apr 2023	0021_MW140_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW140	Lakes	17 Oct 2023	0021_MW140_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	MW140	Lakes	09 Apr 2024	0021_MW140_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0002	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0020	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005

Table T8 - Historical Groundwater Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	MW137	Lakes	21 Oct 2021	0021_QC212_211021	Interlab_D	ACT_0021_PFASOMP_21	<0.001	<0.0004	<0.0004	<0.002	<0.01	<0.005	<0.002	<0.005	<0.01	<0.002	<0.05
0021	MW137	Lakes	06 Apr 2022	0021_MW137_220406	Normal	ACT_0021_PFASOMP_21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW137	Lakes	10 Oct 2022	0021_MW137_221010	Normal	ACT_0021_PFASOMP_21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW137	Lakes	18 Apr 2023	0021_MW137_230418	Normal	ACT_0021_PFASOMP_23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	0.0012	<0.001
0021	MW137	Lakes	17 Oct 2023	0021_MW137_231017	Normal	ACT_0021_PFASOMP_23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW137	Lakes	09 Apr 2024	0021_MW137_240409	Normal	ACT_0021_PFASOMP_24	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW138	Lakes	30 May 2019	LW_MW02A_190530	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW138	Lakes	21 Oct 2021	0021_MW138_211021	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW138	Lakes	05 Apr 2022	0021_MW138_220405	Normal	ACT_0021_PFASOMP_21	<0.001	0.021	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW138	Lakes	05 Apr 2022	0021_QC200_220405	Interlab_D	ACT_0021_PFASOMP_21	<0.001	0.037	<0.0004	<0.002	<0.01	<0.005	<0.002	<0.005	<0.01	<0.002	<0.05
0021	MW138	Lakes	10 Oct 2022	0021_MW138_221010	Normal	ACT_0021_PFASOMP_21	<0.001	0.011	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW138	Lakes	10 Oct 2022	0021_QC200_221010	Interlab_D	ACT_0021_PFASOMP_21	<0.01	0.03	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	MW138	Lakes	18 Apr 2023	0021_MW138_230418	Normal	ACT_0021_PFASOMP_23	<0.001	0.014	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW138	Lakes	17 Oct 2023	0021_MW138_231017	Normal	ACT_0021_PFASOMP_23	<0.001	0.012	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW138	Lakes	09 Apr 2024	0021_MW138_240409	Normal	ACT_0021_PFASOMP_24	<0.001	0.01	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	30 May 2019	LW_MW02B_190530	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	21 Oct 2021	0021_MW139_211021	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW139	Lakes	05 Apr 2022	0021_MW139_220405	Normal	ACT_0021_PFASOMP_21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	05 Apr 2022	0021_QC100_220405	Field_D	ACT_0021_PFASOMP_21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	10 Oct 2022	0021_MW139_221010	Normal	ACT_0021_PFASOMP_21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	18 Apr 2023	0021_MW139_230418	Normal	ACT_0021_PFASOMP_23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	18 Apr 2023	0021_QC100_230418	Field_D	ACT_0021_PFASOMP_23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	18 Apr 2023	0021_QC200_230418	Interlab_D	ACT_0021_PFASOMP_23	<0.001	<0.0004	<0.0004	<0.002	<0.01	<0.05	<0.002	<0.05	<0.1	<0.002	<0.5
0021	MW139	Lakes	17 Oct 2023	0021_MW139_231017	Normal	ACT_0021_PFASOMP_23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	09 Apr 2024	0021_MW139_240409	Normal	ACT_0021_PFASOMP_24	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	09 Apr 2024	0021_QC100_240409	Field_D	ACT_0021_PFASOMP_24	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW139	Lakes	09 Apr 2024	0021_QC200_240409	Interlab_D	ACT_0021_PFASOMP_24	<0.001	<0.0004	<0.0004	<0.002	<0.01	<0.05	<0.002	<0.05	<0.1	<0.002	<0.5
0021	MW140	Lakes	30 May 2019	LW_MW02C_190530	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW140	Lakes	21 Oct 2021	0021_MW140_211021	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	MW140	Lakes	05 Apr 2022	0021_MW140_220405	Normal	ACT_0021_PFASOMP_21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW140	Lakes	10 Oct 2022	0021_MW140_221010	Normal	ACT_0021_PFASOMP_21	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW140	Lakes	18 Apr 2023	0021_MW140_230418	Normal	ACT_0021_PFASOMP_23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW140	Lakes	17 Oct 2023	0021_MW140_231017	Normal	ACT_0021_PFASOMP_23	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	MW140	Lakes	09 Apr 2024	0021_MW140_240409	Normal	ACT_0021_PFASOMP_24	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001

Notes
LOR Limit of Reporting
Normal Primary sample
Field_D Intra-laboratory duplicate sample
Interlab_D Inter-laboratory duplicate sample

Sit ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																											

Table T9 - Historical Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID										
0020	SW004	Captains Lagoon	18 Apr 2017	CL_SW01	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0020	SW004	Captains Lagoon	01 May 2018	CL_SW01_180501	Normal	JBT_0021 PFAS	<0.001	0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0020	SW004	Captains Lagoon	18 Oct 2021	0020_SW004_211018	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW004	Captains Lagoon	04 Apr 2022	0020_SW004_220404	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW004	Captains Lagoon	07 Jul 2022	0020_SW004_220101	Normal	ACT_0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW004	Captains Lagoon	11 Oct 2022	0020_SW004_221011	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW004	Captains Lagoon	30 Jan 2023	0020_SW004_230130	Normal	ACT_0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW004	Captains Lagoon	17 Apr 2023	0020_SW004_230417	Normal	ACT_0020 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW004	Captains Lagoon	16 Oct 2023	0020_SW004_231016	Normal	ACT_0020 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW004	Captains Lagoon	08 Apr 2024	0020_SW004_240408	Normal	ACT_0020 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW005	Captains Lagoon	18 Apr 2017	CL_SW02	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW005	Captains Lagoon	01 May 2018	CL_SW02_180501	Normal	JBT_0021 PFAS	<0.001	0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0020	SW005	Captains Lagoon	18 Oct 2021	0020_SW005_211018	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW005	Captains Lagoon	04 Apr 2022	0020_SW005_220404	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW005	Captains Lagoon	11 Oct 2022	0020_SW005_221011	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW005	Captains Lagoon	17 Apr 2023	0020_SW005_230417	Normal	ACT_0020 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW005	Captains Lagoon	16 Oct 2023	0020_SW005_231016	Normal	ACT_0020 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW005	Captains Lagoon	08 Apr 2024	0020_SW005_240408	Normal	ACT_0020 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW010	Captains Lagoon	18 Apr 2017	CL_SW07	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW010	Captains Lagoon	01 May 2018	CL_QC221_180501	Interlab_D	JBT_0021 PFAS	<0.01	<0.01	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0020	SW010	Captains Lagoon	01 May 2018	CL_SW07_180501	Normal	JBT_0021 PFAS	<0.001	0.002	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0020	SW010	Captains Lagoon	18 Oct 2021	0020_SW010_211018	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW010	Captains Lagoon	04 Apr 2022	0020_SW010_220404	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW010	Captains Lagoon	07 Jul 2022	0020_SW010_220101	Normal	ACT_0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW010	Captains Lagoon	10 Oct 2022	0020_SW010_221012	Normal	ACT_0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW010	Captains Lagoon	12 Oct 2022	0020_SW010_221012	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW010	Captains Lagoon	30 Jan 2023	0020_QC120_230130	Field_D	ACT_0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW010	Captains Lagoon	30 Jan 2023	0020_SW010_230130	Normal	ACT_0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW010	Captains Lagoon	17 Apr 2023	0020_SW010_230417	Normal	ACT_0020 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW010	Captains Lagoon	16 Oct 2023	0020_SW010_231016	Normal	ACT_0020 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW010	Captains Lagoon	08 Apr 2024	0020_SW010_240408	Normal	ACT_0020 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW011	Captains Lagoon	18 Apr 2017	CL_SW08	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW011	Captains Lagoon	18 Apr 2017	JCQA02	Field_D	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW011	Captains Lagoon	01 May 2018	CL_SW08_180501	Normal	JBT_0021 PFAS	<0.001	0.002	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0020	SW011	Captains Lagoon	21 Oct 2021	0020_SW011_211021	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW011	Captains Lagoon	04 Apr 2022	0020_SW011_220404	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW011	Captains Lagoon	07 Jul 2022	0020_SW011_220707	Normal	ACT_0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW011	Captains Lagoon	10 Oct 2022	0020_SW011_221012	Normal	ACT_0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW011	Captains Lagoon	12 Oct 2022	0020_SW011_221012	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW011	Captains Lagoon	01 Feb 2023	0020_SW011_230201	Normal	ACT_0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW011	Captains Lagoon	17 Apr 2023	0020_SW011_230417	Normal	ACT_0020 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW011	Captains Lagoon	16 Oct 2023	0020_SW011_231016	Normal	ACT_0020 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW011	Captains Lagoon	08 Apr 2024	0020_SW011_240408	Normal	ACT_0020 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW012	Captains Lagoon	26 Mar 2018	CL_QC206_180326	Interlab_D	JBT_0021 PFAS	<0.001	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
0020	SW012	Captains Lagoon	26 Mar 2018	CL_SW12_180326	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0020	SW012	Captains Lagoon	15 May 2018	CL_SW12_180515	Normal	JBT_0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001
0020	SW012	Captains Lagoon	18 Oct 2021	0020_SW012_211018	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW012	Captains Lagoon	04 Apr 2022	0020_SW012_220404	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW012	Captains Lagoon	11 Oct 2022	0020_SW012_221011	Normal	ACT_0020 PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW012	Captains Lagoon	17 Apr 2023	0020_SW012_230417	Normal	ACT_0020 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW012	Captains Lagoon	16 Oct 2023	0020_SW012_231016	Normal	ACT_0020 PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW012	Captains Lagoon	08 Apr 2024	0020_QC104_240408	Field_D	ACT_0020 PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02
0020	SW012	Captains Lagoon	08 Apr 2024	0020_QC204_240408	Interlab_D	ACT_0020 PFASOMP_24	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.5

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																									

Table T9 - Historical Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0020	SW012	Captains Lagoon	08 Apr 2024	0020_SW012_240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05
0020	SW016	AEC E	26 Oct 2017	E Irrigation_03	Normal	JBT 0021 PFAS	<0.001	0.018	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW016	AEC E	26 Oct 2017	TNQA301	Interlab_D	JBT 0021 PFAS	<0.001	0.021	<0.001	<0.001	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
0020	SW016	AEC E	18 Oct 2021	0020_SW016_211018	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW016	AEC E	08 Apr 2022	0020_SW016_220408	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW016	AEC E	11 Oct 2022	0020_SW016_221011	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW016	AEC E	17 Apr 2023	0020_SW016_230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW016	AEC E	16 Oct 2023	0020_SW016_231016	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW016	AEC E	08 Apr 2024	0020_SW016_240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW018	AEC E	10 Apr 2017	E_SW01	Normal	JBT 0021 PFAS	<0.001	0.003	<0.001	<0.001	0.0022	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW018	AEC E	18 Oct 2021	0020_SW018_211018	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW018	AEC E	08 Apr 2022	0020_SW018_220408	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW018	AEC E	11 Oct 2022	0020_QC204_221011	Interlab_D	ACT 0020 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0020	SW018	AEC E	11 Oct 2022	0020_SW018_221011	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW018	AEC E	17 Apr 2023	0020_SW018_230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW018	AEC E	16 Oct 2023	0020_SW018_231016	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW018	AEC E	08 Apr 2024	0020_SW018_240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW022	AEC F	10 Apr 2017	F_SW01	Normal	JBT 0021 PFAS	<0.001	0.039	0.001	<0.001	0.0143	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW022	AEC F	18 Oct 2021	0020_SW022_211018	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW022	AEC F	13 Dec 2021	0020_SW022_211213	Normal	ACT 0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW022	AEC F	04 Apr 2022	0020_SW022_220404	Normal	ACT 0020 PFASOMP 21	<0.05	0.2	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW022	AEC F	08 Jul 2022	0020_SW022_220708	Normal	ACT 0020 PFASMGMT	<0.05	0.54	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW022	AEC F	10 Oct 2022	0020_SW022_221010	Normal	ACT 0020 PFASOMP 21	<0.05	0.51	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW022	AEC F	17 Apr 2023	0020_QC102_230417	Field_D	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW022	AEC F	17 Apr 2023	0020_QC202_230417	Interlab_D	ACT 0020 PFASOMP 23	<0.01	0.03	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0020	SW022	AEC F	17 Apr 2023	0020_SW022_230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW022	AEC F	08 Apr 2024	0020_SW022_240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW023	AEC F	10 Apr 2017	F_SW02	Normal	JBT 0021 PFAS	<0.001	0.048	0.019	0.002	0.06	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW023	AEC F	19 Oct 2021	0020_SW023_211019	Normal	ACT 0020 PFASOMP 21	<0.05	0.1	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW023	AEC F	13 Dec 2021	0020_SW023_211213	Normal	ACT 0020 PFASMGMT	<0.05	0.17	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW023	AEC F	04 Apr 2022	0020_SW023_220404	Normal	ACT 0020 PFASOMP 21	<0.05	0.14	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW023	AEC F	08 Jul 2022	0020_SW023_220708	Normal	ACT 0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW023	AEC F	10 Oct 2022	0020_SW023_221010	Normal	ACT 0020 PFASOMP 21	<0.05	0.1	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW023	AEC F	17 Apr 2023	0020_SW023_230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW023	AEC F	08 Apr 2024	0020_SW023_240408	Normal	ACT 0020 PFASOMP 24	<0.05	0.15	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW026	Flat Rock Creek	19 Apr 2017	FC_SW01	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW026	Flat Rock Creek	15 May 2018	FC_QC216_180515	Interlab_D	JBT 0021 PFAS	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0020	SW026	Flat Rock Creek	15 May 2018	FC_SW01_180515	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW026	Flat Rock Creek	19 Oct 2021	0020_SW026_211019	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW026	Flat Rock Creek	04 Apr 2022	0020_QC203_220404	Interlab_D	ACT 0020 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0020	SW026	Flat Rock Creek	04 Apr 2022	0020_SW026_220404	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW026	Flat Rock Creek	07 Jul 2022	0020_QC103_220707	Field_D	ACT 0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW026	Flat Rock Creek	07 Jul 2022	0020_QC203_220707	Interlab_D	ACT 0020 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0020	SW026	Flat Rock Creek	07 Jul 2022	0020_SW026_220707	Normal	ACT 0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW026	Flat Rock Creek	10 Oct 2022	0020_SW026_221010	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW026	Flat Rock Creek	30 Jan 2023	0020_SW026_230130	Normal	ACT 0020 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW026	Flat Rock Creek	17 Apr 2023	0020_SW026_230417	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW026	Flat Rock Creek	16 Oct 2023	0020_SW026_231016	Normal	ACT 0020 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW026	Flat Rock Creek	08 Apr 2024	0020_SW026_240408	Normal	ACT 0020 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW027	Flat Rock Creek	19 Apr 2017	FC_SW02	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW027	Flat Rock Creek	15 May 2018	FC_SW02_180515	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW027	Flat Rock Creek	19 Oct 2021	0020_SW027_211019	Normal	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW027	Flat Rock Creek	04 Apr 2022	0020_QC103_220404	Field_D	ACT 0020 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05

Table T9 - Historical Surface Water Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002		0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Recreational Water	10			2															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																			
0020	SW027	Flat Rock Creek	04 Apr 2022	0020 SW027 220404	Normal	ACT 0020 PFASOMP 21	<0.01	0.04	0.04	0.08	0.08	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW027	Flat Rock Creek	07 Jul 2022	0020 SW027 220707	Normal	ACT 0020 PFASMGMT	<0.01	0.05	0.04	0.09	0.09	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW027	Flat Rock Creek	10 Oct 2022	0020 SW027 221010	Normal	ACT 0020 PFASOMP 21	<0.01	0.04	0.06	0.1	0.1	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW027	Flat Rock Creek	30 Jan 2023	0020 SW027 230130	Normal	ACT 0020 PFASMGMT	<0.01	0.11	0.12	0.23	0.26	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW027	Flat Rock Creek	17 Apr 2023	0020 SW027 230417	Normal	ACT 0020 PFASOMP 23	<0.01	0.13	0.14	0.27	0.29	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW027	Flat Rock Creek	16 Oct 2023	0020 SW027 231016	Normal	ACT 0020 PFASOMP 23	<0.01	0.01	<0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW027	Flat Rock Creek	08 Apr 2024	0020 SW027 240408	Normal	ACT 0020 PFASOMP 24	<0.01	0.06	0.07	0.13	0.13	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW029	Flat Rock Creek	19 Apr 2017	FC SW04	Normal	JBT 0021 PFAS	0.001	0.0709	0.0774	0.148	0.171	0.0051	0.0064	0.0039	<0.0005	<0.002	0.0016	0.0037	0.0006	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0020	SW029	Flat Rock Creek	15 May 2018	FC SW04 180515	Normal	JBT 0021 PFAS	0.0012	0.0492	0.0954	0.145	0.176	0.0078	0.0072	0.0054	<0.0005	<0.002	0.0013	0.0077	0.001	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0020	SW029	Flat Rock Creek	18 Oct 2021	0020 SW029 211018	Normal	ACT 0020 PFASOMP 21	<0.01	0.04	0.06	0.1	0.1	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW029	Flat Rock Creek	04 Apr 2022	0020 QC104 220404	Field D	ACT 0020 PFASOMP 21	<0.01	0.03	0.03	0.06	0.06	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW029	Flat Rock Creek	04 Apr 2022	0020 QC204 220404	Interlab D	ACT 0020 PFASOMP 21	<0.01	0.03	0.03	0.06	0.06	<0.01	<0.01	<0.01	<0.02	<0.02	<0.01	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1	<0.5	
0020	SW029	Flat Rock Creek	04 Apr 2022	0020 SW029 220404	Normal	ACT 0020 PFASOMP 21	<0.01	0.03	0.03	0.06	0.06	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW029	Flat Rock Creek	10 Oct 2022	0020 SW029 221011	Normal	ACT 0020 PFASOMP 21	<0.01	0.06	0.05	0.11	0.11	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW029	Flat Rock Creek	17 Apr 2023	0020 SW029 230417	Normal	ACT 0020 PFASOMP 23	<0.01	0.05	0.05	0.1	0.1	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW029	Flat Rock Creek	16 Oct 2023	0020 SW029 231016	Normal	ACT 0020 PFASOMP 23	<0.01	0.04	0.04	0.08	0.08	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW029	Flat Rock Creek	08 Apr 2024	0020 SW029 240408	Normal	ACT 0020 PFASOMP 24	<0.01	0.06	0.06	0.12	0.12	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	20 Apr 2017	FC SW05	Normal	JBT 0021 PFAS	0.001	0.052	0.0573	0.109	0.124	0.0034	0.0046	0.0021	<0.0005	<0.002	<0.0005	0.0034	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0020	SW030	Flat Rock Creek	30 Apr 2018	FC QC113 180430	Field D	JBT 0021 PFAS	<0.01	0.1	0.16	0.26	0.26	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	30 Apr 2018	FC SW05 180430	Normal	JBT 0021 PFAS	<0.002	0.0962	0.125	0.221	0.246	0.0076	0.01	0.0022	<0.002	<0.002	<0.002	0.0054	<0.002	<0.002	<0.002	<0.002	<0.002	<0.005	
0020	SW030	Flat Rock Creek	19 Oct 2021	0020 QC204 211019	Interlab D	ACT 0020 PFASOMP 21	<0.01	0.08	0.13	0.2	0.2	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.01	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1	
0020	SW030	Flat Rock Creek	19 Oct 2021	0020 SW030 211019	Normal	ACT 0020 PFASOMP 21	<0.01	0.08	0.12	0.2	0.2	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	04 Apr 2022	0020 SW030 220404	Normal	ACT 0020 PFASOMP 21	<0.01	0.05	0.05	0.1	0.1	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	12 Apr 2022	0020 SW030 220412	Normal	ACT 0020 PFASMGMT	<0.01	0.06	0.06	0.12	0.12	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	08 Jul 2022	0020 QC104 220708	Field D	ACT 0020 PFASMGMT	<0.01	0.06	0.06	0.12	0.12	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	08 Jul 2022	0020 QC204 220708	Interlab D	ACT 0020 PFASMGMT	<0.01	0.05	0.05	0.1	0.1	<0.01	<0.01	<0.01	<0.01	<0.05	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	
0020	SW030	Flat Rock Creek	08 Jul 2022	0020 SW030 220708	Normal	ACT 0020 PFASMGMT	<0.01	0.05	0.05	0.1	0.1	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	12 Oct 2022	0020 SW030 221012	Normal	ACT 0020 PFASMGMT	<0.01	0.07	0.07	0.14	0.14	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	12 Oct 2022	0020 SW030 221012	Normal	ACT 0020 PFASOMP 21	<0.01	0.05	0.06	0.11	0.11	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	01 Feb 2023	0020 SW030 230201	Normal	ACT 0020 PFASMGMT	<0.01	0.09	0.11	0.2	0.2	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	17 Apr 2023	0020 QC101 230417	Field D	ACT 0020 PFASOMP 23	<0.01	0.07	0.11	0.18	0.18	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	17 Apr 2023	0020 QC201 230417	Interlab D	ACT 0020 PFASOMP 23	<0.01	0.07	0.1	0.17	0.17	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.01	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1	
0020	SW030	Flat Rock Creek	17 Apr 2023	0020 SW030 230417	Normal	ACT 0020 PFASOMP 23	<0.01	0.09	0.1	0.19	0.19	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	16 Oct 2023	0020 SW030 231016	Normal	ACT 0020 PFASOMP 23	<0.01	0.04	0.05	0.09	0.09	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW030	Flat Rock Creek	08 Apr 2024	0020 SW030 240408	Normal	ACT 0020 PFASOMP 24	<0.01	0.11	0.09	0.2	0.2	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW032	Flat Rock Creek	21 Mar 2018	FC SW13 180321	Normal	JBT 0021 PFAS	0.0015	0.0922	0.0516	0.144	0.153	<0.0005	0.0017	0.0016	<0.0005	<0.002	<0.0005	0.0032	0.0008	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0020	SW032	Flat Rock Creek	19 Oct 2021	0020 QC104 211019	Field D	ACT 0020 PFASOMP 21	<0.01	0.06	0.03	0.09	0.09	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW032	Flat Rock Creek	19 Oct 2021	0020 SW032 211019	Normal	ACT 0020 PFASOMP 21	<0.01	0.06	0.03	0.09	0.09	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW032	Flat Rock Creek	04 Apr 2022	0020 SW032 220404	Normal	ACT 0020 PFASOMP 21	<0.01	0.01	<0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.0		

[illegible]

Table T9 - Historical Surface Water Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Recreational Water	10			2															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																		
0020	SW033	Fiat Rock Creek	08 Apr 2024	0020_SW033_240408	Normal	ACT_0020_PFASOMP_24	<0.01	0.01	<0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW035	AEC G	12 Apr 2017	G_SW01	Normal	JBT_0021_PFAS	0.018	0.551	0.244	0.795	0.915	0.016	0.0256	0.0222	<0.0005	<0.002	0.0053	0.0231	0.0042	<0.0005	<0.0005	<0.0005	<0.0005	
0020	SW035	AEC G	07 Apr 2022	0020_SW035_220407	Normal	ACT_0020_PFASOMP_21	0.02	1.87	0.11	1.98	2.05	<0.02	<0.02	0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW035	AEC G	17 Apr 2023	0020_SW035_230417	Normal	ACT_0020_PFASOMP_23	0.07	0.66	0.58	1.24	1.71	0.1	0.03	0.02	<0.02	<0.1	0.07	0.15	0.03	<0.02	<0.02	<0.02	<0.05	
0020	SW035	AEC G	08 Apr 2024	0020_SW035_240408	Normal	ACT_0020_PFASOMP_24	0.08	1.01	1.17	2.18	3.15	<0.02	0.04	0.03	0.03	<0.1	0.25	0.34	0.05	0.02	0.03	<0.02	<0.05	
0020	SW036	AEC G	12 Apr 2017	G_SW02	Normal	JBT_0021_PFAS	0.0292	0.765	0.488	1.25	1.45	0.0258	0.0402	0.0331	0.0005	<0.002	0.0073	0.044	0.0092	0.0009	0.0018	<0.0005	<0.0005	
0020	SW036	AEC G	18 Oct 2021	0020_QC102_211018	Field_D	ACT_0020_PFASOMP_21	0.02	0.7	0.47	1.17	1.43	0.09	0.04	0.02	<0.02	<0.1	<0.02	0.09	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW036	AEC G	18 Oct 2021	0020_SW036_211018	Normal	ACT_0020_PFASOMP_21	0.02	0.65	0.46	1.11	1.37	0.09	0.04	0.02	<0.02	<0.1	<0.02	0.09	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW036	AEC G	04 Apr 2022	0020_SW036_220404	Normal	ACT_0020_PFASOMP_21	0.03	0.79	0.42	1.21	1.42	0.04	0.03	0.02	<0.02	<0.1	<0.02	0.09	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW036	AEC G	11 Oct 2022	0020_SW036_221011	Normal	ACT_0020_PFASOMP_21	0.02	0.76	0.35	1.11	1.27	0.06	<0.02	0.02	<0.02	<0.1	<0.02	0.06	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW036	AEC G	17 Apr 2023	0020_SW036_230417	Normal	ACT_0020_PFASOMP_23	0.02	0.65	0.43	1.08	1.25	0.04	0.03	0.02	<0.02	<0.1	<0.02	0.06	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW036	AEC G	16 Oct 2023	0020_SW036_231016	Normal	ACT_0020_PFASOMP_23	<0.01	0.16	0.09	0.25	0.28	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW036	AEC G	08 Apr 2024	0020_SW036_240408	Normal	ACT_0020_PFASOMP_24	0.01	0.6	0.37	0.97	1.07	0.03	0.02	<0.02	<0.02	<0.1	<0.02	0.04	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW037	AEC G	12 Apr 2017	G_SW03	Normal	JBT_0021_PFAS	0.0273	0.656	0.479	1.14	1.31	0.0249	0.0375	0.0288	<0.0005	<0.002	0.0069	0.0405	0.0079	0.0009	0.0013	<0.0005	<0.0005	
0020	SW037	AEC G	18 Oct 2021	0020_QC202_211018	Interlab_D	ACT_0020_PFASOMP_21	0.03	0.65	0.46	1.1	1.3	0.04	0.04	0.03	<0.02	<0.02	<0.02	0.07	0.01	<0.01	<0.02	<0.02	<0.5	
0020	SW037	AEC G	18 Oct 2021	0020_SW037_211018	Normal	ACT_0020_PFASOMP_21	0.02	0.66	0.41	1.07	1.33	0.1	0.04	0.02	<0.02	<0.1	<0.02	0.08	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW037	AEC G	04 Apr 2022	0020_SW037_220404	Normal	ACT_0020_PFASOMP_21	0.03	0.91	0.44	1.35	1.57	0.04	0.03	0.02	<0.02	<0.1	<0.02	0.1	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW037	AEC G	11 Oct 2022	0020_QC202_221011	Interlab_D	ACT_0020_PFASOMP_21	0.01	0.64	0.31	0.95	1	0.01	0.02	0.02	<0.02	<0.02	<0.02	0.04	<0.01	<0.01	<0.02	<0.02	<0.5	
0020	SW037	AEC G	11 Oct 2022	0020_SW037_221011	Normal	ACT_0020_PFASOMP_21	0.02	0.72	0.4	1.12	1.26	0.04	0.03	<0.02	<0.02	<0.1	<0.02	0.05	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW037	AEC G	17 Apr 2023	0020_SW037_230417	Normal	ACT_0020_PFASOMP_23	0.02	0.61	0.42	1.03	1.2	0.04	0.03	0.02	<0.02	<0.1	<0.02	0.06	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW037	AEC G	16 Oct 2023	0020_SW037_231016	Normal	ACT_0020_PFASOMP_23	<0.01	0.16	0.09	0.25	0.28	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.05	
0020	SW037	AEC G	08 Apr 2024	0020_SW037_240408	Normal	ACT_0020_PFASOMP_24	0.02	0.55	0.33	0.88	0.99	0.03	0.02	<0.02	<0.02	<0.1	<0.02	0.04	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	OTH001	AEC A	13 Oct 2017	A_S415_SW05	Normal	JBT_0021_PFAS	0.32	4.22	4.62	8.84	12.3	0.55	0.5	0.28	<0.02	<0.1	0.2	1.42	0.15	<0.02	<0.02	<0.02	<0.05	
0021	OTH001	AEC A	21 Oct 2021	0021_OTH001_211021	Normal	ACT_0021_PFASOMP_21	0.13	3.54	1.95	5.49	7.06	0.18	0.2	0.14	<0.02	<0.1	0.14	0.64	0.06	<0.02	<0.02	<0.02	<0.05	
0021	OTH001	AEC A	21 Oct 2021	0021_QC210_211021	Interlab_D	ACT_0021_PFASOMP_21	0.11	3.1	1.7	4.7	6.3	0.16	0.14	0.14	<0.02	0.1	0.1	0.62	0.06	<0.01	<0.02	<0.02	<0.5	
0021	OTH001	AEC A	05 Apr 2022	0021_OTH001_220405	Normal	ACT_0021_PFASOMP_21	0.08	8.76	0.81	9.57	10.6	0.17	0.08	0.14	<0.02	<0.1	0.05	0.45	0.02	<0.02	<0.02	<0.02	<0.05	
0021	OTH001	AEC A	05 Apr 2022	0021_QC202_220405	Interlab_D	ACT_0021_PFASOMP_21	0.09	7.2	0.86	8.1	9.1	0.14	0.09	0.13	<0.02	0.03	0.06	0.44	0.03	<0.01	<0.02	<0.02	<0.5	
0021	OTH001	AEC A	13 Oct 2022	0021_OTH001_221013	Normal	ACT_0021_PFASOMP_21	0.03	0.84	0.37	1.21	1.47	0.03	0.04	0.02	<0.02	<0.1	0.02	0.12	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	OTH001	AEC A	02 Nov 2022	0021_OTH001_221102	Normal	ACT_0021_Stage4_23	0.02	0.71	0.26	0.97	0.99	-	-	-	-	-	-	-	-	-	-	-		
0021	OTH001	AEC A	20 Apr 2023	0021_OTH001_230420	Normal	ACT_0021_PFASOMP_23	0.07	2.24	0.9	3.14	3.76	0.06	0.08	0.07	<0.02	<0.1	0.05	0.26	0.03	<0.02	<0.02	<0.02	<0.05	
0021	OTH001	AEC A	19 Oct 2023	0021_OTH001_231019	Normal	ACT_0021_PFASOMP_23	<0.01	0.02	<0.01	0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	OTH001	AEC A	11 Apr 2024	0021_OTH001_240411	Normal	ACT_0021_PFASOMP_24	<0.01	0.01	<0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	OTH002	AEC A	13 Oct 2017	A_S416_SW02	Normal	JBT_0021_PFAS	0.06	1.16	0.83	1.99	2.64	0.08	0.08	0.04	<0.02	<0.1	0.04	0.32	0.03	<0.02	<0.02	<0.02	<0.05	
0021	OTH002	AEC A	21 Oct 2021	0021_OTH002_211021	Normal	ACT_0021_PFASOMP_21	0.05	0.71	0.39	1.1	1.51	0.04	0.05	0.02	<0.02	<0.1	0.04	0.19	0.02	<0.02	<0.02	<0.02	<0.05	
0021	OTH002	AEC A	05 Apr 2022	0021_OTH002_220405	Normal	ACT_0021_PFASOMP_21	0.05	0.66	0.36	1.02	1.44	0.05	0.04	<0.02	<0.02	<0.1	0.03	0.23	0.02	<0.02	<0.02	<0.02	<0.05	
0021	OTH002	AEC A	13 Oct 2022	0021_OTH002_221013	Normal	ACT_0021_PFASOMP_21	0.06	0.66	0.4	1.06	1.55	0.04	0.04	<0.02	<0.02	<0.1	0.04	0.29	0.02	<0.02	<0.02	<0.02	<0.05	
0021	OTH002	AEC A	20 Apr 2023	0021_OTH002_230420	Normal	ACT_0021_PFASOMP_23	0.09	0.96	0.59	1.55	2.38	0.06	0.07	0.03	<0.02	<0.1	0.07	0.44	0.04	<0.02	0.03	<0.02	<0.05	
0021	OTH002	AEC A	19 Oct 2023	0021_OTH002_231019	Normal	ACT_0021_PFASOMP_23	0.05	0.56	0.29	0.85	1.25	0.03	0.03	<0.02	<0.02	<0.1	0.04	0.25	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	OTH002	AEC A	10 Apr 2024	0021_OTH002_240410	Normal	ACT_0021_PFASOMP_24	0.06	0.6	0.27	0.87	1.22	0.02	0.03	<0.02	<0.02	<0.1	0.03	0.19	0.02	<0.02	<0.02	<0.02	<0.05	
0021	OTH003	AEC A	16 Nov 2017	A_S426_SW01	Normal	JBT_0021_PFAS	0.27	6.07	4.24	10.3	13	0.32	0.46	0.26	<0.02	<0.1	0.17	1.11	0.13	<0.02	<0.02	<0.02	<0.05	
0021	OTH003	AEC A	19 Oct 2021	0021_OTH003_211019	Normal	ACT_0021_PFASOMP_21	0.08	5.15	1.09	6.24	7	0.08	0.08	0.08	<0.02	<0.1	0.06	0.34	0.04	<0.02	<0.02	<0.02	<0.05	
0021	OTH003	AEC A	05 Apr 2022	0021_OTH003_220405	Normal	ACT_0021_PFASOMP_21	0.12	4.54	1.79	6.33	7.78	0.21	0.19	0.12	<0.02	<0.1	0.09	0.67	0.05	<0.02	<0.02	<0.02	<0.05	
0021	OTH003	AEC A	13 Oct 2022	0021_OTH003_221013	Normal	ACT_0021_PFASOMP_21	0.1	3.95	1.56	5.51	6.37	0.08	0.13	0.11	<0.02	<0.1	0.06	0.34	0.04	&				

Table T9 - Historical Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0020	SW033	Fiat Rock Creek	08 Apr 2024	0020_SW033_240408	Normal	ACT_0020_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW035	AEC G	12 Apr 2017	G_SW01	Normal	JBT_0021_PFAS	<0.001	0.004	<0.001	<0.001	0.0015	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW035	AEC G	07 Apr 2022	0020_SW035_220407	Normal	ACT_0020_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW035	AEC G	17 Apr 2023	0020_SW035_230417	Normal	ACT_0020_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW035	AEC G	08 Apr 2024	0020_SW035_240408	Normal	ACT_0020_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	0.08	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW036	AEC G	12 Apr 2017	G_SW02	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	0.0015	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW036	AEC G	18 Oct 2021	0020_QC102_211018	Field_D	ACT_0020_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW036	AEC G	18 Oct 2021	0020_SW036_211018	Normal	ACT_0020_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW036	AEC G	04 Apr 2022	0020_SW036_220404	Normal	ACT_0020_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW036	AEC G	11 Oct 2022	0020_SW036_221011	Normal	ACT_0020_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW036	AEC G	17 Apr 2023	0020_SW036_230417	Normal	ACT_0020_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW036	AEC G	16 Oct 2023	0020_SW036_231016	Normal	ACT_0020_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW036	AEC G	08 Apr 2024	0020_SW036_240408	Normal	ACT_0020_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW037	AEC G	12 Apr 2017	G_SW03	Normal	JBT_0021_PFAS	<0.001	0.002	<0.001	<0.001	0.0019	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0020	SW037	AEC G	18 Oct 2021	0020_QC202_211018	Interlab_D	ACT_0020_PFASOMP_21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0020	SW037	AEC G	18 Oct 2021	0020_SW037_211018	Normal	ACT_0020_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW037	AEC G	04 Apr 2022	0020_SW037_220404	Normal	ACT_0020_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW037	AEC G	11 Oct 2022	0020_QC202_221011	Interlab_D	ACT_0020_PFASOMP_21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0020	SW037	AEC G	11 Oct 2022	0020_SW037_221011	Normal	ACT_0020_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW037	AEC G	17 Apr 2023	0020_SW037_230417	Normal	ACT_0020_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW037	AEC G	16 Oct 2023	0020_SW037_231016	Normal	ACT_0020_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0020	SW037	AEC G	08 Apr 2024	0020_SW037_240408	Normal	ACT_0020_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH001	AEC A	13 Oct 2017	A_S415_SW05	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH001	AEC A	21 Oct 2021	0021_OTH001_211021	Normal	ACT_0021_PFASOMP_21	<0.05	0.08	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH001	AEC A	21 Oct 2021	0021_QC210_211021	Interlab_D	ACT_0021_PFASOMP_21	<0.01	0.07	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	OTH001	AEC A	05 Apr 2022	0021_OTH001_220405	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	0.03	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH001	AEC A	05 Apr 2022	0021_QC202_220405	Interlab_D	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	OTH001	AEC A	13 Oct 2022	0021_OTH001_221013	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH001	AEC A	02 Nov 2022	0021_OTH001_221102	Normal	ACT_0021_Stage4_23	-	<0.01	<0.02	-	-	-	-	-	-	-	-
0021	OTH001	AEC A	20 Apr 2023	0021_OTH001_230420	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH001	AEC A	19 Oct 2023	0021_OTH001_231019	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH001	AEC A	11 Apr 2024	0021_OTH001_240411	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH002	AEC A	13 Oct 2017	A_S416_SW02	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH002	AEC A	21 Oct 2021	0021_OTH002_211021	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH002	AEC A	05 Apr 2022	0021_OTH002_220405	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH002	AEC A	13 Oct 2022	0021_OTH002_221013	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH002	AEC A	20 Apr 2023	0021_OTH002_230420	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH002	AEC A	19 Oct 2023	0021_OTH002_231019	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH002	AEC A	10 Apr 2024	0021_OTH002_240410	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH003	AEC A	16 Nov 2017	A_S426_SW01	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH003	AEC A	19 Oct 2021	0021_OTH003_211019	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH003	AEC A	05 Apr 2022	0021_OTH003_220405	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH003	AEC A	13 Oct 2022	0021_OTH003_221013	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH003	AEC A	03 Apr 2023	0021_OTH003_230403	Normal	ACT_0021_Stage4_23	-	0.02	<0.02	-	-	-	-	-	-	-	-
0021	OTH003	AEC A	20 Apr 2023	0021_OTH003_230420	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH003	AEC A	19 Oct 2023	0021_OTH003_231019	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH003	AEC A	11 Apr 2024	0021_OTH003_240411	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH004	AEC A	13 Oct 2017	A_S439_SW03	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH004	AEC A	13 Oct 2017	TNQA203	Field_D	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH004	AEC A	21 Oct 2021	0021_OTH004_211021	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH004	AEC A	05 Apr 2022	0021_OTH004_220405	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH004	AEC A	13 Oct 2022	0021_OTH004_221013	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH004	AEC A	20 Apr 2023	0021_OTH004_230420	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05

Table T9 - Historical Surface Water Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Recreational Water	10			2															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID	0.13	3.29	1.52	4.81	6.38	0.07	0.1	0.11	<0.02	<0.1	0.12	0.99	0.05	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH004	AEC A	19 Oct 2023	0021 OTH004 231019	Normal	ACT 0021 PFASOMP 23	0.13	3.29	1.52	4.81	6.38	0.07	0.1	0.11	<0.02	<0.1	0.12	0.99	0.05	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH004	AEC A	11 Apr 2024	0021 OTH004 240411	Normal	ACT 0021 PFASOMP 24	0.15	3.66	2.11	5.77	7.55	0.1	0.15	0.14	<0.02	<0.1	0.14	1.01	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH005	AEC A	28 Jun 2017	A S440 SW01	Normal	JBT 0021 PFAS	0.622	30.3	6.68	37	41	0.332	0.382	0.858	<0.02	<0.02	0.15	1.38	0.178	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH005	AEC A	13 Oct 2017	A S440 SW01	Normal	JBT 0021 PFAS	0.42	10.6	5.11	15.7	19.9	0.46	0.44	0.45	<0.02	<0.1	0.29	1.97	0.15	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH005	AEC A	19 Oct 2021	0021 OTH005 211019	Normal	ACT 0021 PFASOMP 21	0.16	11	2.11	13.1	14.6	0.1	0.15	0.22	<0.02	<0.1	0.11	0.7	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH005	AEC A	05 Apr 2022	0021 OTH005 220405	Normal	ACT 0021 PFASOMP 21	0.08	3.6	0.95	4.55	5.17	0.06	0.07	0.08	<0.02	<0.1	0.04	0.27	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	OTH005	AEC A	05 Apr 2022	0021 QC102 220405	Field_D	ACT 0021 PFASOMP 21	0.09	4.46	1.26	5.72	6.49	0.06	0.08	0.12	<0.02	<0.1	0.05	0.34	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH005	AEC A	13 Oct 2022	0021 OTH005 221013	Normal	ACT 0021 PFASOMP 21	0.1	7.87	1.25	9.12	9.86	0.04	0.08	0.13	<0.02	<0.1	0.05	0.31	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH005	AEC A	13 Oct 2022	0021 QC111 221013	Field_D	ACT 0021 PFASOMP 21	0.1	9.7	1.22	10.9	11.6	0.04	0.06	0.14	<0.02	<0.1	0.05	0.3	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH005	AEC A	13 Oct 2022	0021 QC211 221013	Interlab_D	ACT 0021 PFASOMP 21	0.13	8.1	1.4	9.5	10	0.05	0.09	0.16	<0.02	0.02	0.05	0.33	0.04	<0.01	<0.02	<0.02	<0.02	<0.05	<0.1	<0.5
0021	OTH005	AEC A	20 Apr 2023	0021 OTH005 230420	Normal	ACT 0021 PFASOMP 23	0.04	2.63	0.49	3.12	3.35	<0.02	0.03	0.05	<0.02	<0.1	<0.02	0.11	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH005	AEC A	19 Oct 2023	0021 OTH005 231019	Normal	ACT 0021 PFASOMP 23	<0.01	0.69	0.12	0.81	0.84	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH005	AEC A	10 Apr 2024	0021 OTH005 240410	Normal	ACT 0021 PFASOMP 24	<0.01	0.18	0.04	0.22	0.22	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH006	AEC A	13 Oct 2017	A S481 SW04	Normal	JBT 0021 PFAS	0.01	0.04	0.15	0.19	0.63	0.08	0.04	<0.02	<0.02	<0.1	0.1	0.21	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH006	AEC A	21 Oct 2021	0021 OTH006 211021	Normal	ACT 0021 PFASOMP 21	<0.01	<0.01	0.03	0.03	0.38	0.05	0.02	<0.02	<0.02	<0.1	0.09	0.19	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH006	AEC A	21 Oct 2021	0021 QC110 211021	Field_D	ACT 0021 PFASOMP 21	<0.01	<0.01	0.03	0.03	0.46	0.06	0.02	<0.02	<0.02	<0.1	0.11	0.24	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH006	AEC A	05 Apr 2022	0021 OTH006 220405	Normal	ACT 0021 PFASOMP 21	0.01	0.47	0.15	0.62	0.9	0.05	<0.02	<0.02	<0.02	<0.1	0.06	0.16	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH006	AEC A	13 Oct 2022	0021 OTH006 221013	Normal	ACT 0021 PFASOMP 21	<0.01	<0.01	0.02	0.02	0.23	0.03	<0.02	<0.02	<0.02	<0.1	0.06	0.12	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH006	AEC A	20 Apr 2023	0021 OTH006 230420	Normal	ACT 0021 PFASOMP 23	<0.01	0.02	0.03	0.05	0.3	0.04	<0.02	<0.02	<0.02	<0.1	0.07	0.14	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH006	AEC A	19 Oct 2023	0021 OTH006 231019	Normal	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.01	<0.01	0.1	<0.02	<0.02	<0.02	<0.02	<0.1	0.03	0.07	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	OTH006	AEC A	11 Apr 2024	0021 OTH006 240411	Normal	ACT 0021 PFASOMP 24	<0.01	<0.01	<0.01	<0.01	0.02	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	20 Apr 2017	AB SW01	Normal	JBT 0021 PFAS	0.102	2.97	3.33	6.3	7.89	0.264	0.092	0.122	0.0031	<0.002	0.0783	0.884	0.0245	0.0015	0.002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	SW001	AEC A	19 Oct 2021	0021 QC101 211019	Field_D	ACT 0021 PFASOMP 21	0.41	13.1	10.5	23.6	30.9	0.56	1.21	0.53	0.11	0.2	0.6	3.07	0.33	0.04	0.03	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	19 Oct 2021	0021 SW001 211019	Normal	ACT 0021 PFASOMP 21	0.43	12.4	9.8	22.2	29.5	0.52	1.26	0.58	0.1	0.2	0.57	3	0.33	0.04	0.03	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	05 Apr 2022	0021 QC101 220405	Field_D	ACT 0021 PFASOMP 21	0.14	3.71	2.79	6.5	8.37	0.2	0.21	0.12	<0.02	<0.1	0.15	0.97	0.08	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	05 Apr 2022	0021 SW001 220405	Normal	ACT 0021 PFASOMP 21	0.12	3.48	2.24	5.72	7.32	0.2	0.19	0.09	<0.02	<0.1	0.13	0.8	0.07	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	07 Jul 2022	0021 QC101 220707	Field_D	ACT 0021 PFASMGMT	0.15	7.77	3.38	11.2	12.7	0.14	0.24	0.16	0.04	<0.1	0.1	0.6	0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	07 Jul 2022	0021 QC201 220707	Interlab_D	ACT 0021 PFASMGMT	0.15	9	3.8	12.8	14.23	0.13	0.18	0.1	<0.01	<0.05	0.1	0.6	0.08	0.01	0.01	<0.01	<0.01	<0.01	<0.01	<0.01
0021	SW001	AEC A	07 Jul 2022	0021 SW001 220101	Normal	ACT 0021 PFASMGMT	0.17	7.68	4.03	11.7	13.4	0.15	0.29	0.18	0.03	<0.1	0.12	0.68	0.12	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	11 Oct 2022	0021 SW001 221011	Normal	ACT 0021 PFASMGMT	0.07	3.6	1.13	4.73	5.38	0.07	0.1	0.09	<0.02	<0.1	0.05	0.24	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	13 Oct 2022	0021 SW001 221013	Normal	ACT 0021 PFASOMP 21	0.12	4.91	2.41	7.32	8.54	0.12	0.19	0.12	<0.02	<0.1	0.1	0.49	0.08	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	01 Feb 2023	0021 SW001 230201	Normal	ACT 0021 PFASMGMT	0.1	4.27	2.02	6.29	7.34	0.11	0.16	0.11	0.02	<0.1	0.1	0.39	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	03 Apr 2023	0021 SW001 230403	Normal	ACT 0021 Stage4 23	0.1	4.2	2.7	6.9	7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
0021	SW001	AEC A	17 Apr 2023	0021 SW001 230417	Normal	ACT 0021 Stage4 23	0.11	4.7	2.6	7.3	7.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
0021	SW001	AEC A	20 Apr 2023	0021 SW001 230420	Normal	ACT 0021 PFASOMP 23	0.23	9.25	6.39	15.6	18.6	0.36	0.47	0.21	0.03	0.1	0.24	1.18	0.17	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	07 Aug 2023	0021 SW001 230807	Normal	ACT 0021 PFASMGMT	0.02	1.16	0.4	1.56	1.81	0.02	0.03	0.03	<0.02	<0.1	0.03	0.1	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	04 Oct 2023	0021 SW001 231004	Normal	ACT 0021 PFASMGMT	0.05	1.85	0.74	2.59	3.18	0.03	0.04	0.05	<0.02	0.2	0.02	0.18	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05
0021	SW001	AEC A	18 Oct 2023	0021 SW001 231018	Normal	ACT 0021 PFASOMP 23	0.05	2.07	1.19	3.26	3.92	0.06	0.08	0.05	<0.02	<0.1	0.07	0.31	0.04	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05

Table T9 - Historical Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	OTH004	AEC A	19 Oct 2023	0021 OTH004 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH004	AEC A	11 Apr 2024	0021 OTH004 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH005	AEC A	28 Jun 2017	A S440 SW01	Normal	JBT 0021 PFAS	<0.02	0.038	<0.02	<0.02	0.03	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH005	AEC A	13 Oct 2017	A S440 SW01	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH005	AEC A	19 Oct 2021	0021 OTH005 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH005	AEC A	05 Apr 2022	0021 OTH005 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH005	AEC A	05 Apr 2022	0021 QC102 220405	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH005	AEC A	13 Oct 2022	0021 OTH005 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH005	AEC A	13 Oct 2022	0021 QC111 221013	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH005	AEC A	13 Oct 2022	0021 QC211 221013	Interlab D	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	OTH005	AEC A	20 Apr 2023	0021 OTH005 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH005	AEC A	19 Oct 2023	0021 OTH005 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH005	AEC A	10 Apr 2024	0021 OTH005 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH006	AEC A	13 Oct 2017	A S481 SW04	Normal	JBT 0021 PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH006	AEC A	21 Oct 2021	0021 OTH006 211021	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH006	AEC A	21 Oct 2021	0021 QC110 211021	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH006	AEC A	05 Apr 2022	0021 OTH006 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH006	AEC A	13 Oct 2022	0021 OTH006 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH006	AEC A	20 Apr 2023	0021 OTH006 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH006	AEC A	19 Oct 2023	0021 OTH006 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	OTH006	AEC A	11 Apr 2024	0021 OTH006 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	20 Apr 2017	AB SW01	Normal	JBT 0021 PFAS	<0.001	0.007	<0.001	<0.001	0.013	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW001	AEC A	19 Oct 2021	0021 QC101 211019	Field D	ACT 0021 PFASOMP 21	<0.05	0.23	<0.05	<0.05	0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	19 Oct 2021	0021 SW001 211019	Normal	ACT 0021 PFASOMP 21	<0.05	0.23	<0.05	<0.05	0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	05 Apr 2022	0021 QC101 220405	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	05 Apr 2022	0021 SW001 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	07 Jul 2022	0021 QC101 220707	Field D	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	07 Jul 2022	0021 QC201 220707	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW001	AEC A	07 Jul 2022	0021 SW001 220101	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	11 Oct 2022	0021 SW001 221011	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	13 Oct 2022	0021 SW001 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	01 Feb 2023	0021 SW001 230201	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	03 Apr 2023	0021 SW001 230403	Normal	ACT 0021 Stage4 23	-	0.01	<0.02	-	-	-	-	-	-	-	-
0021	SW001	AEC A	17 Apr 2023	0021 SW001 230417	Normal	ACT 0021 Stage4 23	-	0.01	<0.02	-	-	-	-	-	-	-	-
0021	SW001	AEC A	20 Apr 2023	0021 SW001 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	07 Aug 2023	0021 SW001 230807	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	04 Oct 2023	0021 SW001 231004	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	18 Oct 2023	0021 SW001 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW001	AEC A	10 Apr 2024	0021 SW001 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW002	AEC A	20 Apr 2017	AB SW02	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	0.0019	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW002	AEC A	19 Oct 2021	0021 SW002 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW002	AEC A	05 Apr 2022	0021 SW002 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW002	AEC A	13 Oct 2022	0021 SW002 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW002	AEC A	20 Apr 2023	0021 SW002 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW002	AEC A	18 Oct 2023	0021 SW002 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW002	AEC A	11 Apr 2024	0021 SW002 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW003	AEC A	20 Apr 2017	AB SW03	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW003	AEC A	19 Oct 2021	0021 SW003 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW003	AEC A	05 Apr 2022	0021 SW003 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW003	AEC A	13 Oct 2022	0021 QC105 221013	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW003	AEC A	13 Oct 2022	0021 QC205 221013	Interlab D	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW003	AEC A	13 Oct 2022	0021 SW003 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW003	AEC A	20 Apr 2023	0021 SW003 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05

Table T9 - Historical Surface Water Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Recreational Water	10			2															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																			
0021	SW003	AEC A	11 Apr 2024	0021_SW003_240411	Normal	ACT_0021_PFASOMP_24	<0.01	0.05	0.03	0.08	0.08	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW004	AEC B	13 Apr 2017	AB_SW04	Normal	JBT_0021_PFAS	0.0006	0.0168	0.0231	0.0399	0.0464	0.0015	0.002	0.001	<0.0005	<0.002	<0.0005	0.0014	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW004	AEC B	13 Apr 2017	TNQA08	Field_D	JBT_0021_PFAS	0.0006	0.0173	0.0249	0.0422	0.0488	0.0017	0.0019	0.001	<0.0005	<0.002	<0.0005	0.0014	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW004	AEC B	26 Oct 2021	0021_SW004_211026	Normal	ACT_0021_PFASOMP_21	<0.01	<0.01	0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW004	AEC B	06 Apr 2022	0021_SW004_220406	Normal	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW004	AEC B	14 Oct 2022	0021_SW004_221014	Normal	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW004	AEC B	21 Apr 2023	0021_SW004_230421	Normal	ACT_0021_PFASOMP_23	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW004	AEC B	12 Apr 2024	0021_SW004_240412	Normal	ACT_0021_PFASOMP_24	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW005	Site drainage channels	13 Apr 2017	AB_SW05	Normal	JBT_0021_PFAS	0.001	0.0236	0.0448	0.0684	0.0794	0.0025	0.0036	0.0017	<0.0005	<0.002	<0.0005	0.0022	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW005	Site drainage channels	20 Oct 2021	0021_SW005_211020	Normal	ACT_0021_PFASOMP_21	<0.01	0.05	0.07	0.12	0.12	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW005	Site drainage channels	06 Apr 2022	0021_SW005_220406	Normal	ACT_0021_PFASOMP_21	<0.01	0.05	0.04	0.09	0.09	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW005	Site drainage channels	14 Oct 2022	0021_SW005_221014	Normal	ACT_0021_PFASOMP_21	<0.01	0.05	0.05	0.1	0.1	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW005	Site drainage channels	21 Apr 2023	0021_SW005_230421	Normal	ACT_0021_PFASOMP_23	<0.01	0.05	0.07	0.12	0.12	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW005	Site drainage channels	12 Apr 2024	0021_SW005_240412	Normal	ACT_0021_PFASOMP_24	<0.01	0.03	0.04	0.07	0.07	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW006	Site drainage channels	13 Apr 2017	AB_SW06	Normal	JBT_0021_PFAS	<0.0005	0.0243	0.0135	0.0378	0.0414	0.001	0.001	0.0007	<0.0005	<0.002	<0.0005	0.0009	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW006	Site drainage channels	20 Oct 2021	0021_SW006_211020	Normal	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW006	Site drainage channels	06 Apr 2022	0021_SW006_220406	Normal	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW006	Site drainage channels	14 Oct 2022	0021_SW006_221014	Normal	ACT_0021_PFASOMP_21	<0.01	0.02	0.03	0.05	0.05	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW006	Site drainage channels	21 Apr 2023	0021_SW006_230421	Normal	ACT_0021_PFASOMP_23	<0.01	0.02	0.04	0.06	0.06	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW006	Site drainage channels	12 Apr 2024	0021_SW006_240412	Normal	ACT_0021_PFASOMP_24	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	12 Apr 2017	B_SW01	Normal	JBT_0021_PFAS	0.0824	3.07	1.87	4.94	5.62	0.108	0.193	0.135	0.0088	<0.002	0.0128	0.11	0.0211	0.0013	0.0014	<0.0005	<0.0005	<0.0005	
0021	SW010	AEC B	01 May 2018	B_SW01_180501	Normal	JBT_0021_PFAS	0.152	4.15	4.03	8.18	9.57	0.239	0.394	0.188	0.0033	<0.002	0.0305	0.314	0.0681	0.0014	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW010	AEC B	20 Oct 2021	0021_SW010_211020	Normal	ACT_0021_PFASOMP_21	0.09	3.3	2.57	5.87	6.92	0.18	0.3	0.11	<0.02	<0.1	0.03	0.3	0.04	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW010	AEC B	22 Nov 2021	0021_SW010_211122	Normal	ACT_0021_PFASMGMT	0.02	0.6	0.74	1.34	1.55	0.05	0.06	<0.02	<0.02	<0.1	<0.02	0.08	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	07 Apr 2022	0021_SW010_220407	Normal	ACT_0021_PFASOMP_21	<0.01	0.01	<0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	12 May 2022	0021_SW010_220512	Normal	ACT_0021_PFASMGMT	<0.01	0.13	0.05	0.18	0.18	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	12 Oct 2022	0021_SW010_221012	Normal	ACT_0021_PFASOMP_21	0.09	4.79	1.7	6.49	7.23	0.08	0.11	0.11	<0.02	<0.1	0.05	0.26	0.04	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	02 Feb 2023	0021_SW010_230202	Normal	ACT_0021_PFASMGMT	<0.01	0.12	0.1	0.22	0.22	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	09 Mar 2023	0021_SW010_230309	Normal	ACT_0021_PFASMGMT	<0.01	0.19	0.07	0.26	0.26	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	19 Apr 2023	0021_SW010_230419	Normal	ACT_0021_PFASOMP_23	<0.01	0.19	0.1	0.29	0.29	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	01 May 2023	0021_SW010_230501	Normal	ACT_0021_PFASMGMT	<0.01	0.19	0.11	0.3	0.3	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	06 Jun 2023	0021_QC100_230606	Field_D	ACT_0021_PFASMGMT	0.03	1.23	1.09	2.32	2.61	0.06	0.1	0.04	<0.02	<0.1	<0.02	0.06	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	06 Jun 2023	0021_SW010_230606	Normal	ACT_0021_PFASMGMT	0.02	0.74	0.81	1.55	1.73	0.04	0.07	0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	08 Aug 2023	0021_SW010_230808	Normal	ACT_0021_PFASMGMT	0.05	2.64	1.71	4.35	4.9	0.15	0.2	0.08	<0.02	<0.1	<0.02	0.07	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	12 Dec 2023	0021_SW010_231212	Normal	ACT_0021_PFASMGMT	0.2	10.2	3.52	13.7	15	0.1	0.22	0.3	<0.02	<0.1	0.08	0.34	0.07	<0.02	<0.02	<0.02	<0.05		
0021	SW010	AEC B	10 Apr 2024	0021_SW010_240410	Normal	ACT_0021_PFASOMP_24	<0.01	0.21	0.2	0.41	0.41	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW011	AEC B	11 Apr 2017	B_SW02	Normal	JBT_0021_PFAS	0.0028	0.0846	0.151	0.236	0.279	0.0101	0.0098	0.0038	<0.0005	<0.002	<0.0005	0.0305	0.005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW011	AEC B	20 Oct 2021	0021_SW011_211020	Normal	ACT_0021_PFASOMP_21	<0.01	0.01	0.01	0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW011	AEC B	07 Apr 2022	0021_SW011_220407	Normal	ACT_0021_PFASOMP_21	<0.01	0.01	<0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW011	AEC B	12 Oct 2022	0021_SW011_221012	Normal	ACT_0021_PFASOMP_21	<0.01	0.21	0.07	0.28	0.3	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW011	AEC B	20 Apr 2023	0021_SW011_230420	Normal	ACT_0021_PFASOMP_23	<0.01	0.09	0.13	0.															

Table T9 - Historical Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	SW003	AEC A	11 Apr 2024	0021_SW003_240411	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05
0021	SW004	AEC B	13 Apr 2017	AB_SW04	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW004	AEC B	13 Apr 2017	TNQA08	Field D	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW004	AEC B	26 Oct 2021	0021_SW004_211026	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW004	AEC B	06 Apr 2022	0021_SW004_220406	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW004	AEC B	14 Oct 2022	0021_SW004_221014	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW004	AEC B	21 Apr 2023	0021_SW004_230421	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW004	AEC B	12 Apr 2024	0021_SW004_240412	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW005	Site drainage channels	13 Apr 2017	AB_SW05	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW005	Site drainage channels	20 Oct 2021	0021_SW005_211020	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW005	Site drainage channels	06 Apr 2022	0021_SW005_220406	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW005	Site drainage channels	14 Oct 2022	0021_SW005_221014	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW005	Site drainage channels	21 Apr 2023	0021_SW005_230421	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW005	Site drainage channels	12 Apr 2024	0021_SW005_240412	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW006	Site drainage channels	13 Apr 2017	AB_SW06	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW006	Site drainage channels	20 Oct 2021	0021_SW006_211020	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW006	Site drainage channels	06 Apr 2022	0021_SW006_220406	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW006	Site drainage channels	14 Oct 2022	0021_SW006_221014	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW006	Site drainage channels	21 Apr 2023	0021_SW006_230421	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW006	Site drainage channels	12 Apr 2024	0021_SW006_240412	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	12 Apr 2017	B_SW01	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	0.0046	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW010	AEC B	01 May 2018	B_SW01_180501	Normal	JBT_0021_PFAS	<0.001	0.003	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW010	AEC B	20 Oct 2021	0021_SW010_211020	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	22 Nov 2021	0021_SW010_211122	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	07 Apr 2022	0021_SW010_220407	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	12 May 2022	0021_SW010_220512	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	12 Oct 2022	0021_SW010_221012	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	02 Feb 2023	0021_SW010_230202	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	09 Mar 2023	0021_SW010_230309	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	19 Apr 2023	0021_SW010_230419	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	01 May 2023	0021_SW010_230501	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	06 Jun 2023	0021_QC100_230606	Field D	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	06 Jun 2023	0021_SW010_230606	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	08 Aug 2023	0021_SW010_230808	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	12 Dec 2023	0021_SW010_231212	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW010	AEC B	10 Apr 2024	0021_SW010_240410	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW011	AEC B	11 Apr 2017	B_SW02	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW011	AEC B	20 Oct 2021	0021_SW011_211020	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW011	AEC B	07 Apr 2022	0021_SW011_220407	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW011	AEC B	12 Oct 2022	0021_SW011_221012	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW011	AEC B	20 Apr 2023	0021_SW011_230420	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW011	AEC B	10 Apr 2024	0021_SW011_240410	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW013	Captains Lagoon	18 Apr 2017	CL_SW09	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW013	Captains Lagoon	30 Apr 2018	CL_SW09_180430	Normal	JBT_0021_PFAS	<0.001	0.004	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW013	Captains Lagoon	20 Oct 2021	0021_SW013_211020	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW013	Captains Lagoon	06 Apr 2022	0021_SW013_220406	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW013	Captains Lagoon	10 Oct 2022	0021_SW013_221010	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW013	Captains Lagoon	17 Apr 2023	0021_SW013_230417	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW013	Captains Lagoon	16 Oct 2023	0021_SW013_231016	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW013	Captains Lagoon	10 Apr 2024	0021_QC106_240410	Field D	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW013	Captains Lagoon	10 Apr 2024	0021_QC206_240410	Interlab D	ACT_0021_PFASOMP_24	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW013	Captains Lagoon	10 Apr 2024	0021_SW013_240410	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW016	Site drainage channels	13 Apr 2017	DC_SW01	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001

Table T9 - Historical Surface Water Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Recreational Water	10			2															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																			
0021	SW016	Site drainage channels	20 Oct 2021	0021 SW016 211020	Normal	ACT 0021 PFASOMP 21	<0.01	0.06	0.11	0.17	0.17	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW016	Site drainage channels	06 Apr 2022	0021 SW016 220406	Normal	ACT 0021 PFASOMP 21	<0.01	0.04	0.04	0.08	0.08	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW016	Site drainage channels	14 Oct 2022	0021 SW016 221014	Normal	ACT 0021 PFASOMP 21	<0.01	0.08	0.09	0.17	0.2	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW017	Site drainage channels	13 Apr 2017	DC SW02	Normal	JBT 0021 PFAS	0.0213	0.662	0.934	1.6	1.82	0.0459	0.0663	0.0325	0.0018	<0.002	0.0051	0.0483	0.006	<0.0005	0.0006	<0.0005	<0.0005	<0.0005	
0021	SW017	Site drainage channels	06 Apr 2022	0021 QC206 220406	Interlab D	ACT 0021 PFASOMP 21	0.03	0.77	0.47	1.2	1.4	0.02	0.03	0.02	<0.02	<0.02	<0.02	0.1	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1	
0021	SW017	Site drainage channels	06 Apr 2022	0021 SW017 220406	Normal	ACT 0021 PFASOMP 21	0.02	0.65	0.42	1.07	1.23	0.02	0.02	<0.02	<0.02	<0.1	<0.02	0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW017	Site drainage channels	14 Oct 2022	0021 SW017 221014	Normal	ACT 0021 PFASOMP 21	0.08	5.18	1.31	6.49	7.03	0.04	0.05	0.07	<0.02	<0.1	0.06	0.22	0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW018	Site drainage channels	13 Apr 2017	DC SW03	Normal	JBT 0021 PFAS	0.0021	0.0654	0.217	0.282	0.34	0.0183	0.0237	0.0041	<0.0005	<0.002	<0.0005	0.0084	0.0011	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW018	Site drainage channels	20 Oct 2021	0021 SW018 211020	Normal	ACT 0021 PFASOMP 21	<0.01	0.1	0.1	0.2	0.2	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW018	Site drainage channels	06 Apr 2022	0021 QC106 220406	Field D	ACT 0021 PFASOMP 21	<0.01	0.02	0.02	0.04	0.04	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW018	Site drainage channels	06 Apr 2022	0021 SW018 220406	Normal	ACT 0021 PFASOMP 21	<0.01	0.01	0.01	0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW018	Site drainage channels	14 Oct 2022	0021 QC207 221014	Interlab D	ACT 0021 PFASOMP 21	<0.01	0.02	0.07	0.09	0.09	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.01	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1	
0021	SW018	Site drainage channels	14 Oct 2022	0021 SW018 221014	Normal	ACT 0021 PFASOMP 21	<0.01	0.01	0.08	0.09	0.09	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW018	Site drainage channels	21 Apr 2023	0021 SW018 230421	Normal	ACT 0021 PFASOMP 23	<0.01	<0.01	0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW018	Site drainage channels	19 Oct 2023	0021 SW018 231019	Normal	ACT 0021 PFASOMP 23	<0.01	0.09	0.13	0.22	0.22	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW019	Site drainage channels	20 Apr 2017	DC SW04	Normal	JBT 0021 PFAS	0.0996	4.27	5.23	9.5	11.4	0.46	0.129	0.156	0.0023	<0.002	0.0694	0.986	0.0252	0.0016	0.0016	<0.0005	<0.0005	<0.0005	
0021	SW019	Site drainage channels	19 Oct 2021	0021 SW019 211019	Normal	ACT 0021 PFASOMP 21	0.01	0.53	0.37	0.9	1.09	0.04	0.04	<0.02	<0.02	<0.1	0.02	0.08	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW019	Site drainage channels	05 Apr 2022	0021 QC203 220405	Interlab D	ACT 0021 PFASOMP 21	0.15	5.4	2.8	8.2	10	0.25	0.25	0.16	<0.02	0.08	0.2	0.68	0.08	0.01	<0.02	<0.02	<0.05	<0.1	
0021	SW019	Site drainage channels	05 Apr 2022	0021 SW019 220405	Normal	ACT 0021 PFASOMP 21	0.12	4.57	2.6	7.17	8.96	0.25	0.23	0.16	<0.02	<0.1	0.15	0.8	0.08	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW019	Site drainage channels	07 Jul 2022	0021 SW019 220707	Normal	ACT 0021 PFASMGMT	0.11	4.19	2.12	6.31	7.35	0.13	0.18	0.14	<0.02	<0.1	0.08	0.34	0.06	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW019	Site drainage channels	13 Oct 2022	0021 SW019 221013	Normal	ACT 0021 PFASOMP 21	0.11	2.55	2.03	4.58	5.7	0.13	0.18	0.1	<0.02	<0.1	0.12	0.42	0.06	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW019	Site drainage channels	01 Feb 2023	0021 SW019 230201	Normal	ACT 0021 PFASMGMT	0.1	1.25	2.51	3.76	5.53	0.25	0.28	0.07	<0.02	0.1	0.24	0.65	0.08	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW019	Site drainage channels	20 Apr 2023	0021 SW019 230420	Normal	ACT 0021 PFASOMP 23	0.1	1.92	2.58	4.5	5.96	0.24	0.3	0.09	<0.02	<0.1	0.15	0.51	0.07	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW019	Site drainage channels	11 Apr 2024	0021 SW019 240411	Normal	ACT 0021 PFASOMP 24	0.06	1.38	1.78	3.16	4.11	0.15	0.19	0.05	<0.02	<0.1	0.08	0.32	0.05	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW020	Site drainage channels	13 Apr 2017	DC SW05	Normal	JBT 0021 PFAS	0.0153	0.297	0.368	0.665	0.812	0.0277	0.0382	0.0141	0.0006	<0.002	0.0044	0.0391	0.0071	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW020	Site drainage channels	20 Oct 2021	0021 SW020 211020	Normal	ACT 0021 PFASOMP 21	<0.01	0.14	0.32	0.46	0.57	0.04	0.04	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW020	Site drainage channels	06 Apr 2022	0021 SW020 220406	Normal	ACT 0021 PFASOMP 21	<0.01	0.02	0.03	0.05	0.05	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW020	Site drainage channels	07 Jul 2022	0021 SW020 220707	Normal	ACT 0021 PFASMGMT	<0.01	0.07	0.12	0.19	0.19	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW020	Site drainage channels	14 Oct 2022	0021 QC107 221014	Field D	ACT 0021 PFASOMP 21	0.02	0.47	0.61	1.08	1.3	0.03	0.05	<0.02	<0.02	<0.1	0.03	0.09	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW020	Site drainage channels	14 Oct 2022	0021 SW020 221014	Normal	ACT 0021 PFASOMP 21	0.02	0.44	0.46	0.9	1.08	0.02	0.04	<0.02	<0.02	<0.1	0.02	0.08	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW020	Site drainage channels	03 Feb 2023	0021 QC205 230203	Interlab D	ACT 0021 PFASMGMT	<0.01	0.45	0.54	0.99	1.25	0.06	0.06	0.01	<0.01	<0.05	0.03	0.08	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	
0021	SW020	Site drainage channels	03 Feb 2023	0021 SW020 230203	Normal	ACT 0021 PFASMGMT	0.01	0.35	0.53	0.88	1.1	0.05	0.06	<0.02	<0.02	<0.1	0.02	0.08	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW020	Site drainage channels	21 Apr 2023	0021 SW020 230421	Normal	ACT 0021 PFASOMP 23	0.02	0.62	0.66	1.28	1.59	0.05	0.07	0.02	<0.02	<0.1	0.03	0.12	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW020	Site drainage channels	12 Apr 2024	0021 SW020 240412	Normal	ACT 0021 PFASOMP 24	<0.01	0.25	0.38	0.63	0.74	0.04	0.04	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW021	Site drainage channels	13 Apr 2017	DC SW06	Normal	JBT 0021 PFAS	0.0937	0.747	0.762	1.51	2.33	0.128	0.191	0.0955	0.0038	<0.002	0.0261	0.229	0.042	0.0042	0.0039	0.001	<0.0005	<0.0005	
0021	SW021	Site drainage channels	20 Oct 2021	0021 SW021 211020	Normal	ACT 0021 PFASOMP 21	0.07	1.02	1.66	2.68	3.54	0.14	0.19	0.06	<0.02	<0.1	0.07	0.29	0.04	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW021	Site drainage channels	06 Apr 2022	0021 SW021 220406	Normal	ACT 0021 PFASOMP 21	<0.01	0.15	0.05	0.2	0.2	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW021	Site drainage channels	07 Jul 2022	0021 SW021 220707	Normal	ACT 0021 PFASMGMT	0.02	0.65	0.45	1.1	1.3	0.03	0.04	0.03	<0.02	<0.1	<0.02	0.08	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW021	Site drainage channels	14 Oct 2022	0021 SW021 221014	Normal	ACT 0021 PFASOMP 21	0.03	0.79	0.64	1.43	1.74	0.03	0.04	0.03	<0.02	<0.1	0.04	0.14	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW021	Site drainage channels	12 Apr 2024	0021 SW021 240412	Normal	ACT 002																			

Table T9 - Historical Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
LOR	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	SW016	Site drainage channels	20 Oct 2021	0021_SW016_211020	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW016	Site drainage channels	06 Apr 2022	0021_SW016_220406	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW016	Site drainage channels	14 Oct 2022	0021_SW016_221014	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW017	Site drainage channels	13 Apr 2017	DC_SW02	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	0.0008	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW017	Site drainage channels	06 Apr 2022	0021_QC206_220406	Interlab_D	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW017	Site drainage channels	06 Apr 2022	0021_SW017_220406	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW017	Site drainage channels	14 Oct 2022	0021_SW017_221014	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW018	Site drainage channels	13 Apr 2017	DC_SW03	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW018	Site drainage channels	20 Oct 2021	0021_SW018_211020	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW018	Site drainage channels	06 Apr 2022	0021_QC106_220406	Field_D	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW018	Site drainage channels	06 Apr 2022	0021_SW018_220406	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW018	Site drainage channels	14 Oct 2022	0021_QC207_221014	Interlab_D	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW018	Site drainage channels	14 Oct 2022	0021_SW018_221014	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW018	Site drainage channels	21 Apr 2023	0021_SW018_230421	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW018	Site drainage channels	19 Oct 2023	0021_SW018_231019	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW019	Site drainage channels	20 Apr 2017	DC_SW04	Normal	JBT_0021_PFAS	<0.001	0.003	<0.001	<0.001	0.0051	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW019	Site drainage channels	19 Oct 2021	0021_SW019_211019	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW019	Site drainage channels	05 Apr 2022	0021_QC203_220405	Interlab_D	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW019	Site drainage channels	05 Apr 2022	0021_SW019_220405	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW019	Site drainage channels	07 Jul 2022	0021_SW019_220707	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW019	Site drainage channels	13 Oct 2022	0021_SW019_221013	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW019	Site drainage channels	01 Feb 2023	0021_SW019_230201	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW019	Site drainage channels	20 Apr 2023	0021_SW019_230420	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW019	Site drainage channels	11 Apr 2024	0021_SW019_240411	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW020	Site drainage channels	13 Apr 2017	DC_SW05	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	0.0006	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW020	Site drainage channels	20 Oct 2021	0021_SW020_211020	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW020	Site drainage channels	06 Apr 2022	0021_SW020_220406	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW020	Site drainage channels	07 Jul 2022	0021_SW020_220707	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW020	Site drainage channels	14 Oct 2022	0021_QC107_221014	Field_D	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW020	Site drainage channels	14 Oct 2022	0021_SW020_221014	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW020	Site drainage channels	03 Feb 2023	0021_QC205_230203	Interlab_D	ACT_0021_PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW020	Site drainage channels	03 Feb 2023	0021_SW020_230203	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW020	Site drainage channels	21 Apr 2023	0021_SW020_230421	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW020	Site drainage channels	12 Apr 2024	0021_SW020_240412	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW021	Site drainage channels	13 Apr 2017	DC_SW06	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	0.0038	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW021	Site drainage channels	20 Oct 2021	0021_SW021_211020	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW021	Site drainage channels	06 Apr 2022	0021_SW021_220406	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW021	Site drainage channels	07 Jul 2022	0021_SW021_220707	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW021	Site drainage channels	14 Oct 2022	0021_SW021_221014	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW021	Site drainage channels	12 Apr 2024	0021_SW021_240412	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW022	Flat Rock Creek	19 Apr 2017	FC_SW06	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW022	Flat Rock Creek	20 Oct 2021	0021_QC208_211020	Interlab_D	ACT_0021_PFASOMP_21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW022	Flat Rock Creek	20 Oct 2021	0021_SW022_211020	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW022	Flat Rock Creek	07 Apr 2022	0021_SW022_220407	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW022	Flat Rock Creek	12 Oct 2022	0021_SW022_221012	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW022	Flat Rock Creek	19 Apr 2023	0021_SW022_230419	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW022	Flat Rock Creek	18 Oct 2023	0021_SW022_231018	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW022	Flat Rock Creek	10 Apr 2024	0021_SW022_240410	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW024	Flat Rock Creek	19 Apr 2017	FC_SW08	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW024	Flat Rock Creek	19 Apr 2017	JCQA03	Field_D	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW024	Flat Rock Creek	20 Oct 2021	0021_SW024_211020	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW024	Flat Rock Creek	07 Apr 2022	0021_SW024_220407	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW024	Flat Rock Creek	13 Oct 2022	0021_SW024_221013	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05

Table T9 - Historical Surface Water Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Recreational Water	10			2															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																									

Table T9 - Historical Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	SW024	Flat Rock Creek	19 Apr 2023	0021_SW024_230419	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW024	Flat Rock Creek	10 Apr 2024	0021_SW024_240410	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW025	Flat Rock Creek	20 Apr 2017	FC_SW09	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW025	Flat Rock Creek	26 Oct 2021	0021_SW025_211026	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW025	Flat Rock Creek	07 Apr 2022	0021_SW025_220407	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW025	Flat Rock Creek	13 Oct 2022	0021_SW025_221013	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW025	Flat Rock Creek	19 Apr 2023	0021_SW025_230419	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW025	Flat Rock Creek	10 Apr 2024	0021_SW025_240410	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW027	AEC C	19 Apr 2017	FC_SW11	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW027	AEC C	21 Oct 2021	0021_SW027_211021	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW027	AEC C	06 Apr 2022	0021_SW027_220406	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW027	AEC C	12 Oct 2022	0021_SW027_221012	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW027	AEC C	20 Apr 2023	0021_SW027_230420	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW027	AEC C	10 Apr 2024	0021_SW027_240410	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW032	Lake McKenzie	27 Jul 2017	LM_SD01	Field D	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW032	Lake McKenzie	27 Jul 2017	LM_SW01	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW032	Lake McKenzie	25 Aug 2017	LM_SW01	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW032	Lake McKenzie	14 May 2018	LM_SW01_180514	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW032	Lake McKenzie	12 Feb 2019	LM_SW01_190212	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW032	Lake McKenzie	18 Mar 2019	LM_SW01_190318	Normal	JBT_0021_PFAS	<0.002	<0.002	<0.002	<0.002	<0.0020	<0.005	<0.0020	<0.005	<0.005	<0.0020	<0.005
0021	SW032	Lake McKenzie	21 Oct 2021	0021_SW032_211021	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW032	Lake McKenzie	05 Apr 2022	0021_SW032_220405	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW032	Lake McKenzie	10 Oct 2022	0021_SW032_221010	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW032	Lake McKenzie	18 Apr 2023	0021_SW032_230418	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW032	Lake McKenzie	17 Oct 2023	0021_SW032_231017	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW032	Lake McKenzie	09 Apr 2024	0021_SW032_240409	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW034	Lake McKenzie	27 Jul 2017	LM_SW03	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW034	Lake McKenzie	25 Aug 2017	LM_SW03	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW034	Lake McKenzie	14 May 2018	LM_SW03_180514	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW034	Lake McKenzie	12 Feb 2019	LM_QC106_190212	Field D	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW034	Lake McKenzie	12 Feb 2019	LM_SW03_190212	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW034	Lake McKenzie	18 Mar 2019	LM_SW03_190318	Normal	JBT_0021_PFAS	<0.002	<0.002	<0.002	<0.002	<0.0020	<0.005	<0.0020	<0.005	<0.005	<0.0020	<0.005
0021	SW034	Lake McKenzie	21 Oct 2021	0021_SW034_211021	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW034	Lake McKenzie	05 Apr 2022	0021_SW034_220405	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW034	Lake McKenzie	10 Oct 2022	0021_SW034_221010	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW034	Lake McKenzie	18 Apr 2023	0021_SW034_230418	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW034	Lake McKenzie	17 Oct 2023	0021_SW034_231017	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW034	Lake McKenzie	09 Apr 2024	0021_SW034_240409	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW035	Lake McKenzie	27 Jul 2017	LM_SW04	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW035	Lake McKenzie	25 Aug 2017	LM_SW04	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW035	Lake McKenzie	25 Aug 2017	TNQA101	Field D	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW035	Lake McKenzie	11 Feb 2019	LM_SW04_190211	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW035	Lake McKenzie	18 Mar 2019	LM_QC101_190318	Field D	JBT_0021_PFAS	<0.002	<0.002	<0.002	<0.002	<0.0020	<0.005	<0.0020	<0.005	<0.005	<0.0020	<0.005
0021	SW035	Lake McKenzie	18 Mar 2019	LM_SW04_190318	Normal	JBT_0021_PFAS	<0.002	<0.002	<0.002	<0.002	<0.0020	<0.005	<0.0020	<0.005	<0.005	<0.0020	<0.005
0021	SW035	Lake McKenzie	22 Oct 2021	0021_SW035_211022	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW035	Lake McKenzie	05 Apr 2022	0021_SW035_220405	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW035	Lake McKenzie	10 Oct 2022	0021_SW035_221010	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW035	Lake McKenzie	18 Apr 2023	0021_SW035_230418	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW035	Lake McKenzie	10 Apr 2024	0021_SW035_240410	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW036	Lake Windermere	27 Jul 2017	LW_SW01	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW036	Lake Windermere	25 Aug 2017	LW_SW01	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW036	Lake Windermere	14 May 2018	LW_SW01_180514	Normal	JBT_0021_PFAS	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW036	Lake Windermere	12 Feb 2019	LW_SW01_190212	Normal	JBT_0021_PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001

[illegible]

[illegible]

Table T9 - Historical Surface Water Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Recreational Water	10			2															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																			
0021	SW045	Mary Creek	11 Oct 2022	0021 SW045 221011	Normal	ACT 0021 PFASOMP 21	<0.01	0.01	<0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW045	Mary Creek	18 Apr 2023	0021 SW045 230418	Normal	ACT 0021 PFASOMP 23	<0.01	<0.01	0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW045	Mary Creek	17 Oct 2023	0021 QC102 231017	Field_D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW045	Mary Creek	17 Oct 2023	0021 QC202 231017	Interlab_D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.01	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1	
0021	SW045	Mary Creek	17 Oct 2023	0021 SW045 231017	Normal	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW045	Mary Creek	09 Apr 2024	0021 SW045 240409	Normal	ACT 0021 PFASOMP 24	<0.01	0.02	0.03	0.05	0.05	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW048	Mary Creek	06 Apr 2018	MC SW06 180406	Normal	JBT 0021 PFAS	<0.0005	0.014	0.0097	0.0237	0.0248	<0.0005	0.0006	<0.0005	<0.0005	<0.002	<0.0005	0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW048	Mary Creek	12 Oct 2022	0021 SW048 221012	Normal	ACT 0021 PFASOMP 21	<0.01	0.21	0.01	0.22	0.22	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW048	Mary Creek	19 Apr 2023	0021 SW048 230419	Normal	ACT 0021 PFASOMP 23	<0.01	0.18	0.08	0.26	0.26	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW048	Mary Creek	18 Oct 2023	0021 SW048 231018	Normal	ACT 0021 PFASOMP 23	<0.01	0.02	<0.01	0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW048	Mary Creek	10 Apr 2024	0021 SW048 240410	Normal	ACT 0021 PFASOMP 24	<0.01	0.03	0.06	0.09	0.09	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW051	Mary Creek	28 Mar 2018	MC QC109 180328	Field_D	JBT 0021 PFAS	<0.0005	0.0005	<0.0005	0.0005	0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW051	Mary Creek	28 Mar 2018	MC SW09 180328	Normal	JBT 0021 PFAS	<0.0005	0.0005	<0.0005	0.0005	0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW051	Mary Creek	12 May 2022	0021 SW051 220512	Normal	ACT 0021 PFASMGMT	<0.01	0.25	0.1	0.35	0.35	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW052	Mary Creek	20 Mar 2018	MC SW10 180320	Normal	JBT 0021 PFAS	<0.0005	0.0014	0.0005	0.0019	0.0019	<0.0005	<0.0005	<0.0005	<0.0005	<0.002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW052	Mary Creek	28 Mar 2018	MC SW10 180328	Normal	JBT 0021 PFAS	0.0232	0.902	0.659	1.56	1.73	0.0202	0.0521	0.0344	<0.0005	<0.002	0.0027	0.032	0.0045	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW052	Mary Creek	12 May 2022	0021 SW052 220512	Normal	ACT 0021 PFASMGMT	<0.01	0.47	0.2	0.67	0.67	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW052	Mary Creek	12 Oct 2022	0021 SW052 221012	Normal	ACT 0021 PFASOMP 21	<0.01	0.02	<0.01	0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW052	Mary Creek	18 Apr 2023	0021 SW052 230418	Normal	ACT 0021 PFASOMP 23	<0.01	0.3	0.11	0.41	0.41	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW052	Mary Creek	17 Oct 2023	0021 SW052 231017	Normal	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW052	Mary Creek	09 Apr 2024	0021 SW052 240409	Normal	ACT 0021 PFASOMP 24	0.01	<0.01	0.35	0.35	0.39	<0.02	<0.02	0.03	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	30 Apr 2018	MC SW11 180430	Normal	JBT 0021 PFAS	0.135	2.36	4.23	6.59	7.66	0.174	0.385	0.145	0.0024	<0.002	0.0112	0.176	0.0448	<0.002	<0.002	<0.002	<0.002	<0.005	
0021	SW053	Mary Creek	12 May 2022	0021 SW053 220512	Normal	ACT 0021 PFASMGMT	0.02	1.25	0.44	1.69	1.81	<0.02	0.03	0.03	<0.02	<0.1	<0.02	0.04	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	11 Oct 2022	0021 SW053 221011	Normal	ACT 0021 PFASOMP 21	0.02	0.75	0.26	1.01	1.07	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.04	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	02 Feb 2023	0021 SW053 230202	Normal	ACT 0021 PFASMGMT	0.06	1.28	2.42	3.7	4.15	0.09	0.17	0.1	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	09 Mar 2023	0021 QC200 230309	Interlab_D	ACT 0021 PFASMGMT	0.05	1.2	1.3	2.5	2.79	0.04	0.06	0.05	<0.01	<0.05	<0.01	0.07	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	
0021	SW053	Mary Creek	09 Mar 2023	0021 SW053 230309	Normal	ACT 0021 PFASMGMT	0.04	1.01	1	2.01	2.32	0.04	0.07	0.1	<0.02	<0.1	<0.02	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	18 Apr 2023	0021 QC101 230418	Field_D	ACT 0021 PFASOMP 23	0.02	0.93	0.7	1.63	1.74	<0.02	0.04	0.03	<0.02	<0.1	<0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	18 Apr 2023	0021 QC201 230418	Interlab_D	ACT 0021 PFASOMP 23	0.03	1	0.69	1.7	1.9	0.02	0.04	0.05	<0.02	<0.02	<0.02	0.05	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1	
0021	SW053	Mary Creek	18 Apr 2023	0021 SW053 230418	Normal	ACT 0021 PFASOMP 23	0.03	0.91	0.48	1.39	1.52	<0.02	0.03	0.03	<0.02	<0.1	<0.02	0.04	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	01 May 2023	0021 SW053 230501	Normal	ACT 0021 PFASMGMT	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	06 Jun 2023	0021 QC200 20230606	Interlab_D	ACT 0021 PFASMGMT	0.02	0.55	0.47	1.02	1.17	0.02	0.03	0.02	<0.01	<0.05	0.01	0.05	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	
0021	SW053	Mary Creek	06 Jun 2023	0021 SW053 230606	Normal	ACT 0021 PFASMGMT	0.02	0.67	0.59	1.26	1.41	<0.02	0.04	0.03	<0.02	<0.1	<0.02	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	08 Aug 2023	0021 QC200 230808	Interlab_D	ACT 0021 PFASMGMT	0.05	0.92	1.4	2.32	2.68	0.07	0.12	0.06	<0.01	<0.05	<0.01	0.03	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	
0021	SW053	Mary Creek	08 Aug 2023	0021 SW053 230808	Normal	ACT 0021 PFASMGMT	0.04	0.95	1.4	2.35	2.7	0.07	0.14	0.07	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	17 Oct 2023	0021 SW053 231017	Normal	ACT 0021 PFASOMP 23	0.02	0.54	0.54	1.08	1.22	0.02	0.04	0.03	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	12 Dec 2023	0021 QC100 231212	Field_D	ACT 0021 PFASMGMT	0.05	1.21	0.95	2.16	2.44	0.03	0.06	0.06	<0.02	<0.1	<0.02	0.08	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	12 Dec 2023	0021 SW053 231212	Normal	ACT 0021 PFASMGMT	0.05	1.17	0.9	2.07	2.34	0.03	0.06	0.06	<0.02	<0.1	<0.02	0.07	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW053	Mary Creek	09 Apr 2024	0021 QC103 240409	Field_D	ACT 0021 PFASOMP 24	0.04	1.73	1.08	2.81	3.05	0.04	0.06	0.06	<0.02	<0.1	<0.02	0.04	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	

Table T9 - Historical Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
LOR	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	SW045	Mary Creek	11 Oct 2022	0021 SW045 221011	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW045	Mary Creek	18 Apr 2023	0021 SW045 230418	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW045	Mary Creek	17 Oct 2023	0021 QC102 231017	Field D	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW045	Mary Creek	17 Oct 2023	0021 QC202 231017	Interlab D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW045	Mary Creek	17 Oct 2023	0021 SW045 231017	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW045	Mary Creek	09 Apr 2024	0021 SW045 240409	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW048	Mary Creek	06 Apr 2018	MC SW06 180406	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW048	Mary Creek	12 Oct 2022	0021 SW048 221012	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW048	Mary Creek	19 Apr 2023	0021 SW048 230419	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW048	Mary Creek	18 Oct 2023	0021 SW048 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW048	Mary Creek	10 Apr 2024	0021 SW048 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW051	Mary Creek	28 Mar 2018	MC QC109 180328	Field D	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW051	Mary Creek	28 Mar 2018	MC SW09 180328	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW051	Mary Creek	12 May 2022	0021 SW051 220512	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW052	Mary Creek	20 Mar 2018	MC SW10 180320	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW052	Mary Creek	28 Mar 2018	MC SW10 180328	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW052	Mary Creek	12 May 2022	0021 SW052 220512	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW052	Mary Creek	12 Oct 2022	0021 SW052 221012	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW052	Mary Creek	18 Apr 2023	0021 SW052 230418	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW052	Mary Creek	17 Oct 2023	0021 SW052 231017	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW052	Mary Creek	09 Apr 2024	0021 SW052 240409	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	30 Apr 2018	MC SW11 180430	Normal	JBT 0021 PFAS	<0.002	<0.002	<0.002	<0.002	<0.002	<0.005	<0.002	<0.005	<0.005	<0.002	<0.005
0021	SW053	Mary Creek	12 May 2022	0021 SW053 220512	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	11 Oct 2022	0021 SW053 221011	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	02 Feb 2023	0021 SW053 230202	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	09 Mar 2023	0021 QC200 230309	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW053	Mary Creek	09 Mar 2023	0021 SW053 230309	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	18 Apr 2023	0021 QC101 230418	Field D	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	18 Apr 2023	0021 QC201 230418	Interlab D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW053	Mary Creek	18 Apr 2023	0021 SW053 230418	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	01 May 2023	0021 SW053 230501	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	06 Jun 2023	0021 QC200 20230606	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW053	Mary Creek	06 Jun 2023	0021 SW053 230606	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	08 Aug 2023	0021 QC200 230808	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW053	Mary Creek	08 Aug 2023	0021 SW053 230808	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	17 Oct 2023	0021 SW053 231017	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	12 Dec 2023	0021 QC100 231212	Field D	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	12 Dec 2023	0021 SW053 231212	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	09 Apr 2024	0021 QC103 240409	Field D	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW053	Mary Creek	09 Apr 2024	0021 SW053 240409	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW056	Summercloud Creek	23 Mar 2018	SC SW01 180323	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW056	Summercloud Creek	12 Oct 2022	0021 SW056 221012	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW056	Summercloud Creek	18 Apr 2023	0021 SW056 230418	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW056	Summercloud Creek	17 Oct 2023	0021 SW056 231017	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW056	Summercloud Creek	09 Apr 2024	0021 SW056 240409	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW057	Summercloud Creek	23 Mar 2018	SC QC106 180323	Field D	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW057	Summercloud Creek	23 Mar 2018	SC SW02 180323	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW057	Summercloud Creek	12 Oct 2022	0021 QC102 221012	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW057	Summercloud Creek	12 Oct 2022	0021 SW057 221012	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW057	Summercloud Creek	18 Apr 2023	0021 SW057 230418	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW057	Summercloud Creek	17 Oct 2023	0021 SW057 231017	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW057	Summercloud Creek	09 Apr 2024	0021 SW057 240409	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW058	Summercloud Creek	23 Mar 2018	SC SW03 180323	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001

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Table T9 - Historical Surface Water Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Recreational Water	10			2															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																														

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Table T9 - Historical Surface Water Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Recreational Water	10			2															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																			
0021	SW083	Ryan's Swamp	09 Apr 2024	0021 SW083 240409	Normal	ACT 0021 PFASOMP 24	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW085	Summercloud Creek	28 Mar 2018	UN3 SW05 180328	Normal	JBT 0021 PFAS	<0.0005	0.0006	<0.0005	0.0006	0.0006	<0.0005	<0.0005	<0.0005	<0.0005	<0.002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW085	Summercloud Creek	12 Oct 2022	0021 SW085 221012	Normal	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW085	Summercloud Creek	18 Apr 2023	0021 SW085 230418	Normal	ACT 0021 PFASOMP 23	<0.01	0.01	<0.01	0.01	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW085	Summercloud Creek	17 Oct 2023	0021 SW085 231017	Normal	ACT 0021 PFASOMP 23	<0.01	0.01	0.01	0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW085	Summercloud Creek	09 Apr 2024	0021 SW085 240409	Normal	ACT 0021 PFASOMP 24	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW110	AEC A	04 Aug 2020	0021 QC101 200804	Field D	ACT 0021 PFASMGMT	0.004	0.148	0.117	0.265	0.311	0.0041	0.0072	0.0049	<0.0005	0.002	0.004	0.0178	0.002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	
0021	SW110	AEC A	04 Aug 2020	0021 QC201 200804	Interlab D	ACT 0021 PFASMGMT	0.003	0.12	0.004	0.124	0.165	0.005	0.008	0.006	<0.001	<0.005	0.003	0.013	0.001	<0.001	<0.001	<0.001	<0.001	<0.001	
0021	SW110	AEC A	04 Aug 2020	0021 SW110 200804	Normal	ACT 0021 PFASMGMT	0.0037	0.147	0.108	0.255	0.302	0.0053	0.0091	0.0046	<0.0016	<0.002	0.0054	0.0176	0.0016	<0.0016	<0.0016	<0.0016	<0.0016	<0.0040	
0021	SW110	AEC A	10 Aug 2020	0021 QC109 200810	Field D	ACT 0021 PFASMGMT	0.0437	1.37	0.546	1.92	2.21	0.0272	0.0397	0.0366	0.0015	<0.002	0.0235	0.108	0.0118	0.0015	0.0005	<0.0005	<0.0005	<0.0005	
0021	SW110	AEC A	10 Aug 2020	0021 QC209 200810	Interlab D	ACT 0021 PFASMGMT	0.026	1	0.66	1.66	1.915	0.019	0.03	0.053	<0.001	0.007	0.021	0.076	0.014	0.001	<0.001	<0.001	<0.001	<0.001	
0021	SW110	AEC A	10 Aug 2020	0021 SW110 200810	Normal	ACT 0021 PFASMGMT	0.0368	1.25	0.53	1.78	2.06	0.0275	0.0381	0.0339	<0.0005	<0.002	0.0253	0.105	0.0122	0.0013	0.0005	<0.0005	<0.0005	<0.0005	
0021	SW110	AEC A	19 Oct 2021	0021 SW110 211019	Normal	ACT 0021 PFASOMP 21	<0.01	0.16	0.05	0.21	0.21	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW110	AEC A	22 Nov 2021	0021 QC100 211122	Field D	ACT 0021 PFASMGMT	0.02	0.77	0.31	1.08	1.21	0.02	0.02	<0.02	<0.02	<0.1	<0.02	0.07	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW110	AEC A	22 Nov 2021	0021 SW110 211122	Normal	ACT 0021 PFASMGMT	0.01	0.55	0.29	0.84	0.97	0.03	0.02	<0.02	<0.02	<0.1	<0.02	0.07	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW110	AEC A	05 Apr 2022	0021 SW110 220405	Normal	ACT 0021 PFASOMP 21	<0.01	0.32	0.15	0.47	0.5	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW110	AEC A	13 Oct 2022	0021 SW110 221013	Normal	ACT 0021 PFASOMP 21	0.01	0.96	0.2	1.16	1.2	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW110	AEC A	20 Apr 2023	0021 QC111 230420	Field D	ACT 0021 PFASOMP 23	<0.01	0.48	0.16	0.64	0.67	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.03	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW110	AEC A	20 Apr 2023	0021 QC211 230420	Interlab D	ACT 0021 PFASOMP 23	0.01	0.39	0.18	0.57	0.64	<0.01	0.01	0.02	<0.02	<0.02	0.03	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1	<0.5	
0021	SW110	AEC A	20 Apr 2023	0021 SW110 230420	Normal	ACT 0021 PFASOMP 23	<0.01	0.32	0.12	0.44	0.46	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW110	AEC A	19 Oct 2023	0021 SW110 231019	Normal	ACT 0021 PFASOMP 23	0.08	3	1.07	4.07	4.78	0.06	0.08	0.1	<0.02	<0.1	0.06	0.29	0.04	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW110	AEC A	10 Apr 2024	0021 QC110 240410	Field D	ACT 0021 PFASOMP 24	0.02	0.72	0.46	1.18	1.37	0.03	0.04	<0.02	<0.02	<0.1	<0.02	0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW110	AEC A	10 Apr 2024	0021 QC210 240410	Interlab D	ACT 0021 PFASOMP 24	0.02	0.61	0.41	1	1.2	0.02	0.04	<0.01	<0.02	<0.02	<0.02	0.1	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1	
0021	SW110	AEC A	10 Apr 2024	0021 SW110 240410	Normal	ACT 0021 PFASOMP 24	0.02	0.7	0.46	1.16	1.33	0.03	0.04	<0.02	<0.02	<0.1	<0.02	0.08	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW111	AEC A	10 Aug 2020	0021 SW111 200810	Normal	ACT 0021 PFASMGMT	0.0725	3.17	1.96	5.13	6.1	0.112	0.143	0.0688	0.0022	0.04	0.0768	0.397	0.0434	0.0038	0.001	<0.0005	<0.0005	<0.0005	
0021	SW111	AEC A	06 Apr 2022	0021 SW111 220406	Normal	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW111	AEC A	13 Oct 2022	0021 SW111 221013	Normal	ACT 0021 PFASOMP 21	0.01	0.12	0.1	0.22	0.46	0.05	<0.02	<0.02	<0.02	<0.1	0.05	0.13	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW111	AEC A	20 Apr 2023	0021 SW111 230420	Normal	ACT 0021 PFASOMP 23	<0.01	0.08	0.07	0.15	0.28	0.02	<0.02	<0.02	<0.02	<0.1	0.03	0.08	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW112	AEC A	04 Aug 2020	0021 SW112 200804	Normal	ACT 0021 PFASMGMT	0.0037	0.0926	0.0936	0.186	0.226	0.0061	0.0074	0.0035	<0.0016	<0.002	0.0035	0.016	<0.0016	<0.0016	<0.0016	<0.0016	<0.0016	<0.0040	
0021	SW112	AEC A	19 Oct 2021	0021 SW112 211019	Normal	ACT 0021 PFASOMP 21	<0.01	0.11	0.05	0.16	0.16	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW112	AEC A	05 Apr 2022	0021 SW112 220405	Normal	ACT 0021 PFASOMP 21	<0.01	0.16	0.1	0.26	0.28	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW112	AEC A	13 Oct 2022	0021 SW112 221013	Normal	ACT 0021 PFASOMP 21	<0.01	0.19	0.15	0.34	0.36	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW112	AEC A	20 Apr 2023	0021 SW112 230420	Normal	ACT 0021 PFASOMP 23	<0.01	0.31	0.09	0.4	0.4	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW112	AEC A	18 Oct 2023	0021 SW112 231018	Normal	ACT 0021 PFASOMP 23	<0.01	0.04	0.09	0.13	0.13	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW112	AEC A	10 Apr 2024	0021 SW112 240410	Normal	ACT 0021 PFASOMP 24	<0.01	0.36	0.12	0.48	0.48	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW126	Site drainage channels	20 Aug 2020	0021 SW126 200820	Normal	ACT 0021 PFASMGMT	0.213	3.7	3.06	6.76	10.2	0.295	0.532	0.257	0.0083	0.133	0.556	1.19	0.192	0.0149	0.0058	0.001	<0.0005	<0.0005	
0021	SW126	Site drainage channels	19 Oct 2021	0021 SW126 211019	Normal	ACT 0021 PFASOMP 21	0.07	1.37	1.67	3.04	4.38	0.17	0.18	0.06	<0.02	<0.1	0.33	0.44	0.09	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW126	Site drainage channels	05 Apr 2022	0021 SW126 220405	Normal	ACT 0021 PFASOMP 21	0.05	0.61	1.35	1.96	3.16	0.13	0.15	0.05	<0.02	<0.1	0.21	0.55	0.06	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW126	Site drainage channels	13 Oct 2022	0021 SW126 221013	Normal	ACT 0021 PFASOMP 21	0.05	0.64	0.97	1.61	2.28	0.07	0.09	0.03	<0.02	<0.1	0.13	0.26	0.04	<0.02	<0.02	<0.02	<0.02	<0.05	

Table T9 - Historical Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	SW083	Ryan's Swamp	09 Apr 2024	0021 SW083 240409	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05
0021	SW085	Summercloud Creek	28 Mar 2018	UN3 SW05 180328	Normal	JBT 0021 PFAS	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001
0021	SW085	Summercloud Creek	12 Oct 2022	0021 SW085 221012	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW085	Summercloud Creek	18 Apr 2023	0021 SW085 230418	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW085	Summercloud Creek	17 Oct 2023	0021 SW085 231017	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW085	Summercloud Creek	09 Apr 2024	0021 SW085 240409	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	04 Aug 2020	0021 QC101 200804	Field D	ACT 0021 PFASMGMT	<0.001	<0.001	<0.001	<0.001	<0.0005	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW110	AEC A	04 Aug 2020	0021 QC201 200804	Interlab D	ACT 0021 PFASMGMT	<0.001	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
0021	SW110	AEC A	04 Aug 2020	0021 SW110 200804	Normal	ACT 0021 PFASMGMT	<0.002	<0.002	<0.002	<0.002	<0.0016	<0.004	<0.0016	<0.004	<0.004	<0.0016	<0.004
0021	SW110	AEC A	10 Aug 2020	0021 QC109 200810	Field D	ACT 0021 PFASMGMT	<0.001	<0.001	<0.001	<0.001	0.001	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW110	AEC A	10 Aug 2020	0021 QC209 200810	Interlab D	ACT 0021 PFASMGMT	<0.001	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
0021	SW110	AEC A	10 Aug 2020	0021 SW110 200810	Normal	ACT 0021 PFASMGMT	<0.001	<0.001	<0.001	<0.001	0.0008	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW110	AEC A	19 Oct 2021	0021 SW110 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	22 Nov 2021	0021 QC100 211122	Field D	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	22 Nov 2021	0021 SW110 211122	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	05 Apr 2022	0021 SW110 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	13 Oct 2022	0021 SW110 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	20 Apr 2023	0021 QC111 230420	Field D	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	20 Apr 2023	0021 QC211 230420	Interlab D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW110	AEC A	20 Apr 2023	0021 SW110 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	19 Oct 2023	0021 SW110 231019	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	10 Apr 2024	0021 QC110 240410	Field D	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW110	AEC A	10 Apr 2024	0021 QC210 240410	Interlab D	ACT 0021 PFASOMP 24	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW110	AEC A	10 Apr 2024	0021 SW110 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW111	AEC A	10 Aug 2020	0021 SW111 200810	Normal	ACT 0021 PFASMGMT	<0.001	0.001	<0.001	<0.001	0.0106	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW111	AEC A	06 Apr 2022	0021 SW111 220406	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW111	AEC A	13 Oct 2022	0021 SW111 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW111	AEC A	20 Apr 2023	0021 SW111 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW112	AEC A	04 Aug 2020	0021 SW112 200804	Normal	ACT 0021 PFASMGMT	<0.002	<0.002	<0.002	<0.002	<0.0016	<0.004	<0.0016	<0.004	<0.004	<0.0016	<0.004
0021	SW112	AEC A	19 Oct 2021	0021 SW112 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW112	AEC A	05 Apr 2022	0021 SW112 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW112	AEC A	13 Oct 2022	0021 SW112 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW112	AEC A	20 Apr 2023	0021 SW112 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW112	AEC A	18 Oct 2023	0021 SW112 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW112	AEC A	10 Apr 2024	0021 SW112 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW126	Site drainage channels	20 Aug 2020	0021 SW126 200820	Normal	ACT 0021 PFASMGMT	<0.001	0.069	0.003	<0.001	0.0055	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW126	Site drainage channels	19 Oct 2021	0021 SW126 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW126	Site drainage channels	05 Apr 2022	0021 SW126 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW126	Site drainage channels	13 Oct 2022	0021 SW126 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW126	Site drainage channels	20 Apr 2023	0021 SW126 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW126	Site drainage channels	18 Oct 2023	0021 SW126 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW126	Site drainage channels	11 Apr 2024	0021 QC114 240411	Field D	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW126	Site drainage channels	11 Apr 2024	0021 QC214 240411	Interlab D	ACT 0021 PFASOMP 24	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW126	Site drainage channels	11 Apr 2024	0021 SW126 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	20 Aug 2020	0021 QC122 200820	Field D	ACT 0021 PFASMGMT	<0.001	0.009	<0.001	<0.001	0.0164	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW127	AEC B	20 Aug 2020	0021 SW127 200820	Normal	ACT 0021 PFASMGMT	<0.001	0.008	<0.001	<0.001	0.0051	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW127	AEC B	20 Oct 2021	0021 QC105 211020	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	20 Oct 2021	0021 SW127 211020	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	22 Nov 2021	0021 SW127 211122	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	07 Apr 2022	0021 SW127 220407	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	12 Oct 2022	0021 SW127 221012	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	02 Feb 2023	0021 QC261 230202	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW127	AEC B	02 Feb 2023	0021 SW127 230202	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05

Table T9 - Historical Surface Water Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids									
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.0002	0.0001	0.0002	0.0002	0.0002	0.0004	0.0005	0.0005	0.0005	0.002	0.0005	0.0004	0.0004	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)	0.56			0.07															
PFAS NEMP 2020 Recreational Water	10			2															
PFAS NEMP 2020 Freshwater 99%	19	0.00023																	
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)	1,824	31																	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																				
0021	SW127	AEC B	09 Mar 2023	0021 SW127 230309	Normal	ACT 0021 PFASMGMT	0.14	6.01	2.45	8.46	9.8	0.16	0.24	0.2	0.02	<0.1	0.08	0.44	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW127	AEC B	20 Apr 2023	0021 SW127 230420	Normal	ACT 0021 PFASOMP 23	0.12	3.93	3.57	7.5	8.65	0.12	0.32	0.13	<0.02	<0.1	0.09	0.3	0.07	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	
0021	SW127	AEC B	01 May 2023	0021 QC100 230501	Field D	ACT 0021 PFASMGMT	<0.01	0.12	0.06	0.18	0.18	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW127	AEC B	01 May 2023	0021 QC200 230501	Interlab D	ACT 0021 PFASMGMT	<0.01	0.14	0.07	0.21	0.21	<0.01	<0.01	<0.01	<0.01	<0.05	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01		
0021	SW127	AEC B	01 May 2023	0021 SW127 230501	Normal	ACT 0021 PFASMGMT	<0.01	0.11	0.06	0.17	0.17	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW127	AEC B	06 Jun 2023	0021 SW127 230606	Normal	ACT 0021 PFASMGMT	0.08	2.26	1.53	3.79	4.5	0.09	0.14	0.09	<0.02	<0.1	0.04	0.24	0.03	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW127	AEC B	18 Oct 2023	0021 SW127 231018	Normal	ACT 0021 PFASOMP 23	0.12	7.25	2.24	9.49	10.6	0.13	0.21	0.18	<0.02	<0.1	0.08	0.37	0.05	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW127	AEC B	10 Apr 2024	0021 SW127 240410	Normal	ACT 0021 PFASOMP 24	0.09	3.26	2.64	5.9	6.85	0.13	0.19	0.1	<0.02	<0.1	0.04	0.32	0.04	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW130	AEC A	09 Sep 2020	0021 QC222 200909	Interlab D	ACT 0021 PFASMGMT	0.028	1.9	0.98	2.88	3.237	0.045	0.093	0.057	0.002	0.006	0.009	0.082	0.01	<0.001	<0.001	<0.001	<0.001	<0.001		
0021	SW130	AEC A	09 Sep 2020	0021 SW130 200909	Normal	ACT 0021 PFASMGMT	0.041	1.87	1.3	3.17	3.6	0.0477	0.112	0.0698	0.004	0.006	0.0114	0.124	0.0157	0.0012	0.0006	<0.0005	<0.0005	<0.0005		
0021	SW130	AEC A	19 Oct 2021	0021 SW130 211019	Normal	ACT 0021 PFASOMP 21	0.12	4.82	3.36	8.18	9.76	0.15	0.28	0.22	<0.02	<0.1	0.1	0.64	0.07	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW130	AEC A	22 Nov 2021	0021 QC200 211122	Interlab D	ACT 0021 PFASMGMT	0.08	2.6	1.2	3.8	4.54	0.06	0.07	0.1	<0.01	0.06	0.04	0.28	0.03	<0.01	<0.01	<0.01	<0.01	<0.01		
0021	SW130	AEC A	22 Nov 2021	0021 SW130 211122	Normal	ACT 0021 PFASMGMT	0.1	2.74	1.55	4.29	5.14	0.1	0.12	0.1	<0.02	<0.1	0.04	0.35	0.04	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW130	AEC A	05 Apr 2022	0021 SW130 220405	Normal	ACT 0021 PFASOMP 21	0.07	2.49	1.07	3.56	4.17	0.07	0.08	0.09	<0.02	<0.1	0.04	0.24	0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW130	AEC A	13 Oct 2022	0021 QC106 221013	Field D	ACT 0021 PFASOMP 21	0.06	2.27	0.95	3.22	3.61	0.03	0.06	0.07	<0.02	<0.1	0.03	0.14	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW130	AEC A	13 Oct 2022	0021 QC206 221013	Interlab D	ACT 0021 PFASOMP 21	0.07	2.2	0.96	3.2	3.7	0.04	0.07	0.08	<0.02	0.02	0.03	0.16	0.02	<0.01	<0.02	<0.02	<0.05	<0.1		
0021	SW130	AEC A	13 Oct 2022	0021 SW130 221013	Normal	ACT 0021 PFASOMP 21	0.07	2.13	1.08	3.21	3.68	0.04	0.07	0.08	<0.02	<0.1	0.03	0.16	0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW130	AEC A	17 Apr 2023	0021 SW130 230417	Normal	ACT 0021 Stage4 23	0.03	0.98	0.51	1.5	1.5	-	-	-	-	-	-	-	-	-	-	-	-	-		
0021	SW130	AEC A	20 Apr 2023	0021 QC106 230420	Field D	ACT 0021 PFASOMP 23	0.02	0.46	0.38	0.84	1.03	0.02	0.04	<0.02	<0.02	<0.1	0.05	0.06	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW130	AEC A	20 Apr 2023	0021 QC206 230420	Interlab D	ACT 0021 PFASOMP 23	0.03	0.57	0.4	0.97	1.4	0.04	0.04	0.03	<0.02	0.05	0.06	0.14	<0.01	<0.01	<0.02	<0.02	<0.05	<0.1		
0021	SW130	AEC A	20 Apr 2023	0021 SW130 230420	Normal	ACT 0021 PFASOMP 23	0.02	0.5	0.39	0.89	1.09	0.02	0.04	<0.02	<0.02	<0.1	0.05	0.07	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW130	AEC A	18 Oct 2023	0021 QC109 231018	Field D	ACT 0021 PFASOMP 23	0.02	0.65	0.52	1.17	1.4	0.04	0.05	<0.02	<0.02	<0.1	0.02	0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW130	AEC A	18 Oct 2023	0021 QC209 231018	Interlab D	ACT 0021 PFASOMP 23	0.02	0.76	0.63	1.4	1.7	0.05	0.06	0.03	<0.02	0.02	0.03	0.13	0.01	<0.01	<0.02	<0.02	<0.05	<0.1		
0021	SW130	AEC A	18 Oct 2023	0021 SW130 231018	Normal	ACT 0021 PFASOMP 23	0.02	0.62	0.44	1.06	1.3	0.04	0.04	0.02	<0.02	<0.1	0.02	0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW130	AEC A	11 Apr 2024	0021 SW130 240411	Normal	ACT 0021 PFASOMP 24	0.03	0.89	0.81	1.7	1.97	0.04	0.06	0.03	<0.02	<0.1	<0.02	0.11	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	31 Aug 2021	0021 SW153 210831	Normal	ACT 0021 PFASMGMT	0.19	4.64	4.27	8.91	10.8	0.25	0.38	0.2	<0.02	<0.1	0.11	0.66	0.08	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	11 Nov 2021	0021 QC121 211111	Field D	ACT 0021 PFASMGMT	0.26	14.6	6.67	21.3	24	0.32	0.34	0.38	0.03	<0.1	0.17	1.09	0.1	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	11 Nov 2021	0021 QC122 211112	Field D	ACT 0021 PFASMGMT	0.07	3.73	1.75	5.48	6.25	0.09	0.11	0.09	<0.02	<0.1	0.06	0.32	0.03	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	11 Nov 2021	0021 SW153 2111112211	Normal	ACT 0021 PFASMGMT	0.27	14.7	6.3	21	23.9	0.39	0.5	0.39	<0.02	<0.1	0.18	1.03	0.11	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	11 Nov 2021	0021 SW153 211112313	Normal	ACT 0021 PFASMGMT	0.11	7.02	2.33	9.35	10.5	0.16	0.2	0.14	<0.02	<0.1	0.07	0.43	0.04	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	12 Nov 2021	0021 QC221 211112	Interlab D	ACT 0021 PFASMGMT	0.05	3.1	1.1	4.2	4.72	0.05	0.08	0.07	<0.01	<0.05	0.03	0.2	0.02	<0.01	<0.01	<0.01	<0.01	<0.01		
0021	SW153	AEC B	12 Nov 2021	0021 QC222 211112	Interlab D	ACT 0021 PFASMGMT	0.08	3.8	1.8	5.6	6.36	0.06	0.11	0.11	<0.01	<0.05	0.05	0.28	0.03	<0.01	<0.01	<0.01	<0.01	<0.01		
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120014	Normal	ACT 0021 PFASMGMT	0.12	7.17	2.76	9.93	11.2	0.17	0.23	0.13	<0.02	<0.1	0.09	0.53	0.05	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120115	Normal	ACT 0021 PFASMGMT	0.12	6.12	2.47	8.59	9.84	0.16	0.22	0.14	<0.02	<0.1	0.09	0.48	0.04	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120216	Normal	ACT 0021 PFASMGMT	0.11	5.2	2.52	7.72	8.97	0.17	0.22	0.13	<0.02	<0.1	0.09	0.49	0.04	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120317	Normal	ACT 0021 PFASMGMT	0.1	3.8	2.17	5.97	7.1	0.16	0.19	0.13	<0.02	<0.1	0.08	0.43	0.04	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120418	Normal	ACT 0021 PFASMGMT	0.09	3.43	2.08	5.51	6.49	0.13	0.18	0.1	<0.02	<0.1	0.07	0.38	0.03	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120520	Normal	ACT 0021 PFASMGMT	0.09	3.45	2.09	5.54	6.57	0.13	0.18	0.11	<0.02	<0.1	0.07	0.41	0.04	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120621	Normal	ACT 0021 PFASMGMT	0.09	3.62	2.09	5.71	6.73	0.13	0.18	0.11	<0.02	<0.1	0.07	0.4	0.04	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120722	Normal	ACT 0021 PFASMGMT	0.08	3.4	1.94	5.34	6.24	0.13	0.16	0.09	<0.02	<0.1	0.06	0.35	0.03	<0.02	<0.02	<0.02	<0.02	<0.05		
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120823	Normal	ACT 0021 PFASMGMT	0.07	2.81	1.51	4.32	5.06	0.1	0.13	0.08	<0.02	<0.1	0.05	0.28	0.03	<0.02	<0.02	<0.02	<0.02	<0.05		

Table T9 - Historical Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	SW127	AEC B	09 Mar 2023	0021 SW127 230309	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	20 Apr 2023	0021 SW127 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	01 May 2023	0021 QC100 230501	Field D	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	01 May 2023	0021 QC200 230501	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW127	AEC B	01 May 2023	0021 SW127 230501	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	06 Jun 2023	0021 SW127 230606	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	18 Oct 2023	0021 SW127 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW127	AEC B	10 Apr 2024	0021 SW127 240410	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW130	AEC A	09 Sep 2020	0021 QC222 200909	Interlab D	ACT 0021 PFASMGMT	<0.001	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
0021	SW130	AEC A	09 Sep 2020	0021 SW130 200909	Normal	ACT 0021 PFASMGMT	<0.001	<0.001	<0.001	<0.001	0.0011	<0.001	<0.0005	<0.001	<0.001	<0.0005	<0.001
0021	SW130	AEC A	19 Oct 2021	0021 SW130 211019	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW130	AEC A	22 Nov 2021	0021 QC200 211122	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW130	AEC A	22 Nov 2021	0021 SW130 211122	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW130	AEC A	05 Apr 2022	0021 SW130 220405	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW130	AEC A	13 Oct 2022	0021 QC106 221013	Field D	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW130	AEC A	13 Oct 2022	0021 QC206 221013	Interlab D	ACT 0021 PFASOMP 21	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW130	AEC A	13 Oct 2022	0021 SW130 221013	Normal	ACT 0021 PFASOMP 21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW130	AEC A	17 Apr 2023	0021 SW130 230417	Normal	ACT 0021 Stage4 23	-	<0.01	<0.02	-	-	-	-	-	-	-	-
0021	SW130	AEC A	20 Apr 2023	0021 QC106 230420	Field D	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW130	AEC A	20 Apr 2023	0021 QC206 230420	Interlab D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW130	AEC A	20 Apr 2023	0021 SW130 230420	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW130	AEC A	18 Oct 2023	0021 QC109 231018	Field D	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW130	AEC A	18 Oct 2023	0021 QC209 231018	Interlab D	ACT 0021 PFASOMP 23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW130	AEC A	18 Oct 2023	0021 SW130 231018	Normal	ACT 0021 PFASOMP 23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW130	AEC A	11 Apr 2024	0021 SW130 240411	Normal	ACT 0021 PFASOMP 24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	31 Aug 2021	0021 SW153 210831	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	11 Nov 2021	0021 QC121 211111	Field D	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	11 Nov 2021	0021 QC122 211112	Field D	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	11 Nov 2021	0021 SW153 2111112211	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	11 Nov 2021	0021 SW153 2111112313	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 QC221 211112	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 QC222 211112	Interlab D	ACT 0021 PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120014	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120115	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120216	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120317	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120418	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120520	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120621	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120722	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120823	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111120924	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111121025	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111121127	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111121228	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111121329	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111121430	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111121531	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111121632	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111121734	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111121835	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111121936	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Nov 2021	0021 SW153 2111122037	Normal	ACT 0021 PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05

[illegible]

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Table T9 - Historical Surface Water Analytical Results

	PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
LOR	0.001	0.0004	0.0004	0.001	0.0005	0.001	0.0005	0.001	0.001	0.0005	0.001
PFAS NEMP 2020 Drinking Water (applicable to non-saline locations only)											
PFAS NEMP 2020 Recreational Water											
PFAS NEMP 2020 Freshwater 99%											
PFAS NEMP 2020 Freshwater 80% (applicable to AEC A locations only)											

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	SW153	AEC B	10 Dec 2021	0021_QC123_211210	Field_D	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	10 Dec 2021	0021_QC223_211210	Interlab_D	ACT_0021_PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW153	AEC B	10 Dec 2021	0021_SW153_2112100431	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	10 Dec 2021	0021_SW153_2112100833	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	10 Dec 2021	0021_SW153_2112101234	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	10 Dec 2021	0021_SW153_2112101635	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	10 Dec 2021	0021_SW153_2112102036	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	10 Dec 2021	0021_SW153_2112112043	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	10 Dec 2021	0021_SW153_2112131255	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	11 Dec 2021	0021_QC124_211211	Field_D	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	11 Dec 2021	0021_QC224_211211	Interlab_D	ACT_0021_PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW153	AEC B	11 Dec 2021	0021_SW153_2112110037	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	11 Dec 2021	0021_SW153_2112110438	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	11 Dec 2021	0021_SW153_2112110840	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	11 Dec 2021	0021_SW153_2112111642	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Dec 2021	0021_SW153_2112120445	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Dec 2021	0021_SW153_2112120847	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	13 Dec 2021	0021_SW153_2112130051	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_QC102_202022	Field_D	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_QC103_202022	Field_D	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_QC202_220222	Interlab_D	ACT_0021_PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_QC203_220222	Interlab_D	ACT_0021_PFASMGMT	<0.01	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_SW153_2202220055	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_SW153_2202220156	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_SW153_2202220257	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_SW153_2202220358	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_SW153_2202220459	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_SW153_2202220803	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_SW153_2202221005	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_SW153_2202221106	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_SW153_2202221410	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_SW153_2202221713	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	22 Feb 2022	0021_SW153_2202222017	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	23 Feb 2022	0021_SW153_2202230022	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	08 Apr 2022	0021_SW153_220408	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 May 2022	0021_SW153_2205120953	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 May 2022	0021_SW153_2205121054	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 May 2022	0021_SW153_2205121155	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 May 2022	0021_SW153_2205121257	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 May 2022	0021_SW153_2205121358	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 May 2022	0021_SW153_2205121459	Normal	ACT_0021_PFASMGMT	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	12 Oct 2022	0021_SW153_221012	Normal	ACT_0021_PFASOMP_21	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	20 Apr 2023	0021_QC112_230420	Field_D	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	20 Apr 2023	0021_QC212_230420	Interlab_D	ACT_0021_PFASOMP_23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW153	AEC B	20 Apr 2023	0021_SW153_230420	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	18 Oct 2023	0021_QC107_231018	Field_D	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	18 Oct 2023	0021_QC207_231018	Interlab_D	ACT_0021_PFASOMP_23	<0.01	<0.01	<0.02	<0.02	<0.1	<0.05	<0.02	<0.05	<0.1	<0.02	<0.5
0021	SW153	AEC B	18 Oct 2023	0021_SW153_231018	Normal	ACT_0021_PFASOMP_23	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05
0021	SW153	AEC B	10 Apr 2024	0021_SW153_240410	Normal	ACT_0021_PFASOMP_24	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.02	<0.05	<0.05	<0.02	<0.05

Notes
LOR Limit of Reporting
Normal Primary sample

Field_D Intra-laboratory duplicate sample
Interlab_D Inter-laboratory duplicate sample

Table T10 - Historical Sediment Analytical Results

							PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids														
							Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)					
							mg/kg 0.0001	mg/kg 0.0001	mg/kg 0.0001	mg/kg 0.0001	mg/kg 0.0001	mg/kg 0.0001	mg/kg 0.0001	mg/kg 0.0001	mg/kg 0.0002	mg/kg 0.0002	mg/kg 0.0002	mg/kg 0.0001	mg/kg 0.0001	mg/kg 0.0001	mg/kg 0.0002	mg/kg 0.0002	mg/kg 0.0002	mg/kg 0.0002	mg/kg 0.0002	mg/kg 0.0005				
LOR																														
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																								
0020	SD001	Flat Rock Creek	19 Apr 2017	FC SED01 0-0.05	Normal	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD001	Flat Rock Creek	15 May 2018	FC QC215 180515	Interlab D	JBT 0021 PFAS	<0.005	<0.005	<0.005	<0.005	<0.05	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005					
0020	SD001	Flat Rock Creek	15 May 2018	FC SD01 0.0 180515	Normal	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD001	Flat Rock Creek	15 May 2018	FC SD01 0.2 180515	Normal	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD001	Flat Rock Creek	19 Oct 2021	0020 QC103 211019	Field D	ACT 0020 PFASOMP 21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD001	Flat Rock Creek	19 Oct 2021	0020 SD001 211019	Normal	ACT 0020 PFASOMP 21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD001	Flat Rock Creek	04 Apr 2022	0020 QC201 220404	Interlab D	ACT 0020 PFASOMP 21	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0002	<0.0002	<0.0002	<0.0001	<0.0001	<0.0001	<0.0001	<0.0005	<0.0005	<0.0005	<0.0005	<0.005					
0020	SD001	Flat Rock Creek	04 Apr 2022	0020 SD001 220404	Normal	ACT 0020 PFASOMP 21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD001	Flat Rock Creek	10 Oct 2022	0020 QC103 221020	Field D	ACT 0020 PFASOMP 21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD001	Flat Rock Creek	10 Oct 2022	0020 SD001 221010	Normal	ACT 0020 PFASOMP 21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD001	Flat Rock Creek	17 Apr 2023	0020 SD001 230417	Normal	ACT 0020 PFASOMP 23	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD001	Flat Rock Creek	16 Oct 2023	0020 SD001 231016	Normal	ACT 0020 PFASOMP 23	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD001	Flat Rock Creek	08 Apr 2024	0020 SD001 240408	Normal	ACT 0020 PFASOMP 24	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD002	Flat Rock Creek	19 Apr 2017	FC SED02 0-0.05	Normal	JBT 0021 PFAS	<0.0002	0.0034	0.0022	0.0056	0.006	<0.002	<0.002	0.0004	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD002	Flat Rock Creek	15 May 2018	FC SD02 0.0 180515	Normal	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD002	Flat Rock Creek	19 Oct 2021	0020 QC203 211019	Interlab D	ACT 0020 PFASOMP 21	<0.0001	0.0002	<0.0001	0.0002	0.0002	<0.0001	<0.0001	<0.0001	<0.0002	<0.0002	<0.0001	<0.0001	<0.0001	<0.0005	<0.0005	<0.0005	<0.0005	<0.005						
0020	SD002	Flat Rock Creek	19 Oct 2021	0020 SD002 211019	Normal	ACT 0020 PFASOMP 21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD002	Flat Rock Creek	04 Apr 2022	0020 QC101 220404	Field D	ACT 0020 PFASOMP 21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD002	Flat Rock Creek	04 Apr 2022	0020 SD002 220404	Normal	ACT 0020 PFASOMP 21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD002	Flat Rock Creek	10 Oct 2022	0020 SD002 221010	Normal	ACT 0020 PFASOMP 21	<0.0002	<0.0002	0.0004	<0.0002	0.0004	0.0004	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD002	Flat Rock Creek	17 Apr 2023	0020 SD002 230417	Normal	ACT 0020 PFASOMP 23	<0.0002	0.0032	0.001	0.0042	0.0042	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD002	Flat Rock Creek	16 Oct 2023	0020 SD002 231016	Normal	ACT 0020 PFASOMP 23	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD002	Flat Rock Creek	08 Apr 2024	0020 SD002 240408	Normal	ACT 0020 PFASOMP 24	<0.0002	0.0007	0.0004	0.0011	0.0011	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD004	Flat Rock Creek	19 Apr 2017	FC SED04 0-0.05	Normal	JBT 0021 PFAS	<0.0002	0.0009	0.0005	0.0014	0.0014	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD004	Flat Rock Creek	15 May 2018	FC SD04 0.0 180515	Normal	JBT 0021 PFAS	<0.0002	0.0013	0.0004	0.0017	0.0017	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD004	Flat Rock Creek	15 May 2018	FC SD04 0.2 180515	Normal	JBT 0021 PFAS	<0.0002	0.0012	0.0005	0.0017	0.0017	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD004	Flat Rock Creek	18 Oct 2021	0020 SD004 211018	Normal	ACT 0020 PFASOMP 21	<0.0002	0.0022	0.0003	0.0025	0.0025	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD004	Flat Rock Creek	04 Apr 2022	0020 SD004 220404	Normal	ACT 0020 PFASOMP 21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD004	Flat Rock Creek	11 Oct 2022	0020 SD004 221011	Normal	ACT 0020 PFASOMP 21	<0.0002	0.0007	<0.0002	0.0007	0.0007	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD004	Flat Rock Creek	17 Apr 2023	0020 SD004 230417	Normal	ACT 0020 PFASOMP 23	<0.0002	0.0017	<0.0002	0.0017	0.0017	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD004	Flat Rock Creek	16 Oct 2023	0020 SD004 231016	Normal	ACT 0020 PFASOMP 23	<0.0002	0.0056	0.0004	0.006	0.006	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD004	Flat Rock Creek	08 Apr 2024	0020 SD004 240408	Normal	ACT 0020 PFASOMP 24	<0.0002	0.0048	0.0003	0.0051	0.0051	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD006	Flat Rock Creek	21 Mar 2018	FC SD13 0.0 180321	Normal	JBT 0021 PFAS	<0.0002	0.0009	<0.0002	0.0009	0.0009	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD006	Flat Rock Creek	19 Oct 2021	0020 SD006 211019	Normal	ACT 0020 PFASOMP 21	<0.0002	0.0027	0.0002	0.0029	0.0029	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD006	Flat Rock Creek	04 Apr 2022	0020 SD006 220404	Normal	ACT 0020 PFASOMP 21	<0.0002	0.001	<0.0002	0.001	0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005					
0020	SD006	Flat Rock Creek	12 Oct 2022	0020 SD006 221012	Normal	ACT 0020 PFASOMP 21	<0.0002	0.0004	<0.0																					

Table T10 - Historical Sediment Analytical Results

							PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides							
							4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	
LOR							mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID												
0020	SD001	Flat Rock Creek	19 Apr 2017	FC SED01 0-0.05	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD001	Flat Rock Creek	15 May 2018	FC QC215 180515	Interlab_D	JBT 0021 PFAS	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.01	<0.005	<0.005	<0.01	<0.005	
0020	SD001	Flat Rock Creek	15 May 2018	FC SD01 0.0 180515	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD001	Flat Rock Creek	15 May 2018	FC SD01 0.2 180515	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD001	Flat Rock Creek	19 Oct 2021	0020 QC103 211019	Field_D	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD001	Flat Rock Creek	19 Oct 2021	0020 SD001 211019	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD001	Flat Rock Creek	04 Apr 2022	0020 QC201 220404	Interlab_D	ACT 0020 PFASOMP 21	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0020	SD001	Flat Rock Creek	04 Apr 2022	0020 SD001 220404	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD001	Flat Rock Creek	10 Oct 2022	0020 QC103 221020	Field_D	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD001	Flat Rock Creek	10 Oct 2022	0020 SD001 221010	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD001	Flat Rock Creek	17 Apr 2023	0020 SD001 230417	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD001	Flat Rock Creek	16 Oct 2023	0020 SD001 231016	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD001	Flat Rock Creek	08 Apr 2024	0020 SD001 240408	Normal	ACT 0020 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD002	Flat Rock Creek	19 Apr 2017	FC SED02 0-0.05	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD002	Flat Rock Creek	15 May 2018	FC SD02 0.0 180515	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD002	Flat Rock Creek	19 Oct 2021	0020 QC203 211019	Interlab_D	ACT 0020 PFASOMP 21	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0020	SD002	Flat Rock Creek	19 Oct 2021	0020 SD002 211019	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD002	Flat Rock Creek	04 Apr 2022	0020 QC101 220404	Field_D	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD002	Flat Rock Creek	04 Apr 2022	0020 SD002 220404	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD002	Flat Rock Creek	10 Oct 2022	0020 SD002 221010	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD002	Flat Rock Creek	17 Apr 2023	0020 SD002 230417	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD002	Flat Rock Creek	16 Oct 2023	0020 SD002 231016	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD002	Flat Rock Creek	08 Apr 2024	0020 SD002 240408	Normal	ACT 0020 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD004	Flat Rock Creek	19 Apr 2017	FC SED04 0-0.05	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD004	Flat Rock Creek	15 May 2018	FC SD04 0.0 180515	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD004	Flat Rock Creek	15 May 2018	FC SD04 0.2 180515	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD004	Flat Rock Creek	18 Oct 2021	0020 SD004 211018	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD004	Flat Rock Creek	04 Apr 2022	0020 SD004 220404	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD004	Flat Rock Creek	11 Oct 2022	0020 SD004 221011	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD004	Flat Rock Creek	17 Apr 2023	0020 SD004 230417	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD004	Flat Rock Creek	16 Oct 2023	0020 SD004 231016	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD004	Flat Rock Creek	08 Apr 2024	0020 SD004 240408	Normal	ACT 0020 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD006	Flat Rock Creek	21 Mar 2018	FC SD13 0.0 180321	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD006	Flat Rock Creek	19 Oct 2021	0020 SD006 211019	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD006	Flat Rock Creek	04 Apr 2022	0020 SD006 220404	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD006	Flat Rock Creek	12 Oct 2022	0020 SD006 221012	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD006	Flat Rock Creek	17 Apr 2023	0020 SD006 230417	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD006	Flat Rock Creek	16 Oct 2023	0020 QC103 231016	Field_D	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD006	Flat Rock Creek	16 Oct 2023	0020 QC203 231016	Interlab_D	ACT 0020 PFASOMP 23	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0020	SD006	Flat Rock Creek	16 Oct 2023	0020 SD006 231016	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD006	Flat Rock Creek	08 Apr 2024	0020 SD006 240408	Normal	ACT 0020 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD007	Flat Rock Creek	05 Apr 2018	FC SD14 0.0 180406	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD007	Flat Rock Creek	15 May 2018	FC SD14 0.0 180515	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD007	Flat Rock Creek	19 Oct 2021	0020 SD007 211019	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD007	Flat Rock Creek	04 Apr 2022	0020 SD007 220404	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD007	Flat Rock Creek	10 Oct 2022	0020 SD007 221010	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD007	Flat Rock Creek	17 Apr 2023	0020 SD007 230417	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD007	Flat Rock Creek	16 Oct 2023	0020 SD007 231016	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD007	Flat Rock Creek	08 Apr 2024	0020 SD007 240408	Normal	ACT 0020 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD018	Captains Lagoon	18 Apr 2017	CL SED01 0-0.05	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD018	Captains Lagoon	01 May 2018	CL SD01 0.0 180501	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD018	Captains Lagoon	18 Oct 2021	0020 SD018 211018	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD018	Captains																

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Table T10 - Historical Sediment Analytical Results

							PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides								
							4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)		
LOR							mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
							0.0001	0.0001	0.0001	0.0001	0.0002	0.0005	0.0002	0.0005	0.0005	0.0005	0.0002	0.0005	0.0005
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID													
0020	SD018	Captains Lagoon	16 Oct 2023	0020_QC202_231016	Interlab_D	ACT_0020_PFASOMP_23	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.0002	<0.0005	<0.0005
0020	SD018	Captains Lagoon	16 Oct 2023	0020_SD018_231016	Normal	ACT_0020_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD018	Captains Lagoon	08 Apr 2024	0020_SD018_240408	Normal	ACT_0020_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD019	Captains Lagoon	18 Apr 2017	CL_SED02_0-0.05	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD019	Captains Lagoon	01 May 2018	CL_SD02_0.0_180501	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD019	Captains Lagoon	18 Oct 2021	0020_QC201_211018	Interlab_D	ACT_0020_PFASOMP_21	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.0002	<0.0005	<0.0005
0020	SD019	Captains Lagoon	18 Oct 2021	0020_SD019_211018	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD019	Captains Lagoon	04 Apr 2022	0020_SD019_220404	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD019	Captains Lagoon	11 Oct 2022	0020_SD019_221011	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	0.0007	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD019	Captains Lagoon	17 Apr 2023	0020_SD019_230417	Normal	ACT_0020_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	0.0003	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD019	Captains Lagoon	16 Oct 2023	0020_SD019_231016	Normal	ACT_0020_PFASOMP_23	<0.0010	<0.0010	<0.0010	<0.0010	0.0011	<0.0025	<0.0010	<0.0025	<0.0025	<0.0010	<0.0025	<0.0010	<0.0025
0020	SD019	Captains Lagoon	08 Apr 2024	0020_QC103_240408	Field_D	ACT_0020_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD019	Captains Lagoon	08 Apr 2024	0020_QC203_240408	Interlab_D	ACT_0020_PFASOMP_24	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.0002	<0.0005	<0.0005
0020	SD019	Captains Lagoon	08 Apr 2024	0020_SD019_240408	Normal	ACT_0020_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD024	Captains Lagoon	18 Apr 2017	CL_SED07_0-0.05	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD024	Captains Lagoon	01 May 2018	CL_QC220_180501	Interlab_D	JBT_0021_PFAS	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.01	<0.005	<0.005	<0.01	<0.005	<0.005	<0.005
0020	SD024	Captains Lagoon	01 May 2018	CL_SD07_0.0_180501	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD024	Captains Lagoon	18 Oct 2021	0020_SD024_211018	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD024	Captains Lagoon	04 Apr 2022	0020_SD024_220404	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD024	Captains Lagoon	10 Oct 2022	0020_SD024_221012	Normal	ACT_0020_PFASMGMT	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD024	Captains Lagoon	12 Oct 2022	0020_SD024_221012	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD024	Captains Lagoon	30 Jan 2023	0020_QC140_230130	Field_D	ACT_0020_PFASMGMT	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD024	Captains Lagoon	30 Jan 2023	0020_SD024_230130	Normal	ACT_0020_PFASMGMT	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD024	Captains Lagoon	17 Apr 2023	0020_SD024_230417	Normal	ACT_0020_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD024	Captains Lagoon	16 Oct 2023	0020_SD024_231016	Normal	ACT_0020_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD024	Captains Lagoon	08 Apr 2024	0020_SD024_240408	Normal	ACT_0020_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	18 Apr 2017	CL_SED08_0-0.05	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	18 Apr 2017	JCQA01	Field_D	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	01 May 2018	CL_SD08_0.0_180501	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	21 Oct 2021	0020_SD025_211021	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	04 Apr 2022	0020_SD025_220404	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	10 Oct 2022	0020_SD025_221012	Normal	ACT_0020_PFASMGMT	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	12 Oct 2022	0020_SD025_221012	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	01 Feb 2023	0020_SD025_230201	Normal	ACT_0020_PFASMGMT	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	17 Apr 2023	0020_QC103_230417	Field_D	ACT_0020_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	17 Apr 2023	0020_QC203_230417	Interlab_D	ACT_0020_PFASOMP_23	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.0002	<0.0005	<0.0005
0020	SD025	Captains Lagoon	17 Apr 2023	0020_SD025_230417	Normal	ACT_0020_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	16 Oct 2023	0020_SD025_231016	Normal	ACT_0020_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD025	Captains Lagoon	08 Apr 2024	0020_SD025_240408	Normal	ACT_0020_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD026	Captains Lagoon	26 Mar 2018	CL_QC208_180326	Interlab_D	JBT_0021_PFAS	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.01	<0.005	<0.005	<0.01	<0.005	<0.01	<0.005
0020	SD026	Captains Lagoon	26 Mar 2018	CL_SD12_0.0_180326	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD026	Captains Lagoon	15 May 2018	CL_SD12_0.0_180515	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD026	Captains Lagoon	18 Oct 2021	0020_SD026_211018	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD026	Captains Lagoon	04 Apr 2022	0020_SD026_220404	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD026	Captains Lagoon	11 Oct 2022	0020_SD026_221011	Normal	ACT_0020_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020	SD026	Captains Lagoon	17 Apr 2023	0020_SD026_230417	Normal	ACT_0020_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005
0020																			

Table T10 - Historical Sediment Analytical Results

							PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids														
							Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)					
LOR							0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0005
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																								
0020	SD032	AEC F	10 Apr 2017	F SED01	Normal	JBT 0021 PFAS	<0.0002	0.0132	0.0008	0.014	0.014	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0020	SD032	AEC F	18 Oct 2021	0020 QC101 211018	Field D	ACT 0020 PFASOMP 21	<0.0002	0.011	0.0015	0.0125	0.0127	0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0020	SD032	AEC F	18 Oct 2021	0020 SD032 211018	Normal	ACT 0020 PFASOMP 21	<0.0002	0.0104	0.0006	0.011	0.0112	<0.0002	<0.0002	0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0020	SD032	AEC F	13 Dec 2021	0020 SD032 211213	Normal	ACT 0020 PFASMGMT	0.0003	0.127	0.0102	0.137	0.151	0.0006	0.0004	0.0007	0.0026	<0.001	0.0004	0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	0.0007	<0.0002	<0.0002	<0.0002	<0.0005		
0020	SD032	AEC F	04 Apr 2022	0020 SD032 220404	Normal	ACT 0020 PFASOMP 21	<0.0002	0.0156	0.0013	0.0169	0.0178	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0020	SD032	AEC F	10 Oct 2022	0020 QC101 221010	Field D	ACT 0020 PFASOMP 21	0.0003	0.11	0.008	0.118	0.135	0.0002	0.0003	0.0007	0.0021	<0.001	0.0008	0.0007	0.0004	<0.0002	<0.0002	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0020	SD032	AEC F	10 Oct 2022	0020 SD032 221010	Normal	ACT 0020 PFASOMP 21	0.0004	0.168	0.0133	0.181	0.207	0.0006	0.0006	0.0008	0.0038	<0.001	0.0011	0.001	0.0005	<0.0002	<0.0002	0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0005			
0020	SD032	AEC F	17 Apr 2023	0020 QC100 230417	Field D	ACT 0020 PFASOMP 23	<0.0002	0.0096	0.0009	0.0105	0.0105	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0020	SD032	AEC F	17 Apr 2023	0020 QC200 230417	Interlab D	ACT 0020 PFASOMP 23	<0.0001	0.0097	0.0012	0.011	0.011	<0.0001	<0.0001	0.0001	<0.0002	<0.0002	<0.0001	<0.0002	<0.0001	<0.0002	<0.0001	<0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.005			
0020	SD032	AEC F	17 Apr 2023	0020 SD032 230417	Normal	ACT 0020 PFASOMP 23	<0.0002	0.0048	0.0005	0.0053	0.0053	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0020	SD032	AEC F	16 Oct 2023	0020 SD032 231016	Normal	ACT 0020 PFASOMP 23	<0.0002	0.0116	0.0008	0.0124	0.0124	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0020	SD032	AEC F	08 Apr 2024	0020 SD032 240408	Normal	ACT 0020 PFASOMP 24	<0.0002	0.0132	0.0011	0.0143	0.0154	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0020	SD033	AEC F	10 Apr 2017	F SED02	Normal	JBT 0021 PFAS	<0.0002	0.0049	0.0006	0.0055	0.0216	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	0.0002	<0.0002	<0.0002	<0.0002	0.0006	0.0009	<0.0002	<0.0002	<0.0005				
0020	SD033	AEC F	19 Oct 2021	0020 SD033 211019	Normal	ACT 0020 PFASOMP 21	0.0005	0.0231	0.0026	0.0257	0.0473	<0.0002	<0.0002	<0.0002	0.001	<0.001	0.0031	0.001	0.001	0.0004	0.0006	0.0021	0.0033	0.0008	0.001					
0020	SD033	AEC F	13 Dec 2021	0020 SD033 211213	Normal	ACT 0020 PFASMGMT	0.0005	0.0457	0.0061	0.0518	0.0804	0.0003	0.0004	0.0002	0.0026	<0.001	0.0022	0.0012	0.0007	0.0004	0.0008	0.0024	0.0043	0.0012	0.0011					
0020	SD033	AEC F	04 Apr 2022	0020 SD033 220404	Normal	ACT 0020 PFASOMP 21	<0.0002	0.0285	0.0024	0.0309	0.0446	<0.0002	<0.0002	<0.0002	0.0013	<0.001	0.0005	0.0008	<0.0002	0.0002	0.0003	0.0005	0.0015	0.0003	0.0008					
0020	SD033	AEC F	10 Oct 2022	0020 QC200 221010	Interlab D	ACT 0020 PFASOMP 21	<0.0001	0.02	0.0015	0.021	0.028	<0.0001	<0.0001	0.0002	0.001	<0.0002	0.0003	0.0003	<0.0001	<0.0001	<0.0005	<0.0005	0.0006	0.0007	<0.005					
0020	SD033	AEC F	10 Oct 2022	0020 SD033 221010	Normal	ACT 0020 PFASOMP 21	<0.0002	0.012	0.0017	0.0137	0.0158	<0.0002	<0.0002	<0.0002	0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	0.0005	0.0002	<0.0005					
0020	SD033	AEC F	17 Apr 2023	0020 SD033 230417	Normal	ACT 0020 PFASOMP 23	<0.0002	0.011	0.001	0.012	0.0139	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	0.0004	0.0002	<0.0002	<0.0002	<0.0002	0.0003	0.0008	0.0002	<0.0005					
0020	SD033	AEC F	16 Oct 2023	0020 SD033 231016	Normal	ACT 0020 PFASOMP 23	<0.0002	0.0136	0.0012	0.0148	0.0222	<0.0002	<0.0002	<0.0002	0.0012	<0.001	0.0014	0.0005	0.0003	<0.0002	<0.0002	0.0004	0.0008	0.0006	0.001					
0020	SD033	AEC F	08 Apr 2024	0020 SD033 240408	Normal	ACT 0020 PFASOMP 24	<0.0002	0.0115	0.0019	0.0134	0.0199	<0.0002	<0.0002	<0.0002	0.0005	<0.001	0.0013	0.0005	0.0004	<0.0002	<0.0002	0.0003	0.001	0.0006	<0.0005					
0021	SD001	AEC A	20 Apr 2017	AB SED01 0-0.05	Normal	JBT 0021 PFAS	0.0006	0.224	0.0071	0.231	0.239	<0.0002	0.0002	0.0007	0.0028	<0.001	<0.0002	0.0008	<0.0002	<0.0002	0.0009	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD001	AEC A	20 Apr 2017	AB SED01 0-0.05	Normal	JBT 0021 PFAS	-	-	-	0.2311	-	-	-	-</																

Table T10 - Historical Sediment Analytical Results

							PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides							
							4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	
LOR							0.0001	0.0001	0.0001	0.0001	0.0002	0.0005	0.0002	0.0005	0.0005	0.0002	0.0005	
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID												
0020	SD032	AEC F	10 Apr 2017	F SED01	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD032	AEC F	18 Oct 2021	0020 QC101 211018	Field D	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD032	AEC F	18 Oct 2021	0020 SD032 211018	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD032	AEC F	13 Dec 2021	0020 SD032 211213	Normal	ACT 0020 PFASMGMT	<0.0005	<0.0005	<0.0005	<0.0005	0.0073	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD032	AEC F	04 Apr 2022	0020 SD032 220404	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	0.0006	<0.0005	0.0003	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD032	AEC F	10 Oct 2022	0020 QC101 221010	Field D	ACT 0020 PFASOMP 21	<0.0005	0.0005	<0.0005	<0.0005	0.0103	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD032	AEC F	10 Oct 2022	0020 SD032 221010	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	0.0167	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD032	AEC F	17 Apr 2023	0020 QC100 230417	Field D	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD032	AEC F	17 Apr 2023	0020 QC200 230417	Interlab D	ACT 0020 PFASOMP 23	<0.0001	0.0001	<0.0002	<0.0002	<0.005	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0020	SD032	AEC F	17 Apr 2023	0020 SD032 230417	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD032	AEC F	16 Oct 2023	0020 SD032 231016	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD032	AEC F	08 Apr 2024	0020 SD032 240408	Normal	ACT 0020 PFASOMP 24	0.0008	<0.0005	<0.0005	<0.0005	0.0003	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD033	AEC F	10 Apr 2017	F SED02	Normal	JBT 0021 PFAS	<0.0005	0.0071	0.0037	0.0024	0.0012	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD033	AEC F	19 Oct 2021	0020 SD033 211019	Normal	ACT 0020 PFASOMP 21	<0.0005	0.0006	<0.0005	0.0014	0.0048	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD033	AEC F	13 Dec 2021	0020 SD033 211213	Normal	ACT 0020 PFASMGMT	<0.0005	0.0011	<0.0005	0.002	0.0072	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD033	AEC F	04 Apr 2022	0020 SD033 220404	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	0.0011	0.0064	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD033	AEC F	10 Oct 2022	0020 QC200 221010	Interlab D	ACT 0020 PFASOMP 21	<0.0001	0.0002	<0.0002	0.0002	0.003	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0020	SD033	AEC F	10 Oct 2022	0020 SD033 221010	Normal	ACT 0020 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	0.0012	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD033	AEC F	17 Apr 2023	0020 SD033 230417	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD033	AEC F	16 Oct 2023	0020 SD033 231016	Normal	ACT 0020 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	0.0012	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0020	SD033	AEC F	08 Apr 2024	0020 SD033 240408	Normal	ACT 0020 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	0.0019	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD001	AEC A	20 Apr 2017	AB SED01 0-0.05	Normal	JBT 0021 PFAS	<0.0005	<0.0005	0.0007	<0.0005	0.0009	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD001	AEC A	20 Apr 2017	AB SED01 0-0.05	Normal	JBT 0021 PFAS	-	-	-	-	-	-	-	-	-	-	-	
0021	SD001	AEC A	19 Oct 2021	0021 SD001 211019	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	0.0007	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	0.0005	
0021	SD001	AEC A	05 Apr 2022	0021 SD001 220405	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD001	AEC A	13 Oct 2022	0021 SD001 221013	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	0.0007	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD001	AEC A	20 Apr 2023	0021 QC113 230420	Field D	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD001	AEC A	20 Apr 2023	0021 QC213 230420	Interlab D	ACT 0021 PFASOMP 23	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0021	SD001	AEC A	20 Apr 2023	0021 SD001 230420	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD001	AEC A	18 Oct 2023	0021 SD001 231018	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD001	AEC A	10 Apr 2024	0021 SD001 240410	Normal	ACT 0021 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD002	AEC A	20 Apr 2017	AB SED02 0-0.1	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	0.0008	<0.0005	<0.0002	<0.0005	<0.0005	0.0003	<0.0005	
0021	SD002	AEC A	20 Apr 2017	AB SED02 0-0.1	Normal	JBT 0021 PFAS	-	-	-	-	-	-	-	-	-	-	-	
0021	SD002	AEC A	19 Oct 2021	0021 SD002 211019	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	0.0036	<0.0012	<0.0005	<0.0012	<0.0012	<0.0005	<0.0012	
0021	SD002	AEC A	05 Apr 2022	0021 QC201 220405	Interlab D	ACT 0021 PFASOMP 21	<0.0003	<0.0003	<0.0006	<0.0006	<0.003	<0.003	<0.0006	<0.003	<0.003	<0.0006	<0.02	
0021	SD002	AEC A	05 Apr 2022	0021 SD002 220405	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD002	AEC A	13 Oct 2022	0021 QC201 221013	Interlab D	ACT 0021 PFASOMP 21	<0.001	<0.001	<0.002	<0.002	<0.01	<0.01	<0.002	<0.01	<0.01	<0.002	<0.05	
0021	SD002	AEC A	13 Oct 2022	0021 SD002 221013	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	0.0088	<0.0012	<0.0005	<0.0012	<0.0012	<0.0005	<0.0012	
0021	SD002	AEC A	20 Apr 2023	0021 QC108 230420	Field D	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD002	AEC A	20 Apr 2023	0021 QC208 230420	Interlab D	ACT 0021 PFASOMP 23	<0.0001</											

Table T10 - Historical Sediment Analytical Results

							PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids													
							Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTTrDA)	Perfluorotetradecanoic acid (PFTeDA)				
							mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
LOR							0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0002	0.0002	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0005
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																							
0021	SD004	AEC B	14 Oct 2022	0021_SD004_221014	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0008	<0.0002	0.0008	0.0008	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD004	AEC B	21 Apr 2023	0021_SD004_230421	Normal	ACT_0021_PFASOMP_23	<0.0002	0.0009	<0.0002	0.0009	0.0009	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD004	AEC B	19 Oct 2023	0021_QC113_231019	Field_D	ACT_0021_PFASOMP_23	<0.0002	0.0021	<0.0002	0.0023	0.0023	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD004	AEC B	19 Oct 2023	0021_QC213_231019	Interlab_D	ACT_0021_PFASOMP_23	<0.0001	0.002	0.0002	0.0021	0.0021	<0.0001	<0.0001	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD004	AEC B	19 Oct 2023	0021_SD004_231019	Normal	ACT_0021_PFASOMP_23	<0.0002	0.0024	0.0003	0.0027	0.0027	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD004	AEC B	12 Apr 2024	0021_SD004_240412	Normal	ACT_0021_PFASOMP_24	<0.0002	0.0018	<0.0002	0.0018	0.0018	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD005	Site drainage channels	13 Apr 2017	AB_SED06_0-0.05	Normal	JBT_0021_PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD005	Site drainage channels	20 Oct 2021	0021_SD005_211020	Normal	ACT_0021_PFASOMP_21	<0.0002	0.001	<0.0002	0.001	0.0024	0.0014	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD005	Site drainage channels	06 Apr 2022	0021_SD005_220406	Normal	ACT_0021_PFASOMP_21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD005	Site drainage channels	14 Oct 2022	0021_SD005_221014	Normal	ACT_0021_PFASOMP_21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD005	Site drainage channels	21 Apr 2023	0021_SD005_230421	Normal	ACT_0021_PFASOMP_23	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD005	Site drainage channels	19 Oct 2023	0021_SD005_231019	Normal	ACT_0021_PFASOMP_23	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD005	Site drainage channels	12 Apr 2024	0021_QC115_240412	Field_D	ACT_0021_PFASOMP_24	<0.0002	0.0013	0.0002	0.0015	0.0015	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD005	Site drainage channels	12 Apr 2024	0021_QC215_240412	Interlab_D	ACT_0021_PFASOMP_24	<0.0001	0.0054	0.0016	0.007	0.0077	0.0002	0.0002	0.0001	<0.0002	<0.0002	0.0002	<0.0001	<0.0001	0.0002	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.005	<0.005	
0021	SD005	Site drainage channels	12 Apr 2024	0021_SD005_240412	Normal	ACT_0021_PFASOMP_24	<0.0002	0.0005	<0.0002	0.0005	0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD006	AEC B	12 Apr 2017	B_SED01_0.3-0.4	Normal	JBT_0021_PFAS	0.0004	0.0255	0.0043	0.0298	0.0307	<0.0002	<0.0002	0.0005	<0.0002	<0.0002	0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD006	AEC B	20 Oct 2021	0021_SD006_211020	Normal	ACT_0021_PFASOMP_21	0.0028	0.791	0.0684	0.859	0.91	0.0017	0.0032	0.0065	0.0204	0.002	0.0027	0.0049	0.0008	<0.0002	<0.0002	<0.0002	0.0002	<0.0002	<0.0002	0.0006	<0.0002	<0.0006	
0021	SD006	AEC B	12 Oct 2022	0021_SD006_221012	Normal	ACT_0021_PFASOMP_21	0.0022	0.5	0.0533	0.553	0.597	0.0018	0.0022	0.0051	0.017	<0.0002	0.0013	0.0036	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0006	
0021	SD006	AEC B	19 Apr 2023	0021_SD006_230419	Normal	ACT_0021_PFASOMP_23	0.0005	0.091	0.0109	0.102	0.115	<0.0002	0.0003	0.0011	0.0088	<0.0002	<0.0002	0.0015	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0006	
0021	SD006	AEC B	18 Oct 2023	0021_SD006_231018	Normal	ACT_0021_PFASOMP_23	0.0072	0.991	0.112	1.1	1.18	0.0021	0.0039	0.0124	0.0193	<0.0002	0.0092	0.0222	0.0018	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0012		
0021	SD006	AEC B	10 Apr 2024	0021_SD006_240410	Normal	ACT_0021_PFASOMP_24	0.0004	0.131	0.0173	0.148	0.167	0.0003	0.0006	0.0006	0.0082	0.003	0.0014	0.0018	0.0004	<0.0002	<0.0002	<0.0002	0.0004	<					

Table T10 - Historical Sediment Analytical Results

								PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides								
								4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)		
LOR								mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
								0.0001	0.0001	0.0001	0.0001	0.0002	0.0005	0.0002	0.0005	0.0005	0.0002	0.0005	0.0002	0.0005
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID														
0021	SD004	AEC B	14 Oct 2022	0021 SD004 221014	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	
0021	SD004	AEC B	21 Apr 2023	0021 SD004 230421	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	
0021	SD004	AEC B	19 Oct 2023	0021 QC113 231019	Field_D	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	
0021	SD004	AEC B	19 Oct 2023	0021 QC213 231019	Interlab_D	ACT 0021 PFASOMP 23	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.0002	<0.005	
0021	SD004	AEC B	19 Oct 2023	0021 SD004 231019	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	
0021	SD004	AEC B	12 Apr 2024	0021 SD004 240412	Normal	ACT 0021 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	
0021	SD005	Site drainage channels	13 Apr 2017	AB SED06 0-0.05	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD005	Site drainage channels	20 Oct 2021	0021 SD005 211020	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD005	Site drainage channels	06 Apr 2022	0021 SD005 220406	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD005	Site drainage channels	14 Oct 2022	0021 SD005 221014	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD005	Site drainage channels	21 Apr 2023	0021 SD005 230421	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD005	Site drainage channels	19 Oct 2023	0021 SD005 231019	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD005	Site drainage channels	12 Apr 2024	0021 QC115 240412	Field_D	ACT 0021 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD005	Site drainage channels	12 Apr 2024	0021 QC215 240412	Interlab_D	ACT 0021 PFASOMP 24	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.0002	<0.005	
0021	SD005	Site drainage channels	12 Apr 2024	0021 SD005 240412	Normal	ACT 0021 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD006	AEC B	12 Apr 2017	B SED01 0.3-0.4	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD006	AEC B	20 Oct 2021	0021 SD006 211020	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	0.0047	<0.0006	<0.0002	<0.0006	<0.0006	<0.0006	<0.0002	<0.0006	<0.0006	
0021	SD006	AEC B	12 Oct 2022	0021 SD006 221012	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	0.0105	<0.0006	<0.0002	<0.0006	<0.0006	<0.0006	<0.0002	<0.0006	<0.0006	
0021	SD006	AEC B	19 Apr 2023	0021 SD006 230419	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	0.0007	<0.0006	<0.0002	<0.0006	<0.0006	<0.0006	<0.0002	<0.0006	<0.0006	
0021	SD006	AEC B	18 Oct 2023	0021 SD006 231018	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	0.0035	<0.0012	<0.0005	<0.0012	<0.0012	<0.0012	<0.0005	<0.0012	<0.0012	
0021	SD006	AEC B	10 Apr 2024	0021 SD006 240410	Normal	ACT 0021 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	0.0013	<0.0006	<0.0002	<0.0006	<0.0006	<0.0006	<0.0002	<0.0006	<0.0006	
0021	SD007	AEC B	11 Apr 2017	B SED02 0-0.1	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD007	AEC B	20 Oct 2021	0021 QC104 211020	Field_D	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD007	AEC B	20 Oct 2021	0021 SD007 211020	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD007	AEC B	07 Apr 2022	0021 SD007 220407	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD007	AEC B	12 Oct 2022	0021 SD007 221012	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0006	<0.0002	<0.0006	<0.0006	
0021	SD007	AEC B	20 Apr 2023	0021 QC114 230420	Field_D	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD007	AEC B	20 Apr 2023	0021 QC214 230420	Interlab_D	ACT 0021 PFASOMP 23	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.0002	<0.005	
0021	SD007	AEC B	20 Apr 2023	0021 SD007 230420	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD007	AEC B	18 Oct 2023	0021 SD007 231018	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD007	AEC B	10 Apr 2024	0021 SD007 240410	Normal	ACT 0021 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD009	Captains Lagoon	18 Apr 2017	CL SED09 0-0.05	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD009	Captains Lagoon	20 Oct 2021	0021 SD009 211020	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD009	Captains Lagoon	10 Oct 2022	0021 SD009 221010	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD009	Captains Lagoon	17 Apr 2023	0021 SD009 230417	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD009	Captains Lagoon	16 Oct 2023	0021 SD009 231016	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0012	<0.0005	<0.0012	<0.0012	<0.0012	<0.0005	<0.0012	<0.0012	
0021	SD009	Captains Lagoon	10 Apr 2024	0021 SD009 240410	Normal	ACT 0021 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD012	Site drainage channels	13 Apr 2017	DC SED01 0-0.1	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD012	Site drainage channels	20 Oct 2021	0021 SD012 211020	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD012	Site drainage channels	06 Apr 2022	0021 SD012 220406	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD012	Site drainage channels	14 Oct 2022	0021 SD012 221014	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD012	Site drainage channels	21 Apr 2023	0021 SD012 230421	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD012	Site drainage channels	19 Oct 2023	0021 SD012 231019	Normal	ACT 0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD012	Site drainage channels	12 Apr 2024	0021 SD012 240412	Normal	ACT 0021 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD013	Site drainage channels	13 Apr 2017	DC SED02 0-0.1	Normal	JBT 0021 PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD013	Site drainage channels	20 Oct 2021	0021 SD013 211020	Normal	ACT 0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	
0021	SD013	Site drainage channels	06 Apr																	

Table T10 - Historical Sediment Analytical Results

							PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids											
							Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)		
							mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
LOR							0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0002	0.0002	0.0005
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																					
0021	SD014	Site drainage channels	06 Apr 2022	0021_QC108_220406	Field D	ACT_0021_PFASOMP_21	<0.0002	0.0007	0.0002	0.0009	0.0009	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD014	Site drainage channels	06 Apr 2022	0021_SD014_220406	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0005	0.0005	0.001	0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD014	Site drainage channels	14 Oct 2022	0021_QC215_221014	Interlab D	ACT_0021_PFASOMP_21	<0.0001	0.0002	0.0004	0.0006	0.0006	<0.0001	<0.0001	<0.0001	<0.0002	<0.0002	<0.0001	<0.0001	<0.0001	<0.0005	<0.0005	<0.0002	<0.0002	<0.0005	<0.0005		
0021	SD014	Site drainage channels	14 Oct 2022	0021_SD014_221014	Normal	ACT_0021_PFASOMP_21	<0.0002	<0.0002	0.0007	0.0007	0.0007	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD014	Site drainage channels	21 Apr 2023	0021_SD014_230421	Normal	ACT_0021_PFASOMP_23	<0.0002	0.002	<0.0002	0.002	0.002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD014	Site drainage channels	19 Oct 2023	0021_SD014_231019	Normal	ACT_0021_PFASOMP_23	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD015	Site drainage channels	20 Apr 2017	DC_SED04_0-0.05	Normal	JBT_0021_PFAS	0.0007	0.0168	0.0045	0.0213	0.0239	<0.0002	<0.0002	0.0005	<0.0002	<0.001	<0.0002	0.0014	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD015	Site drainage channels	19 Oct 2021	0021_SD015_211019	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0175	0.0023	0.0198	0.02	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD015	Site drainage channels	05 Apr 2022	0021_SD015_220405	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0115	0.0051	0.0166	0.0175	<0.0002	0.0003	0.0003	<0.0002	<0.001	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD015	Site drainage channels	13 Oct 2022	0021_SD015_221013	Normal	ACT_0021_PFASOMP_21	0.0003	0.0396	0.0096	0.0492	0.0515	0.0003	0.0005	0.0008	<0.0002	<0.001	<0.0002	0.0004	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD015	Site drainage channels	20 Apr 2023	0021_QC115_230420	Field D	ACT_0021_PFASOMP_23	0.0003	0.0377	0.0086	0.0463	0.0487	0.0004	0.0006	0.0007	<0.0002	<0.001	<0.0002	0.0004	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD015	Site drainage channels	20 Apr 2023	0021_QC215_230420	Interlab D	ACT_0021_PFASOMP_23	0.0005	0.047	0.016	0.063	0.067	0.0004	0.0009	0.0012	<0.0002	<0.0002	<0.0002	0.0006	<0.0001	<0.0001	<0.0005	<0.0005	<0.0005	<0.0005	<0.005		
0021	SD015	Site drainage channels	20 Apr 2023	0021_SD015_230420	Normal	ACT_0021_PFASOMP_23	0.0005	0.0608	0.0153	0.0761	0.0815	0.0007	0.0013	0.0017	0.0003	<0.001	<0.0002	0.0009	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD015	Site drainage channels	18 Oct 2023	0021_SD015_231018	Normal	ACT_0021_PFASOMP_23	0.0005	0.055	0.0098	0.0648	0.0683	0.0004	0.0006	0.0008	0.0006	<0.001	<0.0002	0.0006	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD015	Site drainage channels	11 Apr 2024	0021_SD015_240411	Normal	ACT_0021_PFASOMP_24	<0.0002	0.0201	0.0021	0.0222	0.0224	<0.0002	<0.0002	0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD016	Site drainage channels	13 Apr 2017	DC_SED05_0-0.1	Normal	JBT_0021_PFAS	0.0003	0.0258	0.0026	0.0284	0.0293	<0.0002	<0.0002	0.0002	<0.0002	<0.001	<0.0002	0.0004	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD016	Site drainage channels	20 Oct 2021	0021_SD016_211020	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0151	0.0029	0.018	0.0186	<0.0002	<0.0002	<0.0002	0.0002	<0.001	<0.0002	0.0004	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD016	Site drainage channels	06 Apr 2022	0021_SD016_220406	Normal	ACT_0021_PFASOMP_21	0.0002	0.0053	0.005	0.0103	0.0122	<0.0002	<0.0002	0.0003	<0.0002	<0.001	0.0004	0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD016	Site drainage channels	14 Oct 2022	0021_QC115_221014	Field D	ACT_0021_PFASOMP_21	<0.0002	0.0145	0.0014	0.0159	0.0174	<0.0002	<0.0002	<0.0002	0.0004	<0.001	0.0003	0.0008	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD016	Site drainage channels	14 Oct 2022	0021_SD016_221014	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0143	0.0014	0.0157	0.0172	<0.0002	<0.0002	<0.0002	0.0003	<0.001	0.0003	0.0009	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD016	Site drainage channels	21 Apr 2023	0021_SD016_230421	Normal	ACT_0021_PFASOMP_23	<0.0002	0.0118	0.0019	0.0137	0.0142	<0.0002	<0.0002	<0.0002	0.0002	<0.001	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD016	Site drainage channels	19 Oct 2023	0021_SD016_231019	Normal	ACT_0021_PFASOMP_23	<0.0002	0.02	0.0044	0.0244	0.0257	<0.0002	0.0002	0.0002	<0.0002	<0.001	0.0002	0.0007	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD016	Site drainage channels	12 Apr 2024	0021_SD016_240412	Normal	ACT_0021_PFASOMP_24	<0.0002	0.0159	0.0027	0.0186	0.0189	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005		
0021	SD017	Site drainage channels	13 Apr 2017	DC_SED06_0-0.1	Normal	JBT_0021_PFAS	0.0006	0.0493	0.0059	0.0552	0.0581																

Table T10 - Historical Sediment Analytical Results

							PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides							
							4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	
LOR							mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID	0.0001	0.0001	0.0001	0.0001	0.0002	0.0005	0.0002	0.0005	0.0002	0.0005	0.0002	0.0005
0021	SD014	Site drainage channels	06 Apr 2022	0021_QC108_220406	Field_D	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD014	Site drainage channels	06 Apr 2022	0021_SD014_220406	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD014	Site drainage channels	14 Oct 2022	0021_QC215_221014	Interlab_D	ACT_0021_PFASOMP_21	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.0002	<0.004	<0.001	<0.0002	<0.005
0021	SD014	Site drainage channels	14 Oct 2022	0021_SD014_221014	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD014	Site drainage channels	21 Apr 2023	0021_SD014_230421	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD014	Site drainage channels	19 Oct 2023	0021_SD014_231019	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD015	Site drainage channels	20 Apr 2017	DC_SED04_0-0.05	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD015	Site drainage channels	19 Oct 2021	0021_SD015_211019	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD015	Site drainage channels	05 Apr 2022	0021_SD015_220405	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD015	Site drainage channels	13 Oct 2022	0021_SD015_221013	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD015	Site drainage channels	20 Apr 2023	0021_QC115_230420	Field_D	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD015	Site drainage channels	20 Apr 2023	0021_QC215_230420	Interlab_D	ACT_0021_PFASOMP_23	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.005
0021	SD015	Site drainage channels	20 Apr 2023	0021_SD015_230420	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD015	Site drainage channels	18 Oct 2023	0021_SD015_231018	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD015	Site drainage channels	11 Apr 2024	0021_SD015_240411	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD016	Site drainage channels	13 Apr 2017	DC_SED05_0-0.1	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD016	Site drainage channels	20 Oct 2021	0021_SD016_211020	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD016	Site drainage channels	06 Apr 2022	0021_SD016_220406	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD016	Site drainage channels	14 Oct 2022	0021_QC115_221014	Field_D	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD016	Site drainage channels	14 Oct 2022	0021_SD016_221014	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD016	Site drainage channels	21 Apr 2023	0021_SD016_230421	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD016	Site drainage channels	19 Oct 2023	0021_SD016_231019	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD016	Site drainage channels	12 Apr 2024	0021_SD016_240412	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD017	Site drainage channels	13 Apr 2017	DC_SED06_0-0.1	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD017	Site drainage channels	20 Oct 2021	0021_SD017_211020	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD017	Site drainage channels	06 Apr 2022	0021_SD017_220406	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD017	Site drainage channels	14 Oct 2022	0021_SD017_221014	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD017	Site drainage channels	21 Apr 2023	0021_SD017_230421	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD017	Site drainage channels	19 Oct 2023	0021_SD017_231019	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD017	Site drainage channels	12 Apr 2024	0021_SD017_240412	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD018	Flat Rock Creek	19 Apr 2017	FC_SED06_0.0-0.1	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD018	Flat Rock Creek	20 Oct 2021	0021_QC209_211020	Interlab_D	ACT_0021_PFASOMP_21	<0.001	<0.001	<0.002	<0.002	<0.01	<0.01	<0.002	<0.01	<0.01	<0.002	<0.01	<0.020
0021	SD018	Flat Rock Creek	20 Oct 2021	0021_SD018_211020	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD018	Flat Rock Creek	07 Apr 2022	0021_QC111_220407	Field_D	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD018	Flat Rock Creek	07 Apr 2022	0021_QC211_220407	Interlab_D	ACT_0021_PFASOMP_21	<0.0003	<0.0003	<0.0006	<0.0006	<0.003	<0.003	<0.0006	<0.003	<0.003	<0.0006	<0.003	<0.02
0021	SD018	Flat Rock Creek	07 Apr 2022	0021_SD018_220407	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD018	Flat Rock Creek	12 Oct 2022	0021_SD018_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD018	Flat Rock Creek	19 Apr 2023	0021_SD018_230419	Normal	ACT_0021_PFASOMP_23	<0.0005	0.0008	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD018	Flat Rock Creek	18 Oct 2023	0021_SD018_231018	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD018	Flat Rock Creek	10 Apr 2024	0021_SD018_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD020	Flat Rock Creek	18 Apr 2017	JCQA04	Interlab_D	JBT_0021_PFAS	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.01	<0.005	<0.005	<0.01	<0.005	<0.005
0021	SD020	Flat Rock Creek	19 Apr 2017	FC_SED08_0.0-0.05	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	<0.0006
0021	SD020	Flat Rock Creek	20 Oct 2021	0021_QC109_211020	Field_D	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD020	Flat Rock Creek	20 Oct 2021	0021_SD020_211020	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD020	Flat Rock Creek	07 Apr 2022	0021_SD020_220407	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD020	Flat Rock Creek	13 Oct 2022	0021_SD020_221013	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD020	Flat Rock Creek	19 Apr 2023	0021_SD020_230419	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD020	Flat Rock Creek	18 Oct 2023	0021_SD020_231018	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005
0021	SD020	Flat Rock Creek	10 Apr 2024	0021_SD020_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.00					

Table T10 - Historical Sediment Analytical Results

							PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids														
							Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)					
LOR							0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0005
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																								
0021	SD021	Flat Rock Creek	10 Apr 2024	0021_SD021_240410	Normal	ACT_0021_PFASOMP_24	<0.0002	0.0048	0.001	0.0058	0.0058	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD023	AEC C	19 Apr 2017	FC_SED11_0.0-0.05	Normal	JBT_0021_PFAS	<0.0002	0.0121	0.0017	0.0138	0.014	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD023	AEC C	21 Oct 2021	0021_SD023_211021	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0008	<0.0002	0.0008	0.0026	0.0018	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD023	AEC C	06 Apr 2022	0021_SD023_220406	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0072	0.0011	0.0083	0.0083	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD023	AEC C	12 Oct 2022	0021_SD023_221012	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0101	0.0281	0.0382	0.0512	0.002	0.0024	<0.0002	<0.0002	<0.001	0.0015	0.0065	0.0006	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD023	AEC C	20 Apr 2023	0021_SD023_230420	Normal	ACT_0021_PFASOMP_23	<0.0002	0.0029	0.0034	0.0063	0.0074	<0.0002	0.0003	<0.0002	<0.0002	<0.001	<0.0002	0.0008	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD023	AEC C	18 Oct 2023	0021_SD023_231018	Normal	ACT_0021_PFASOMP_23	<0.0002	0.0284	0.0061	0.0345	0.0367	0.0005	0.0004	<0.0002	0.0006	<0.001	<0.0002	0.0004	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD023	AEC C	10 Apr 2024	0021_SD023_240410	Normal	ACT_0021_PFASOMP_24	<0.0002	0.029	0.0026	0.0316	0.037	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	0.0009	0.001	0.001	0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD028	Lake McKenzie	14 May 2018	LM_SD03_0.0_180514	Normal	JBT_0021_PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD028	Lake McKenzie	21 Oct 2021	0021_SD028_211021	Normal	ACT_0021_PFASOMP_21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD028	Lake McKenzie	05 Apr 2022	0021_SD028_220405	Normal	ACT_0021_PFASOMP_21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD028	Lake McKenzie	10 Oct 2022	0021_QC101_221010	Field_D	ACT_0021_PFASOMP_21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD028	Lake McKenzie	10 Oct 2022	0021_SD028_221010	Normal	ACT_0021_PFASOMP_21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD028	Lake McKenzie	18 Apr 2023	0021_SD028_230418	Normal	ACT_0021_PFASOMP_23	<0.0002	<0.0002	<0.0002	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD028	Lake McKenzie	17 Oct 2023	0021_SD028_231017	Normal	ACT_0021_PFASOMP_23	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD028	Lake McKenzie	09 Apr 2024	0021_SD028_240409	Normal	ACT_0021_PFASOMP_24	<0.0002	0.0002	<0.0002	0.0002	0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD029	Lake McKenzie	11 Feb 2019	LM_SD04_0.0_190211	Normal	JBT_0021_PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD029	Lake McKenzie	11 Feb 2019	LM_SD04_0.2_190211	Normal	JBT_0021_PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD029	Lake McKenzie	18 Mar 2019	LM_QC102_190318	Field_D	JBT_0021_PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD029	Lake McKenzie	18 Mar 2019	LM_SD0																										

Table T10 - Historical Sediment Analytical Results

							PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides							
							4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	
LOR							mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID												
0021	SD021	Flat Rock Creek	10 Apr 2024	0021_SD021_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD023	AEC C	19 Apr 2017	FC_SED11_0.0-0.05	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD023	AEC C	21 Oct 2021	0021_SD023_211021	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD023	AEC C	06 Apr 2022	0021_SD023_220406	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD023	AEC C	12 Oct 2022	0021_SD023_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD023	AEC C	20 Apr 2023	0021_SD023_230420	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD023	AEC C	18 Oct 2023	0021_SD023_231018	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD023	AEC C	10 Apr 2024	0021_SD023_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	0.002	
0021	SD028	Lake McKenzie	14 May 2018	LM_SD03_0.0_180514	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD028	Lake McKenzie	21 Oct 2021	0021_SD028_211021	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD028	Lake McKenzie	05 Apr 2022	0021_SD028_220405	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD028	Lake McKenzie	10 Oct 2022	0021_QC101_221010	Field_D	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD028	Lake McKenzie	10 Oct 2022	0021_SD028_221010	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD028	Lake McKenzie	18 Apr 2023	0021_SD028_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD028	Lake McKenzie	17 Oct 2023	0021_SD028_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD028	Lake McKenzie	09 Apr 2024	0021_SD028_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD029	Lake McKenzie	11 Feb 2019	LM_SD04_0.0_190211	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD029	Lake McKenzie	11 Feb 2019	LM_SD04_0.2_190211	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD029	Lake McKenzie	18 Mar 2019	LM_QC102_190318	Field_D	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD029	Lake McKenzie	18 Mar 2019	LM_SD04_190318	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD029	Lake McKenzie	22 Oct 2021	0021_SD029_211022	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD029	Lake McKenzie	05 Apr 2022	0021_SD029_220405	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD029	Lake McKenzie	10 Oct 2022	0021_SD029_221010	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD029	Lake McKenzie	18 Apr 2023	0021_SD029_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD029	Lake McKenzie	17 Oct 2023	0021_SD029_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD029	Lake McKenzie	10 Apr 2024	0021_SD029_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	0.0012	
0021	SD030	Lake Windermere	14 May 2018	LW_SD01_0.0_180514	Normal	JBT_0021_PFAS	-	-	-	-	-	-	-	-	-	-	-	
0021	SD030	Lake Windermere	12 Feb 2019	LW_QC208_190212	Interlab_D	JBT_0021_PFAS	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.01	<0.005	<0.005	<0.01	<0.005	
0021	SD030	Lake Windermere	12 Feb 2019	LW_SD01_0.0_190212	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD030	Lake Windermere	12 Feb 2019	LW_SD01_0.2_190212	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD030	Lake Windermere	18 Mar 2019	LW_SD01_190318	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD030	Lake Windermere	22 Oct 2021	0021_SD031_211022	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD030	Lake Windermere	06 Apr 2022	0021_QC205_220406	Interlab_D	ACT_0021_PFASOMP_21	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0021	SD030	Lake Windermere	06 Apr 2022	0021_SD031_220406	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD030	Lake Windermere	10 Oct 2022	0021_SD031_221010	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD030	Lake Windermere	18 Apr 2023	0021_SD030_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD030	Lake Windermere	17 Oct 2023	0021_SD030_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD030	Lake Windermere	09 Apr 2024	0021_SD030_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	16 May 2018	LW_QC118_180516	Field_D	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	16 May 2018	LW_SD02_0.0_180516	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	12 Feb 2019	LW_SD02_0.0_190212	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	18 Mar 2019	LW_QC110_190319	Field_D	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	18 Mar 2019	LW_SD02_190319	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	22 Oct 2021	0021_SD030_211022	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	05 Apr 2022	0021_SD030_220405	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	10 Oct 2022	0021_SD030_221010	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	18 Apr 2023	0021_SD031_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	17 Oct 2023	0021_QC101_231017	Field_D	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	17 Oct 2023	0021_QC201_231017	Interlab_D	ACT_0021_PFASOMP_23	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0021	SD031	Lake Windermere	17 Oct 2023	0021_SD031_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	09 Apr 2024	0021_QC102_240409	Field_D	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD031	Lake Windermere	09 Apr 2024	0021_QC202_240409	Interlab_D	ACT_0021_PFASOMP_24	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0021	SD031	Lake Windermere	09 Apr 2024	0021_SD031_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005									

Table T10 - Historical Sediment Analytical Results

							PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids											
							Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTriDA)	Perfluorotetradecanoic acid (PFTeDA)		
							mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg		
LOR							0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0005		
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																					
0021	SD032	Lake Windermere	22 Oct 2021	0021_SD032_211022	Normal	ACT 0021 PFASOMP 21	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD035	Mary Creek	20 Mar 2018	MC_SD01_0.0_180320	Normal	JBT 0021 PFAS	<0.0002	0.0003	<0.0002	0.0003	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD035	Mary Creek	20 Mar 2018	MC_SD01_0.3_180320	Normal	JBT 0021 PFAS	<0.0002	0.0007	<0.0002	0.0007	-	<0.0002	-	-	-	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	-	-	-	-			
0021	SD035	Mary Creek	01 May 2018	MC_SD01_0.0_180501	Normal	JBT 0021 PFAS	<0.0002	0.0011	0.0005	0.0016	0.0016	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD035	Mary Creek	12 Oct 2022	0021_SD035_221012	Normal	ACT 0021 PFASOMP 21	<0.0002	0.0574	0.0034	0.0608	0.0608	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0006			
0021	SD035	Mary Creek	18 Apr 2023	0021_SD035_230418	Normal	ACT 0021 PFASOMP 23	<0.0002	0.0002	<0.0002	0.0002	0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD035	Mary Creek	17 Oct 2023	0021_SD035_231017	Normal	ACT 0021 PFASOMP 23	<0.0002	0.0014	<0.0002	0.0014	0.0014	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD035	Mary Creek	09 Apr 2024	0021_SD035_240409	Normal	ACT 0021 PFASOMP 24	<0.0002	0.0322	0.0044	0.0366	0.0386	<0.0002	<0.0002	0.0005	0.0011	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD036	Mary Creek	23 Mar 2018	MC_SD02_0.0_180323	Normal	JBT 0021 PFAS	<0.0002	0.0004	<0.0002	0.0004	0.0004	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD036	Mary Creek	11 Oct 2022	0021_SD036_221011	Normal	ACT 0021 PFASOMP 21	<0.0002	0.0137	0.0014	0.0151	0.0161	<0.0002	<0.0002	<0.0002	0.001	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD036	Mary Creek	18 Apr 2023	0021_SD036_230418	Normal	ACT 0021 PFASOMP 23	<0.0002	0.0018	0.0003	0.0021	0.0021	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD036	Mary Creek	17 Oct 2023	0021_SD036_231017	Normal	ACT 0021 PFASOMP 23	<0.0002	0.0014	0.0002	0.0016	0.0016	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD036	Mary Creek	09 Apr 2024	0021_SD036_240409	Normal	ACT 0021 PFASOMP 24	0.0012	0.446	0.0153	0.461	0.484	0.0003	0.0003	0.004	0.0109	0.001	0.0009	0.002	<0.0002	<0.0002	<0.0002	0.0003	<0.0002	<0.0005			
0021	SD037	Mary Creek	23 Mar 2018	MC_SD03_0.0_180323	Normal	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD037	Mary Creek	05 May 2018	MC_SD03_0.0_180501	Normal	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD037	Mary Creek	11 Oct 2022	0021_SD037_221011	Normal	ACT 0021 PFASOMP 21	<0.0002	0.0006	<0.0002	0.0006	0.0006	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD037	Mary Creek	18 Apr 2023	0021_SD037_230418	Normal	ACT 0021 PFASOMP 23	<0.0002	0.001	<0.0002	0.001	0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD037	Mary Creek	17 Oct 2023	0021_SD037_231017	Normal	ACT 0021 PFASOMP 23	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD037	Mary Creek	09 Apr 2024	0021_SD037_240409	Normal	ACT 0021 PFASOMP 24	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD040	Mary Creek	28 Mar 2018	MC_QC110_180328	Field_D	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD040	Mary Creek	05 Apr 2018	MC_SD06_0.0_180405	Normal	JBT 0021 PFAS	<0.0002	0.0044	0.0023	0.0067	0.0069	<0.0002	<0.0002	0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD040	Mary Creek	12 Oct 2022	0021_SD040_221012	Normal	ACT 0021 PFASOMP 21	<0.0002	0.0022	0.0002	0.0024	0.0024	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD040	Mary Creek	19 Apr 2023	0021_SD040_230419	Normal	ACT 0021 PFASOMP 23	<0.0002	0.0005	<0.0002	0.0005	0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD040	Mary Creek	18 Oct 2023	0021_SD040_231018	Normal	ACT 0021 PFASOMP 23	<0.0002	0.0003	<0.0002	0.0003	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005			
0021	SD040	Mary Creek	10 Apr 2024	0021_SD040_240410	Normal	ACT 0021 PFASOMP 24</																					

Table T10 - Historical Sediment Analytical Results

							PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides						
							4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)
							mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
LOR							0.0001	0.0001	0.0001	0.0001	0.0002	0.0005	0.0002	0.0005	0.0005	0.0002	0.0005
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID											
0021	SD032	Lake Windermere	22 Oct 2021	0021_SD032_211022	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD035	Mary Creek	20 Mar 2018	MC_SD01_0.0_180320	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD035	Mary Creek	20 Mar 2018	MC_SD01_0.3_180320	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	-	-	-	-	-	-	-
0021	SD035	Mary Creek	01 May 2018	MC_SD01_0.0_180501	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD035	Mary Creek	12 Oct 2022	0021_SD035_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006
0021	SD035	Mary Creek	18 Apr 2023	0021_SD035_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD035	Mary Creek	17 Oct 2023	0021_SD035_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD035	Mary Creek	09 Apr 2024	0021_SD035_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	0.0004	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD036	Mary Creek	23 Mar 2018	MC_SD02_0.0_180323	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD036	Mary Creek	11 Oct 2022	0021_SD036_221011	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD036	Mary Creek	18 Apr 2023	0021_SD036_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD036	Mary Creek	17 Oct 2023	0021_SD036_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD036	Mary Creek	09 Apr 2024	0021_SD036_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	0.002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD037	Mary Creek	23 Mar 2018	MC_SD03_0.0_180323	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD037	Mary Creek	05 May 2018	MC_SD03_0.0_180501	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD037	Mary Creek	11 Oct 2022	0021_SD037_221011	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD037	Mary Creek	18 Apr 2023	0021_SD037_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD037	Mary Creek	17 Oct 2023	0021_SD037_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD037	Mary Creek	09 Apr 2024	0021_SD037_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD040	Mary Creek	28 Mar 2018	MC_QC110_180328	Field_D	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD040	Mary Creek	05 Apr 2018	MC_SD06_0.0_180405	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD040	Mary Creek	12 Oct 2022	0021_SD040_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD040	Mary Creek	19 Apr 2023	0021_SD040_230419	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD040	Mary Creek	18 Oct 2023	0021_SD040_231018	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD040	Mary Creek	10 Apr 2024	0021_SD040_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD043	Mary Creek	28 Mar 2018	MC_SD09_0.0_180328	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD043	Mary Creek	28 Mar 2018	MC_SD09_0.0_180328	Normal	JBT_0021_PFAS	-	-	-	-	-	-	-	-	-	-	-
0021	SD044	Mary Creek	20 Mar 2018	MC_SD10_0.0_180320	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD044	Mary Creek	20 Mar 2018	MC_SD10_0.3_180320	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	-	-	-	-	-	-	-
0021	SD044	Mary Creek	28 Mar 2018	MC_SD10_0.0_180328	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	-	-	-	-	-	-	-
0021	SD044	Mary Creek	28 Mar 2018	MC_SD10_0.2_180328	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	-	-	-	-	-	-	-
0021	SD044	Mary Creek	12 Oct 2022	0021_SD044_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD044	Mary Creek	18 Apr 2023	0021_SD044_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD044	Mary Creek	17 Oct 2023	0021_QC106_231017	Field_D	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD044	Mary Creek	17 Oct 2023	0021_QC206_231017	Interlab_D	ACT_0021_PFASOMP_23	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005
0021	SD044	Mary Creek	17 Oct 2023	0021_SD044_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD044	Mary Creek	09 Apr 2024	0021_SD044_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD046	Summercloud Creek	23 Mar 2018	SC_SD01_0.0_180323	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD046	Summercloud Creek	12 Oct 2022	0021_SD046_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD046	Summercloud Creek	18 Apr 2023	0021_SD046_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD046	Summercloud Creek	17 Oct 2023	0021_SD046_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD046	Summercloud Creek	09 Apr 2024	0021_SD046_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD047	Summercloud Creek	23 Mar 2018	SC_SD02_0.0_180323	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD047	Summercloud Creek	12 Oct 2022	0021_QC112_221012	Field_D	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD047	Summercloud Creek	12 Oct 2022	0021_SD047_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD047	Summercloud Creek	18 Apr 2023	0021_SD047_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD047	Summercloud Creek	17 Oct 2023	0021_SD047_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD047	Summercloud Creek	09 Apr 2024	0021_SD047_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD048	Summercloud Creek	18 Apr 2023	0021_SD048_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD048	Summercloud Creek	17 Oct 2023	0021_SD048_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD048	Summercloud Creek	09 Apr 2024	0021_SD048_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD049	Summercloud Creek	05 Apr 2018	SC_SD04_0.0_180406	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD049	Summercloud Creek	22 Oct 2021	0021_SD049_211022	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005
0021	SD049	Summercloud Creek	07 Apr 202														

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Table T10 - Historical Sediment Analytical Results

							PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides							
							4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	
LOR							mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
							0.0001	0.0001	0.0001	0.0001	0.0002	0.0005	0.0002	0.0005	0.0005	0.0002	0.0005	0.0005
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID												
0021	SD049	Summercloud Creek	10 Apr 2024	0021_QC108_240410	Field_D	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD049	Summercloud Creek	10 Apr 2024	0021_QC208_240410	Interlab_D	ACT_0021_PFASOMP_24	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0021	SD049	Summercloud Creek	10 Apr 2024	0021_SD049_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD050	Telegraph Creek	21 Mar 2018	TC_SD01_0.0_180321	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD050	Telegraph Creek	21 Oct 2021	0021_SD050_211021	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD050	Telegraph Creek	07 Apr 2022	0021_SD050_220407	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD050	Telegraph Creek	17 Apr 2023	0021_SD050_230417	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD050	Telegraph Creek	16 Oct 2023	0021_SD050_231016	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD050	Telegraph Creek	10 Apr 2024	0021_SD050_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD052	Telegraph Creek	20 Mar 2018	TC_SD03_0.0_180320	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD052	Telegraph Creek	21 Oct 2021	0021_SD052_211021	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	
0021	SD052	Telegraph Creek	07 Apr 2022	0021_SD052_220407	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD052	Telegraph Creek	19 Apr 2023	0021_SD052_230419	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD052	Telegraph Creek	16 Oct 2023	0021_SD052_231016	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	
0021	SD052	Telegraph Creek	08 Apr 2024	0021_SD052_240408	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD054	Telegraph Creek	20 Mar 2018	TC_SD05_0.0_180320	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	
0021	SD054	Telegraph Creek	20 Mar 2018	TC_SD05_0.2_180322	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	-	-	-	-	-	-	-	
0021	SD054	Telegraph Creek	04 Apr 2022	0021_SD054_220404	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	
0021	SD054	Telegraph Creek	19 Apr 2023	0021_SD054_230419	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD054	Telegraph Creek	08 Apr 2024	0021_SD054_240408	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	0.0008	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	
0021	SD058	Telegraph Creek	21 Mar 2018	TC_SD09_0.0_180321	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD058	Telegraph Creek	21 Oct 2021	0021_SD058_211021	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD058	Telegraph Creek	07 Apr 2022	0021_SD058_220407	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD058	Telegraph Creek	12 Oct 2022	0021_SD058_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD058	Telegraph Creek	17 Apr 2023	0021_SD058_230417	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD058	Telegraph Creek	16 Oct 2023	0021_SD058_231016	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD058	Telegraph Creek	10 Apr 2024	0021_SD058_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD059	Telegraph Creek	26 Mar 2018	TC_SD10_0.0_180326	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD059	Telegraph Creek	21 Oct 2021	0021_SD059_211021	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD059	Telegraph Creek	07 Apr 2022	0021_SD059_220407	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD059	Telegraph Creek	12 Oct 2022	0021_QC113_221012	Field_D	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD059	Telegraph Creek	12 Oct 2022	0021_QC213_221012	Interlab_D	ACT_0021_PFASOMP_21	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0021	SD059	Telegraph Creek	12 Oct 2022	0021_SD059_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD059	Telegraph Creek	17 Apr 2023	0021_SD059_230417	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD059	Telegraph Creek	16 Oct 2023	0021_SD059_231016	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD059	Telegraph Creek	10 Apr 2024	0021_SD059_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD066	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2_SD01_0.0_180322	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD066	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2_SD01_0.2_180322	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	-	-	-	-	-	-	-	
0021	SD066	Unnamed Water Body (Clay Pools)	11 Feb 2019	UN2_SD01_0.0_190211	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD066	Unnamed Water Body (Clay Pools)	18 Mar 2019	UN2_SD01_190318	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD066	Unnamed Water Body (Clay Pools)	12 Oct 2022	0021_SD066_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD066	Unnamed Water Body (Clay Pools)	19 Apr 2023	0021_SD066_230419	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	
0021	SD066	Unnamed Water Body (Clay Pools)	18 Oct 2023	0021_QC110_231018	Field_D	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD066	Unnamed Water Body (Clay Pools)	18 Oct 2023	0021_QC210_231018	Interlab_D	ACT_0021_PFASOMP_23	<0.0002	<0.0002	<0.0004	<0.0004	<0.002	<0.002	<0.0004	<0.002	<0.002	<0.0004	<0.01	
0021	SD066	Unnamed Water Body (Clay Pools)	18 Oct 2023	0021_SD066_231018	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD066	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021_SD066_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD067	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2_QC204_180322	Interlab_D	JBT_0021_PFAS	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.01	<0.005	<0.005	<0.01	<0.005	
0021	SD067	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2_SD02_0.0_180322	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD067	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2_SD02_0.2_180322	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	-	-	-	-	-	-	-	
0021	SD067	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN_QC104_180322	Field_D	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD067	Unnamed Water Body (Clay Pools)	11 Feb 2019	UN2_SD02_0.0_190211	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD067	Unnamed Water Body (Clay Pools)	18 Mar 2019	UN2_QC106_190318	Field_D	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005								

Table T10 - Historical Sediment Analytical Results

							PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids													
							Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTTrDA)	Perfluorotetradecanoic acid (PFTeDA)				
							mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
LOR							0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0005
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																							
0021	SD068	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2 SD03 0.0 180322	Normal	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	-	<0.0002	-	-	-	<0.001	<0.0002	<0.0002	<0.0002	-	-	-	-	-	
0021	SD068	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2 SD03 0.2 180322	Normal	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	11 Feb 2019	UN2 QC100 190211	Field_D	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	11 Feb 2019	UN2 QC200 190211	Interlab_D	JBT 0021 PFAS	<0.005	<0.005	<0.005	<0.005	<0.05	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	
0021	SD068	Unnamed Water Body (Clay Pools)	11 Feb 2019	UN2 SD03 0.0 190211	Normal	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	18 Mar 2019	UN2 SD03 190318	Normal	JBT 0021 PFAS	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	12 Oct 2022	0021 SD068 221012	Normal	ACT 0021 PFASOMP 21	<0.0002	0.0013	0.0004	0.0017	0.0017	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	19 Apr 2023	0021 SD068 230419	Normal	ACT 0021 PFASOMP 23	<0.0002	0.0111	<0.0002	0.0111	0.0111	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0006	
0021	SD068	Unnamed Water Body (Clay Pools)	17 Oct 2023	0021 SD068 231017	Normal	ACT 0021 PFASOMP 23	<0.0002	0.0046	0.001	0.0056	0.0056	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD068 240410	Normal	ACT 0021 PFASOMP 24	<0.0002	0.0049	0.0003	0.0052	0.0052	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2 SD04 0.0 180322	Normal	JBT 0021 PFAS	<0.0002	0.0012	<0.0002	0.0012	0.0012	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2 SD04 0.2 180322	Normal	JBT 0021 PFAS	<0.0002	0.0014	<0.0002	0.0014	-	<0.0002	-	-	-	<0.0002	-	-	<0.001	<0.0002	<0.0002	<0.0002	-	-	-	-	-		
0021	SD069	Unnamed Water Body (Clay Pools)	11 Feb 2019	UN2 SD04 0.0 190211	Normal	JBT 0021 PFAS	<0.0002	0.0008	<0.0002	0.0008	0.0008	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	18 Mar 2019	UN2 SD04 190318	Normal	JBT 0021 PFAS	<0.0002	0.0119	0.001	0.0129	0.0129	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	12 Oct 2022	0021 SD069 221012	Normal	ACT 0021 PFASOMP 21	<0.0002	0.0046	0.0007	0.0053	0.0053	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	19 Apr 2023	0021 SD069 230419	Normal	ACT 0021 PFASOMP 23	<0.0002	0.0108	<0.0002	0.0108	0.0108	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	17 Oct 2023	0021 SD069 231017	Normal	ACT 0021 PFASOMP 23	<0.0002	0.0193	0.0012	0.0205	0.0205	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0006	
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 QC107 240410	Field_D	ACT 0021 PFASOMP 24	<0.0002	0.046	0.0052	0.0512	0.0512	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0006	
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 QC207 240410	Interlab_D	ACT 0021 PFASOMP 24	0.0002	0.043	0.0044	0.047	0.048	0.0001	<0.0001	<0.0001	<0.0002	<0.0002	<0.0002	0.0004	0.0001	<0.002	<0.002	0.0001	0.0001	<0.002	<0.002	<0.0050	<0.0005	<0.005	
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021 SD069 240410	Normal	ACT 0021 PFASOMP 24	<0.0002	0.0404	0.0044	0.0448	0.0457	<0.0002	<0.0002	<0.0002	0.0009	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005	
0021	SD070	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2 SD05 0.0 180322	Normal	JBT 0021 PFAS	<0.0002	0.0007	<0.0002	0.0007	0.0007	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0001	<0.0002	<0.0002	<0.0002	<0.0002						

							PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides							
							4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	
LOR							mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
							0.0001	0.0001	0.0001	0.0001	0.0002	0.0005	0.0002	0.0005	0.0005	0.0002	0.0005	0.0005
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID												
0021	SD068	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2_SD03_0.0_180322	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2_SD03_0.2_180322	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	-	-	-	-	-	-	-	
0021	SD068	Unnamed Water Body (Clay Pools)	11 Feb 2019	UN2_QC100_190211	Field_D	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	11 Feb 2019	UN2_QC200_190211	Interlab_D	JBT_0021_PFAS	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.01	<0.005	<0.005	<0.01	<0.005	
0021	SD068	Unnamed Water Body (Clay Pools)	11 Feb 2019	UN2_SD03_0.0_190211	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	18 Mar 2019	UN2_SD03_190318	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	12 Oct 2022	0021_SD068_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	19 Apr 2023	0021_SD068_230419	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	
0021	SD068	Unnamed Water Body (Clay Pools)	17 Oct 2023	0021_SD068_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD068	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021_SD068_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2_SD04_0.0_180322	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2_SD04_0.2_180322	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	-	-	-	-	-	-	-	
0021	SD069	Unnamed Water Body (Clay Pools)	11 Feb 2019	UN2_SD04_0.0_190211	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	18 Mar 2019	UN2_SD04_190318	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	12 Oct 2022	0021_SD069_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	19 Apr 2023	0021_SD069_230419	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD069	Unnamed Water Body (Clay Pools)	17 Oct 2023	0021_SD069_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021_QC107_240410	Field_D	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021_QC207_240410	Interlab_D	ACT_0021_PFASOMP_24	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.01	<0.0002	<0.005	<0.005	<0.0002	<0.02	
0021	SD069	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021_SD069_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD070	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2_SD05_0.0_180322	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD070	Unnamed Water Body (Clay Pools)	22 Mar 2018	UN2_SD05_0.2_180322	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	-	-	-	-	-	-	-	
0021	SD070	Unnamed Water Body (Clay Pools)	11 Feb 2019	UN2_SD05_0.0_190211	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD070	Unnamed Water Body (Clay Pools)	18 Mar 2019	UN2_SD05_190318	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD070	Unnamed Water Body (Clay Pools)	12 Oct 2022	0021_QC212_221012	Interlab_D	ACT_0021_PFASOMP_21	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005	
0021	SD070	Unnamed Water Body (Clay Pools)	12 Oct 2022	0021_SD070_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD070	Unnamed Water Body (Clay Pools)	19 Apr 2023	0021_SD070_230419	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	
0021	SD070	Unnamed Water Body (Clay Pools)	17 Oct 2023	0021_SD070_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD070	Unnamed Water Body (Clay Pools)	10 Apr 2024	0021_SD070_240410	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD073	Ryan's Swamp	19 Mar 2018	UN3_SD03_0.0_180319	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD073	Ryan's Swamp	19 Mar 2018	UN3_SD03_0.2_180319	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	-	-	-	-	-	-	-	
0021	SD073	Ryan's Swamp	17 May 2018	UN3_SD03_0.0_180517	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0006	<0.0002	<0.0006	<0.0006	<0.0002	<0.0006	
0021	SD073	Ryan's Swamp	22 Oct 2021	0021_QC113_211022	Field_D	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD073	Ryan's Swamp	22 Oct 2021	0021_SD073_211022	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD073	Ryan's Swamp	10 Oct 2022	0021_SD073_221010	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD073	Ryan's Swamp	18 Apr 2023	0021_SD073_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD073	Ryan's Swamp	17 Oct 2023	0021_SD073_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD073	Ryan's Swamp	09 Apr 2024	0021_SD073_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD075	Summercloud Creek	28 Mar 2018	UN3_SD05_0.0_180328	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD075	Summercloud Creek	28 Mar 2018	UN_QC210_180328	Interlab_D	JBT_0021_PFAS	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.01	<0.005	<0.005	<0.01	<0.005	
0021	SD075	Summercloud Creek	12 Oct 2022	0021_SD075_221012	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD075	Summercloud Creek	18 Apr 2023	0021_SD075_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD075	Summercloud Creek	17 Oct 2023	0021_SD075_231017	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD075	Summercloud Creek	09 Apr 2024	0021_SD075_240409	Normal	ACT_0021_PFASOMP_24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD080	Lake McKenzie	12 Feb 2019	LM_QC101_190212	Field_D	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD080	Lake McKenzie	12 Feb 2019	LM_QC201_190212	Interlab_D	JBT_0021_PFAS	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.01	<0.005	<0.005	<0.01	<0.005	
0021	SD080	Lake McKenzie	12 Feb 2019	LM_SD01_0.0_190212	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD080	Lake McKenzie	18 Mar 2019	LM_SD01_190318	Normal	JBT_0021_PFAS	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD080	Lake McKenzie	21 Oct 2021	0021_SD080_211021	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD080	Lake McKenzie	05 Apr 2022	0021_SD080_220405	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD080	Lake McKenzie	10 Oct 2022	0021_SD080_221010	Normal	ACT_0021_PFASOMP_21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD080	Lake McKenzie	18 Apr 2023	0021_SD080_230418	Normal	ACT_0021_PFASOMP_23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005	
0021	SD0																	

Table T10 - Historical Sediment Analytical Results

	PFAS					PFAS - Perfluoroalkyl Sulfonic Acids				PFAS - Perfluoroalkyl Carboxylic Acids											
	Perfluorooctanoic acid (PFOA)	Perfluorooctane sulfonic acid (PFOS)	Perfluorohexane sulfonic acid (PFHxS)	Sum of PFHxS and PFOS	Sum of PFAS	Perfluorobutane sulfonic acid (PFBS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorodecane sulfonic acid (PFDS)	Perfluorobutanoic acid (PFBA)	Perfluoropentanoic acid (PFPeA)	Perfluorohexanoic acid (PFHxA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorodecanoic acid (PFDA)	Perfluoroundecanoic acid (PFUnDA)	Perfluorododecanoic acid (PFDoDA)	Perfluorotridecanoic acid (PFTTrDA)	Perfluorotetradecanoic acid (PFTTeDA)		
	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
LOR	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0001	0.0001	0.0001	0.0002	0.0002	0.0002	0.0002	0.0002	0.0005	

Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID																			
0021	SD093	Lake Windermere	09 Apr 2024	0021_SD093_240409	Normal	ACT_0021_PFASOMP_24	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
0021	SD110	Site drainage channels	20 Oct 2021	0021_QC206_211020	Interlab_D	ACT_0021_PFASOMP_21	<0.0001	0.004	0.0005	0.0044	0.0044	<0.0001	<0.0001	<0.0001	<0.0002	<0.0002	<0.0002	<0.0001	<0.0001	<0.0001	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
0021	SD110	Site drainage channels	20 Oct 2021	0021_SD110_211020	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0013	<0.0002	0.0013	0.0013	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD110	Site drainage channels	06 Apr 2022	0021_SD110_220406	Normal	ACT_0021_PFASOMP_21	<0.0002	0.002	0.0002	0.0022	0.0022	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD110	Site drainage channels	14 Oct 2022	0021_SD110_221014	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0003	<0.0002	0.0003	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD110	Site drainage channels	21 Apr 2023	0021_SD110_230421	Normal	ACT_0021_PFASOMP_23	<0.0002	0.0009	0.0002	0.0011	0.0011	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD110	Site drainage channels	19 Oct 2023	0021_SD110_231019	Normal	ACT_0021_PFASOMP_23	<0.0002	0.0048	0.0018	0.0066	0.008	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	0.0004	0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD110	Site drainage channels	12 Apr 2024	0021_SD110_240412	Normal	ACT_0021_PFASOMP_24	0.0005	0.0005	0.0046	0.0051	0.006	<0.0002	0.0002	0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD111	Mary Creek	11 Oct 2022	0021_SD111_221011	Normal	ACT_0021_PFASOMP_21	<0.0002	0.0046	0.0004	0.005	0.005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD111	Mary Creek	17 Oct 2023	0021_QC100_231017	Field_D	ACT_0021_PFASOMP_23	<0.0002	0.0111	0.0034	0.0145	0.0153	0.0004	<0.0002	0.0004	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD111	Mary Creek	17 Oct 2023	0021_QC200_231017	Interlab_D	ACT_0021_PFASOMP_23	<0.0003	0.0098	0.0022	0.012	0.012	<0.0003	<0.0003	<0.0003	<0.0006	<0.0006	<0.0006	<0.0003	<0.0003	<0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.02
0021	SD111	Mary Creek	17 Oct 2023	0021_SD111_231017	Normal	ACT_0021_PFASOMP_23	<0.0002	0.0042	0.0012	0.0054	0.0056	0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005
0021	SD111	Mary Creek	09 Apr 2024	0021_SD111_240409	Normal	ACT_0021_PFASOMP_24	0.0005	0.17	0.0181	0.188	0.196	0.0005	0.001	0.002	0.0021	<0.0002	0.0002	0.0009	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0005

Notes
LOR Limit of Reporting
Normal Primary sample
Field_D Intra-laboratory duplicate sample
Interlab_D Inter-laboratory duplicate sample

Table T10 - Historical Sediment Analytical Results

								PFAS - (n:2) Fluorotelomer Sulfonic Acids				PFAS - Perfluoroalkyl Sulfonamides								
								4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	Perfluorooctane sulfonamide (FOSA)	N-Methyl perfluorooctane sulfonamide (MeFOSA)	N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	N-Ethyl perfluorooctane sulfonamide (EtFOSA)	N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)		
LOR								mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
								0.0001	0.0001	0.0001	0.0001	0.0002	0.0005	0.0002	0.0005	0.0005	0.0002	0.0005	0.0005	
Site ID	Location Code	Area	Date	Field ID	Sample Type	Project ID														
0021	SD093	Lake Windermere	09 Apr 2024	0021 SD093 240409	Normal	ACT	0021 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005		
0021	SD110	Site drainage channels	20 Oct 2021	0021 QC206 211020	Interlab D	ACT	0021 PFASOMP 21	<0.0001	<0.0001	<0.0002	<0.0002	<0.001	<0.001	<0.0002	<0.001	<0.001	<0.0002	<0.005		
0021	SD110	Site drainage channels	20 Oct 2021	0021 SD110 211020	Normal	ACT	0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005		
0021	SD110	Site drainage channels	06 Apr 2022	0021 SD110 220406	Normal	ACT	0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005		
0021	SD110	Site drainage channels	14 Oct 2022	0021 SD110 221014	Normal	ACT	0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005		
0021	SD110	Site drainage channels	21 Apr 2023	0021 SD110 230421	Normal	ACT	0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005		
0021	SD110	Site drainage channels	19 Oct 2023	0021 SD110 231019	Normal	ACT	0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005		
0021	SD110	Site drainage channels	12 Apr 2024	0021 SD110 240412	Normal	ACT	0021 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005		
0021	SD111	Mary Creek	11 Oct 2022	0021 SD111 221011	Normal	ACT	0021 PFASOMP 21	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005		
0021	SD111	Mary Creek	17 Oct 2023	0021 QC100 231017	Field D	ACT	0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005		
0021	SD111	Mary Creek	17 Oct 2023	0021 QC200 231017	Interlab D	ACT	0021 PFASOMP 23	<0.0003	<0.0003	<0.0006	<0.0006	<0.003	<0.003	<0.0006	<0.003	<0.003	<0.001	<0.02		
0021	SD111	Mary Creek	17 Oct 2023	0021 SD111 231017	Normal	ACT	0021 PFASOMP 23	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005		
0021	SD111	Mary Creek	09 Apr 2024	0021 SD111 240409	Normal	ACT	0021 PFASOMP 24	<0.0005	<0.0005	<0.0005	<0.0005	0.0003	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0005		

Notes
LOR Limit of Reporting
Normal Primary sample
Field_D Intra-laboratory duplicate sample
Interlab_D Inter-laboratory duplicate sample

Appendix C

Calibration Certificates

Certificate of Service and Calibration
Interface Meter
Heron H.Oil



Company Name	WAM Scientific
Office Address	26 Bungarra Crescent, Chipping Norton NSW 2170
Phone Number	+61 405 241 484
Contact Name	
Instrument	Heron H.Oil Interface Meter (60m)
Serial Number	01-8287
Client Name	(AECOM Australia Pty Ltd)
Project Number	60612562/4.1

Item	Test	Test Passed	Comments
9V Battery	Klein Tools MM300 Multimeter	✓	Battery voltage reading above 7.9V
Battery Box	Check	✓	No damage
Face and Back Plates	Check	✓	No damage
Thumb Screws	Check	✓	Rubber ends intact
Tape Hangar/Protector	Check	✓	No damage
On/Off Button	Operation	✓	Button is functional
Buzzer	Operation	✓	Intermittent tone in H ₂ O, solid tone in product
LED Signal Light	Operation	✓	LED light functional – green and red
Probe	Operation/Check	✓	Decontaminated, cleaned and tested
Tape	Condition/Check	✓	Decontaminated and cleaned, no damage
Connection	Check	✓	Probe and link connected correctly and tightly
PCB	Operation	✓	Unit is fully functional
Electronics Panel	Orientation	✓	Correctly aligned

Instrument Readings		
Product	Buzzer	LED Light
H ₂ O	Intermittent	Blinking – Red
Petroleum	Solid	Steady – Red

Declaration
WAM Scientific certifies that the above instrument was successfully tested according to manufacturer's standards and all necessary checks were conducted to ensure the instrument was fully operational prior to dispatch. The interface meter was decontaminated, cleaned and tested with a mixture of tap water and petrol, shielded from ambient light.

Checked By		03/04/2024
Calibration Date		03/10/2024
Calibration Due		



WAM Scientific:
26 Bungarra Crescent
CHIPPING NORTON NSW 2170
T: +61 405 241 484 | +61 424 198 667
E: rentals@wamscientific.com.au
E: accounts@wamscientific.com.au

Certificate of Service and Calibration
Interface Meter
Heron H.Oil

Company Name	WAM Scientific
Office Address	26 Bungarra Crescent, Chipping Norton NSW 2170
Phone Number	+61 405 241 484
Contact Name	[REDACTED]
Instrument	Heron H.Oil Interface Meter (30m)
Serial Number	01-8640
Client Name	[REDACTED] (AECOM Australia Pty Ltd)
Project Number	60612562/4.1

Instrument Check			
Item	Test	Test Passed	Comments
9V Battery	Klein Tools MM300 Multimeter	✓	Battery voltage reading above 7.9V
Battery Box	Check	✓	No damage
Face and Back Plates	Check	✓	No damage
Thumb Screws	Check	✓	Rubber ends intact
Tape Hangar/Protector	Check	✓	No damage
On/Off Button	Operation	✓	Button is functional
Buzzer	Operation	✓	Intermittent tone in H ₂ O, solid tone in product
LED Signal Light	Operation	✓	LED light functional – green and red
Probe	Operation/Check	✓	Decontaminated, cleaned and tested
Tape	Condition/Check	✓	Decontaminated and cleaned, no damage
Connection	Check	✓	Probe and link connected correctly and tightly
PCB	Operation	✓	Unit is fully functional
Electronics Panel	Orientation	✓	Correctly aligned

Instrument Readings		
Product	Buzzer	LED Light
H ₂ O	Intermittent	Blinking – Red
Petroleum	Solid	Steady – Red

Declaration
WAM Scientific certifies that the above instrument was successfully tested according to manufacturer's standards and all necessary checks were conducted to ensure the instrument was fully operational prior to dispatch. The interface meter was decontaminated, cleaned and tested with a mixture of tap water and petrol, shielded from ambient light.

Checked By	[REDACTED]
Calibration Date	03/04/2024
Calibration Due	03/10/2024

Certificate of Service and Calibration
Interface Meter
Heron H.Oil

Company Name	WAM Scientific
Office Address	26 Bungarra Crescent, Chipping Norton NSW 2170
Phone Number	+61 405 241 484
Contact Name	
Instrument	Heron H.Oil Interface Meter (30m)
Serial Number	01-8895 (Spare)
Client Name	(AECOM Australia Pty Ltd)
Project Number	60612562/4.1

Instrument Check			
Item	Test	Test Passed	Comments
9V Battery	Klein Tools MM300 Multimeter	✓	Battery voltage reading above 7.9V
Battery Box	Check	✓	No damage
Face and Back Plates	Check	✓	No damage
Thumb Screws	Check	✓	Rubber ends intact
Tape Hangar/Protector	Check	✓	No damage
On/Off Button	Operation	✓	Button is functional
Buzzer	Operation	✓	Intermittent tone in H ₂ O, solid tone in product
LED Signal Light	Operation	✓	LED light functional – green and red
Probe	Operation/Check	✓	Decontaminated, cleaned and tested
Tape	Condition/Check	✓	Decontaminated and cleaned, no damage
Connection	Check	✓	Probe and link connected correctly and tightly
PCB	Operation	✓	Unit is fully functional
Electronics Panel	Orientation	✓	Correctly aligned

Instrument Readings		
Product	Buzzer	LED Light
H ₂ O	Intermittent	Blinking – Red
Petroleum	Solid	Steady – Red

Declaration
WAM Scientific certifies that the above instrument was successfully tested according to manufacturer's standards and all necessary checks were conducted to ensure the instrument was fully operational prior to dispatch. The interface meter was decontaminated, cleaned and tested with a mixture of tap water and petrol, shielded from ambient light.

Checked By	
Calibration Date	03/04/2024
Calibration Due	03/10/2024

Company Name	WAM Scientific
Office Address	26 Bungarra Crescent, Chipping Norton NSW 2170
Phone Number	+61 405 241 484
Contact Name	[REDACTED]
Instrument	YSI Pro Quatro Water Quality Meter w/ 1m Quatro Cable
Serial Number	20D102896
Client Name	[REDACTED] (AECOM Australia Pty Ltd)
Project Number	60612562/4.1
Comments	-

Instrument Check

Item	Test	Test Passed	Comments
2 x Alkaline C-size Batteries	Klein Tools MM300 Multimeter	✓	Both batteries reading above 2.9V
Battery Saver Function	Operation	✓	Automatically turns off after 60 minutes if idle
Unit Display	Operation	✓	Screen visible, no damage
Keypad	Operation	✓	Responsive, no damage
Connection Port and Cable	Condition/Check	✓	Clean, no damage
Monitor Housing	Condition/Check	✓	No damage
Firmware	Version	✓	4.0.0
pH Probe	Condition/Calibration	✓	Calibrated and conforms to manufacturer's specs
pH millivolts for pH 7.00	Calibration	✓	pH 7.00 calibration range between 0 mV $\pm$ 50 mV
pH millivolts for pH 4.00	Calibration	✓	pH 4 mV range +165 to +180 from 7 buffer mV value
pH slope	Calibration	✓	Range between 55 to 60 mV/pH (ideal value 59 mV)
Response time < 90 seconds	Calibration	✓	Responds to correct value within 90 seconds
ORP Probe	Condition/Calibration	✓	Calibrated and conforms to manufacturer's specs
ORP Reading	Calibration	✓	Within $\pm$ 80 mV of reference Zobell Reading
Response time < 90 seconds	Calibration	✓	Responds to correct value within 90 seconds
Conductivity/Temp Probe	Condition/Calibration	✓	Calibrated and conforms to manufacturer's specs
Conductivity Cell	Calibration	✓	Conductivity cell constant 5.0 $\pm$ 1.0 in GLP file
Clean Sensor Readings	Calibration	✓	Clean sensor reads less than 3 uS/cm in dry air
Dissolved Oxygen Probe	Condition/Calibration	✓	Calibrated and conforms to manufacturer's specs
DO Cap	Condition/Calibration	✓	1.25 mil PE membrane (yellow membrane)
DO Sensor in Use	Condition	✓	Polarographic DO sensor
DO Sensor Value	Calibration	✓	(min 4.31 uA - max 8.00 uA) Avg 6.15 uA

Instrument Readings

Parameter	Standard Used	Reference No.	Calibration Value	Observed	Actual	Units
Temperature	Centre 370 Thermometer	Room Temp.	23.0	22.4	23.0	°C
pH	pH 4.00	386466	4.01	4.03	4.01	pH
pH	pH 7.00	387329	7.00	7.07	7.00	pH
Conductivity	2760 μ S/cm at 25°C	388521	2760	2768	2760	μ S/cm
ORP (Ref. check only)	Zobell A & B	380835/382785	233.0	222.7	233.0	mV
Zero Dissolved O ₂	NaSO ₃ in Distilled H ₂ O	389912	0.0	-0.2	0.0	%
100% Dissolved O ₂	100% Air Saturated H ₂ O	Fresh Air	100.0	113.2	100.0	%

Declaration

WAM Scientific certifies that the above instrument was successfully tested according to manufacturer's standards and all necessary checks were conducted to ensure the instrument was fully operational prior to dispatch. The calibration data supplied was obtained in accordance with manufacturer's specifications using solutions of known values.

Calibrated By	[REDACTED]
Calibration Date	03/04/2024
Calibration Due	03/10/2024

Company Name	WAM Scientific
Office Address	26 Bungarra Crescent, Chipping Norton NSW 2170
Phone Number	+61 405 241 484
Contact Name	[REDACTED]
Instrument	YSI Pro Quatro Water Quality Meter w/ 1m Quatro Cable
Serial Number	21C100012
Client Name	[REDACTED] (AECOM Australia Pty Ltd)
Project Number	60612562/4.1
Comments	Brand new pH sensor installed

Instrument Check

Item	Test	Test Passed	Comments
2 x Alkaline C-size Batteries	Klein Tools MM300 Multimeter	✓	Both batteries reading above 2.9V
Battery Saver Function	Operation	✓	Automatically turns off after 60 minutes if idle
Unit Display	Operation	✓	Screen visible, no damage
Keypad	Operation	✓	Responsive, no damage
Connection Port and Cable	Condition/Check	✓	Clean, no damage
Monitor Housing	Condition/Check	✓	No damage
Firmware	Version	✓	4.0.0
pH Probe	Condition/Calibration	✓	Calibrated and conforms to manufacturer's specs
pH millivolts for pH 7.00	Calibration	✓	pH 7.00 calibration range between 0 mV $\pm$ 50 mV
pH millivolts for pH 4.00	Calibration	✓	pH 4 mV range +165 to +180 from 7 buffer mV value
pH slope	Calibration	✓	Range between 55 to 60 mV/pH (ideal value 59 mV)
Response time < 90 seconds	Calibration	✓	Responds to correct value within 90 seconds
ORP Probe	Condition/Calibration	✓	Calibrated and conforms to manufacturer's specs
ORP Reading	Calibration	✓	Within $\pm$ 80 mV of reference Zobell Reading
Response time < 90 seconds	Calibration	✓	Responds to correct value within 90 seconds
Conductivity/Temp Probe	Condition/Calibration	✓	Calibrated and conforms to manufacturer's specs
Conductivity Cell	Calibration	✓	Conductivity cell constant 5.0 $\pm$ 1.0 in GLP file
Clean Sensor Readings	Calibration	✓	Clean sensor reads less than 3 uS/cm in dry air
Dissolved Oxygen Probe	Condition/Calibration	✓	Calibrated and conforms to manufacturer's specs
DO Cap	Condition/Calibration	✓	1.25 mil PE membrane (yellow membrane)
DO Sensor in Use	Condition	✓	Polarographic DO sensor
DO Sensor Value	Calibration	✓	(min 4.31 uA - max 8.00 uA) Avg 6.15 uA

Instrument Readings

Parameter	Standard Used	Reference No.	Calibration Value	Observed	Actual	Units
Temperature	Centre 370 Thermometer	Room Temp.	23.0	25.2	23.0	°C
pH	pH 4.00	386466	4.01	3.47	4.01	pH
pH	pH 7.00	387329	7.00	6.53	7.00	pH
Conductivity	2760 μ S/cm at 25°C	388521	2760	2691	2760	μ S/cm
ORP (Ref. check only)	Zobell A & B	380835/382785	233.0	245.8	233.0	mV
Zero Dissolved O ₂	NaSO ₃ in Distilled H ₂ O	389912	0.0	1.1	0.0	%
100% Dissolved O ₂	100% Air Saturated H ₂ O	Fresh Air	100.0	100.1	100.0	%

Declaration

WAM Scientific certifies that the above instrument was successfully tested according to manufacturer's standards and all necessary checks were conducted to ensure the instrument was fully operational prior to dispatch. The calibration data supplied was obtained in accordance with manufacturer's specifications using solutions of known values.

Calibrated By	[REDACTED]
Calibration Date	03/04/2024
Calibration Due	03/10/2024

ANZ

FQM - Water Quality Meter Calibration Record

Q4AN(EV)-410-FM1

Project Name:	PFAS OMP	Project Number:	60612562		
Project Location:	JBRF and Creswell	Client:	Defence		
PM Name:	JR/GT	Fieldwork Staff Name:	[REDACTED]		

This calibration record is intended to prompt fieldwork staff to calibrate water quality meter (WQM) daily before the start of fieldworks.

INSTRUMENT DETAILS

Supplier:	WAM Scientific				
Make and Model:	YSI PRO				
Serial Number:	200102876				

CALIBRATION

CALIBRATE WITH CALIBRATION SOLUTIONS

Date and Time:					
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:					
Calibration Reading:					
Calibration Temperature:					

ONGOING CHECKS

BUMP TEST WITH CALIBRATION SOLUTION

Date and Time:	8/4/24 6:30AM				
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	9	7	2760	0	
Bump Test Reading:	4.01	7	2757	0.0	
Bump Test Temperature:	25.0	25.0	25.0	25.0	

COMMENTS

Detail any equipment faults, minor maintenance performed, change of batteries or technical support provided.

[REDACTED]

Approval and Distribution

☐ Each individual instrument should be calibrated daily and bump tested as required by fieldwork staff.

Fieldwork Staff Signature: [REDACTED] Date: 8/4/24

Distribution: Project Central File

ANZ

FQM - Water Quality Meter Calibration Record

Q4AN(EV)-410-FM1

Project Name:	PFAS OMP	Project Number:	60612562		
Project Location:	JBRF and Creswell	Client:	Defence		
PM Name:	JR/GT	Fieldwork Staff Name:	[REDACTED]		

This calibration record is intended to prompt fieldwork staff to calibrate water quality meter (WQM) daily before the start of fieldworks.

INSTRUMENT DETAILS

Supplier:	WQM SCIENTIFIC				
Make and Model:	YSI PRO				
Serial Number:	21C100012				

CALIBRATION

CALIBRATE WITH CALIBRATION SOLUTIONS

Date and Time:					
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:				/	/
Calibration Reading:				/	/
Calibration Temperature:				/	/

ONGOING CHECKS

BUMP TEST WITH CALIBRATION SOLUTION

Date and Time:	8/4/24 6:30am				
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	4.00	7.00	2700	0.00	/
Bump Test Reading:	4.00	7.00	2755	0.00	/
Bump Test Temperature:	25.1	25.1	25.1	25.1	/

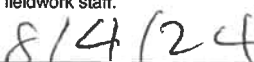
COMMENTS

Detail any equipment faults, minor maintenance performed, change of batteries or technical support provided.

[Large empty space for comments]

Approval and Distribution

☐ Each individual instrument has been inspected and calibrated daily and bump tested as required by fieldwork staff.

Fieldwork Staff Signature
 Date

Distribution: Project Central File

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FQM - Water Quality Meter Calibration Record

Q4AN(EV)-410-FM1

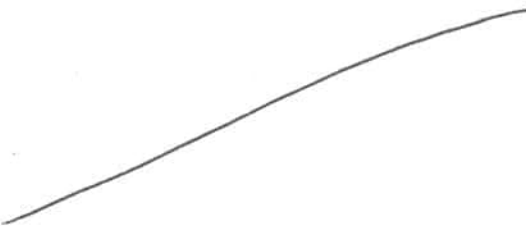
Project Name:	PFAS OMP	Project Number:	60612562		
Project Location:	JBRF and Creswell	Client:	Defence		
PM Name:	JR/GT	Fieldwork Staff Name:	[REDACTED]		

This calibration record is intended to prompt fieldwork staff to calibrate water quality meter (WQM) daily before the start of fieldworks.

INSTRUMENT DETAILS					
Supplier:	WAM SCIENTIFIC				
Make and Model:	YSI PRO				
Serial Number:	21C100012				

CALIBRATION					
CALIBRATE WITH CALIBRATION SOLUTIONS					
Date and Time:	9/4/24 0700				
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:		7			
Calibration Reading:		7			
Calibration Temperature:		24.5			

ONGOING CHECKS					
BUMP TEST WITH CALIBRATION SOLUTION					
Date and Time:	9/4/24 0700				
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	4.01	7	2655	0	
Bump Test Reading:	4.02	7.09	2681	0	
Bump Test Temperature:	24.6	23.9	23.6	25.4	/

COMMENTS					
Detail any equipment faults, minor maintenance performed, change of batteries or technical support provided.					
					

Approval and Distribution					
☐ Each individual instrument has been inspected and calibrated daily and bump tested as required by fieldwork staff.					
[REDACTED] Fieldwork Staff Signature			9/4/24 Date		

Distribution: Project Central File

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FQM - Water Quality Meter Calibration Record

Q4AN(EV)-410-FM1

Project Name:	PFAS OMP	Project Number:	60612562
Project Location:	JBRF and Creswell	Client:	Defence
PM Name:	JR/GT	Fieldwork Staff Name:	

This calibration record is intended to prompt fieldwork staff to calibrate water quality meter (WQM) daily before the start of fieldworks.

INSTRUMENT DETAILS

Supplier:	WQM SCIENTIFIC		
Make and Model:	YSI PRO		
Serial Number:	20D102896		

CALIBRATION

CALIBRATE WITH CALIBRATION SOLUTIONS

Date and Time:					
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:		4			
Calibration Reading:		4			
Calibration Temperature:		24.7			

ONGOING CHECKS

BUMP TEST WITH CALIBRATION SOLUTION

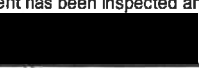
Date and Time:	9/4/24 0715				
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	7	4.01	47072760	0	
Bump Test Reading:	6.97	4.06	4712440	0	
Bump Test Temperature:	25.1	24.8	4715253	25.3	

COMMENTS

Detail any equipment faults, minor maintenance performed, change of batteries or technical support provided.

Approval and Distribution

☐ Each individual instrument has been inspected and calibrated daily and bump tested as required by fieldwork staff.




Fieldwork Staff Signature
 Date

Distribution: Project Central File

Q4AN(EV)-410-FM1

Q4AN(EV)-410-FM1
FQM - Water Quality Meter Calibration Record (Q4AN(EV)-410-FM1)
Revision 1 May 2, 2016

ANZ

FQM - Water Quality Meter Calibration Record

Q4AN(EV)-410-FM1

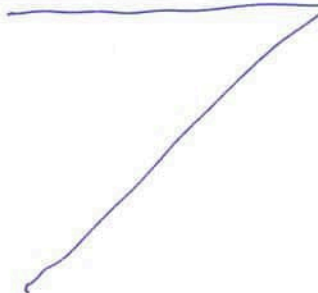
Project Name:	PFAS OMP	Project Number:	60612562		
Project Location:	JBRF and Creswell	Client:	Defence		
PM Name:	JR/GT	Fieldwork Staff Name:	E [REDACTED]		

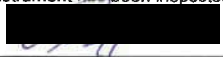
This calibration record is intended to prompt fieldwork staff to calibrate water quality meter (WQM) daily before the start of fieldworks.

INSTRUMENT DETAILS					
Supplier:	WAM SCIENTIFIC				
Make and Model:	YSI PRO				
Serial Number:	20D102896				

CALIBRATION					
CALIBRATE WITH CALIBRATION SOLUTIONS					
Date and Time:					
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:		7.00	2180		
Calibration Reading:		7.04	2180		
Calibration Temperature:		13.8	13.8		

ONGOING CHECKS					
BUMP TEST WITH CALIBRATION SOLUTION					
Date and Time:	10/4/24 at 0704				
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	4.00	7.00	~~2180~~ 2180	0	
Bump Test Reading:	4.04	6.87	~~2180~~ 2098	0.02	
Bump Test Temperature:	13.8	13.8	13.8	13.6	

COMMENTS					
Detail any equipment faults, minor maintenance performed, change of batteries or technical support provided.					
					

Approval and Distribution					
☒ Each individual instrument has been inspected and calibrated daily and bump tested as required by fieldwork staff.					
 Fieldwork Staff Signature			10/4/24 Date		

Distribution: Project Central File

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FQM - Water Quality Meter Calibration Record

Q4AN(EV)-410-FM1

Project Name:	PFAS OMP	Project Number:	60612562		
Project Location:	JBRF and Creswell	Client:	Defence		
PM Name:	JR/GT	Fieldwork Staff Name:	[REDACTED]		

This calibration record is intended to prompt fieldwork staff to calibrate water quality meter (WQM) daily before the start of fieldworks.

INSTRUMENT DETAILS

Supplier:	NAM SCIENTIFIC				
Make and Model:	YSI PRO				
Serial Number:	20D102896				

CALIBRATION

CALIBRATE WITH CALIBRATION SOLUTIONS

Date and Time:					
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:		7.00	2180	0.00	
Calibration Reading:		7.00	2180	0.00	
Calibration Temperature:		14.0	14.4	14.0	

ONGOING CHECKS

BUMP TEST WITH CALIBRATION SOLUTION

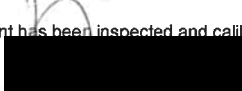
Date and Time:	0730 11/4/24				
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	4.00	7.00	2180	0.00	
Bump Test Reading:	3.99	6.90	2201	0.25	
Bump Test Temperature:	14.1	14.0	14.9	14.0	

COMMENTS

Detail any equipment faults, minor maintenance performed, change of batteries or technical support provided.

Approval and Distribution

☐ Each individual instrument has been inspected and calibrated daily and bump tested as required by fieldwork staff.


 Fieldwork Staff Signature

11/4/24
 Date

Distribution: Project Central File

ANZ

FQM - Water Quality Meter Calibration Record

Q4AN(EV)-410-FM1

Project Name:	PFAS OMP	Project Number:	60612562		
Project Location:	JBRF and Creswell	Client:	Defence		
PM Name:	JR/GT	Fieldwork Staff Name:	[REDACTED]		

This calibration record is intended to prompt fieldwork staff to calibrate water quality meter (WQM) daily before the start of fieldworks.

INSTRUMENT DETAILS

Supplier:	WAM SCIENTIFIC				
Make and Model:	YSI PRO				
Serial Number:	21C100012				

CALIBRATION

CALIBRATE WITH CALIBRATION SOLUTIONS

Date and Time:					
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	/	/	2180	/	/
Calibration Reading:	/	/	2180	/	/
Calibration Temperature:	/	/	13.8	/	/

ONGOING CHECKS

BUMP TEST WITH CALIBRATION SOLUTION

Date and Time:	0730 11/4/24				
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	4.00	7.00	2180	0.00	/
Bump Test Reading:	3.99	7.01	2240	0.00	/
Bump Test Temperature:	13.7	13.7	13.8	13.7	/

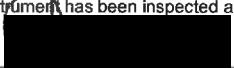
COMMENTS

Detail any equipment faults, minor maintenance performed, change of batteries or technical support provided.

[Large empty space for comments]

Approval and Distribution

☐ Each individual instrument has been inspected and calibrated daily and bump tested as required by fieldwork staff.


 Fieldwork Staff Signature

11/4/24
 Date

Distribution: Project Central File

ANZ

FQM - Water Quality Meter Calibration Record

Q4AN(EV)-410-FM1

Project Name:	PFAS OMP	Project Number:	60612562		
Project Location:	JBRF and Creswell	Client:	Defence		
PM Name:	JR/GT	Fieldwork Staff Name:	[REDACTED]		

This calibration record is intended to prompt fieldwork staff to calibrate water quality meter (WQM) daily before the start of fieldworks.

INSTRUMENT DETAILS

Supplier:	WAM SUBTITL				
Make and Model:	YSI PRO				
Serial Number:	21C100012				

CALIBRATION

CALIBRATE WITH CALIBRATION SOLUTIONS

Date and Time:					
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	4.00	/	2496	/	/
Calibration Reading:	4.00	/	2496	/	/
Calibration Temperature:	20.4	/	20.5	/	/

ONGOING CHECKS

BUMP TEST WITH CALIBRATION SOLUTION

Date and Time:	0630 12/4/24				
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	4.00	7.00	2496	0.00	/
Bump Test Reading:	4.04	7.01	2457	0.03	/
Bump Test Temperature:	20.4	20.5	20.5	20.4	/

COMMENTS

Detail any equipment faults, minor maintenance performed, change of batteries or technical support provided.

[REDACTED]

Approval and Distribution

☐ Each individual instrument has been inspected and calibrated daily and bump tested as required by fieldwork staff.



 Fieldwork Staff Signature

12/4/24

 Date

Distribution: Project Central File

ANZ

FQM - Water Quality Meter Calibration Record

Q4AN(EV)-410-FM1

Project Name:	PFAS OMP	Project Number:	60612562		
Project Location:	JBRF and Creswell	Client:	Defence		
PM Name:	JR/GT	Fieldwork Staff Name:	[REDACTED]		

This calibration record is intended to prompt fieldwork staff to calibrate water quality meter (WQM) daily before the start of fieldworks.

INSTRUMENT DETAILS

Supplier:	WAM Scientific				
Make and Model:	YST proplus				
Serial Number:	20D10289b				

CALIBRATION

CALIBRATE WITH CALIBRATION SOLUTIONS

Date and Time:	12/01/2024 7am				
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	4				
Calibration Reading:					
Calibration Temperature:					

ONGOING CHECKS

BUMP TEST WITH CALIBRATION SOLUTION

Date and Time:	12/01/2024				
Parameter	Acidity		Conductivity	Dissolved Oxygen	
Units	pH	pH	µS/cm	ppm	ppm
Calibration Standard Concentration:	4	7	2865		
Bump Test Reading:	4.02	7.01	2869		
Bump Test Temperature:	27	27	27°		

COMMENTS

Detail any equipment faults, minor maintenance performed, change of batteries or technical support provided.

Bump test in range, no cal needed.

Approval and Distribution

☒ Each individual instrument has been inspected and calibrated daily and bump tested as required by fieldwork staff.

Fieldwork Staff Signature	Date
[REDACTED]	[REDACTED]

Distribution: Project Central File

Appendix D

Analytical Data Validation

DATA VALIDATION REPORT

Project number:	60612562	Validation by:		Date:	20/05/2024
Client:	Department of Defence	Data verified by:		Date:	05/07/2024
Site:	HMAS Creswell and Jervis Bay Range Facility				
Matrix type:	Groundwater, Surface Water, Tank Water and Sediment				
Primary samples:	55 Groundwater samples, 68 Surface Water samples, 6 Tank Water samples, 59 Sediment samples				
Laboratory:	Primary: ALS, Secondary: Envirolab				
Lab reference:	ES2411964, ES2411994, ES2411995 and ES2412012 (ALS), 348825 and 348827 (Envirolab)				
Key Issues:	No QA/QC issues were identified in the field or laboratory datasets that could have a material implication to decision-making on the project.				

Field Quality Assurance and Quality Control

Field DQOs and DQIs	The data quality objectives (DQOs) and data quality indicators (DQIs) adopted for these works are presented in the SAQP (AECOM, 2024).
Sampling personnel	Sampling was conducted by suitably qualified and experienced AECOM Environmental Scientists and Engineers.
Sampling Methodology	All water and sediment samples were collected in accordance with the methodology outlined in the SAQP (AECOM, 2024). After each sample was collected, reusable equipment was decontaminated using Liquinox and potable water. The consumables (nitrile gloves, HydraSleeve™ materials and/or bailers) were disposed of in waste bins.
Chain of Custody (COC)	All samples collected were reported on the Chain of Custody documents (COC) and subsequent email amendments and analysed for requested analytes.
Rinsate Blank	Rinsate blank samples were collected at a frequency of 1 per day of sampling where equipment was re-used and decontaminated between sample points. Rinsate blank samples were either collected from the final rinse of the interface probe or sampling trowel following decontamination, using laboratory-supplied de-ionised water.
Field Blank	Field blanks were collected at a frequency of 1 per day of sampling by opening a sampling container filled with laboratory-supplied de-ionised water to assess contamination from atmospheric conditions (i.e. dust and other atmospheric fallout) present during sampling.
Frequency of field QC	Field duplicates (intra-laboratory duplicates) and triplicates (inter-laboratory duplicates) were collected at a frequency greater than one per ten primary samples, exceeding the DQI. In total: - At Creswell (0020) the following were collected: 3 water field duplicates and 3 water field triplicates were collected for 29 primary water samples (12%). 2 sediment field duplicates and 2 sediment field triplicates were collected for 13 primary sediment samples (15%). - At Jervis Bay Range Facility (0021) the following were collected: 11 water field duplicates and 11 water field triplicates were collected for 100 primary water samples (11%). 5 sediment field duplicates and 5 sediment field triplicates were collected for 46 primary sediment samples (11%).
Handling and preservation	The following is based on the laboratory sample receipt notices on workorders: ES2411964, ES2411994, ES2411995 and ES2412012 were received by the primary laboratory in appropriate containers, with ice present, between 3.5 and 4.5 °C, within the recommended temperature range (≤6 °C).

DATA VALIDATION REPORT

	348825 and 348827 were received by the secondary laboratory in appropriate containers, with ice present and at 3 °C, within the recommended temperature range of ≤6 °C.
Calibration of equipment	Measurements of water geochemical parameters were undertaken using YSI Professional Plus water quality meters, which were calibrated by the supplier prior to use, in accordance with the manufacturer's instructions and bump tested daily by the field personnel. Measurements of depth to groundwater were undertaken using interface probes, which were serviced by the supplier prior to use. All equipment calibration and service certificates are presented in Appendix C.
Laboratory QA/QC	
Laboratory DQOs and DQIs	The data quality objectives (DQOs) and data quality indicators (DQIs) adopted for these works are presented in the SAQP (AECOM, 2024).
Tests requested/reported	The majority of samples were analysed for per- and poly-fluoroalkyl substances (PFAS) extended suite, with 8 primary groundwater samples and 2 primary surface water samples analysed for PFAS Super Trace extended suite, as specified in the SAQP (AECOM, 2024). All sample requests for analysis are reported on the Chain of Custody (COC).
Holding time compliance	All samples were extracted and analysed by the laboratory within the recommended holding times.
Laboratory accreditation	The primary laboratory analysis was conducted by ALS Environmental Pty Ltd (Sydney) a National Association of Testing Authorities (NATA) accredited laboratory (Accreditation No. 825). The secondary samples were analysed at Envirolab Services, also a NATA-accredited laboratory (accreditation number 2901).
Frequency of laboratory QC	The primary laboratory reported a sufficient frequency of quality control samples to assess whether the results have been reported with acceptable accuracy and precision, with the exception of: <u>ES2411994 and ES2412012:</u> - Laboratory duplicates (Super Trace PFAS by LCMSMS): actual rate 0.0%, expected rate 10.0% (water matrix) - Matrix spikes (Super Trace PFAS by LCMSMS): actual rate 0.0%, expected rate 5.0% (water matrix) The precision and accuracy of the data can be assessed as acceptable based on method blanks, laboratory control spike and surrogate spike recoveries, which were reported at the required frequencies and within control limits, and the reported laboratory duplicates and matrix spikes which were within control limits.
Method Blank	All method blank concentrations were reported <LOR (limit of reporting) for the analytes tested, meeting the project requirements. This is presented in the Quality Control Reports for both laboratories.
Laboratory duplicate RPDs	The reported laboratory duplicate's Relative Percentage Differences (RPDs) were within laboratory control limits. The laboratory duplicate RPDs are presented in the Quality Control Reports for the primary laboratory.
LCS recovery	Laboratory control spike (LCS) recoveries were within control limits. This is presented in the Quality Control Reports for both laboratories.
Matrix spike recovery	Matrix spike (MS) recoveries were within control limits with the exception of: Non-determined MS recoveries

DATA VALIDATION REPORT

- ES2411964: Perfluorooctane sulfonic acid (PFOS) and perfluorohexane sulfonic acid (PFHxS), for sample 0020_MW012_240408
- ES2411995: PFOS, for sample 0021_SD001_240410 and 0021_SD035_240409

These non-determinations were due to background levels being greater than or equal to four times spike levels, which do not reflect method bias or affect data interpretation.

Surrogate spike recovery

The reported surrogate spike recoveries were within laboratory control limits.

QA/QC Data Evaluation

Comparison of Field Observations and Laboratory Results

No anomalies between field observations and analytical results were noted.

Anomalous data / Repeat Analysis

The primary and secondary laboratories were requested to repeat the analysis of select samples with PFAS concentrations reported outside historical ranges (0021_SD028_240409, 0021_SD030_240409, 0021_SD036_240409, 0021_SD047_240409, 0021_SD048_240409, 0020_QC202_240408 [0020_SD026]), to confirm the reported concentrations.

The repeat analysis confirmed the originally reported concentrations (which were within the same order of magnitude, as shown in results table below). As such, the original result has been adopted for reporting purposes.

Sample Name	Analysis Type	Perfluorohexane sulfonic acid (PFHxS) Result	Perfluorooctane sulfonic acid (PFOS) Result	Perfluorooctanoic acid (PFOA) Result
0021_SD028_240409	original	<0.0002	0.0002	<0.0002
	repeat	<0.0002	0.0003	<0.0002
0021_SD030_240409	original	0.0003	0.0024	<0.0002
	repeat	<0.0002	0.001	<0.0002
0021_SD036_240409	original	0.0153	0.446	0.0012
	repeat	0.0184	0.515	0.0019
0021_SD047_240409	original	<0.0002	0.0003	<0.0002
	repeat	<0.0002	0.0003	<0.0002
0021_SD048_240409	original	<0.0002	0.0005	<0.0002
	repeat	<0.0002	0.0003	<0.0002
0020_QC202_240408	original	<0.0001	0.0003	<0.0001
	repeat	<0.0001	0.0001	<0.0001

Data transcription

A check of the laboratory results identified no anomalies within the electronic data, the laboratory reports, and the tables generated by AECOM.

Limits of reporting

With the exception of the PFAS NEMP Freshwater 99% species protection (HEPA, 2020) values for PFOS, the laboratory LORs were sufficiently low to enable assessment against adopted guideline criteria.

Rinsate Blank sample results

The concentrations of PFAS in the Rinsate Blank samples (Table D3) were below the LOR, indicating decontamination procedures were adequate.

Field Blank sample results

The concentrations of PFAS in the Field Blank samples (Table D4) were below the LOR, indicating the potential for cross-contamination during sampling is considered unlikely.

RPDs for Field Duplicates /

RPDs for field duplicates (intra-laboratory duplicates) and triplicates (inter-laboratory duplicates) were reported within acceptable limits ($\leq 30\%$, or $\leq 50\%$ for results 10-20 x LOR,

DATA VALIDATION REPORT

Triplicates

or No Limit for results <10 x LOR), with the exception of:

Intra-laboratory duplicates (Field Duplicates) RPDs

0020_MW109/QC100

- PFOS: 72%
- PFHxS: 35%

0020_SW012/QC104

- PFOS: 60%

0021_SD013/QC113

- PFOS: 61%

Inter-laboratory duplicates (Field Triplicates) RPDs

0020_MW109/QC200

- PFOS: 44%
- Perfluorohexanoic acid (PFHxA): 80%

0021_SW044/QC203

- PFOS: 32%

0021_SD013/QC213

- PFOS: 42%
- PFHxS: 35%
- PFHxA: 67%

0021_SD005/QC215

- PFOS: 166%

The elevated RPDs for groundwater and surface water duplicate pairs were generally within the same order of magnitude. Additionally, all concentrations with the elevated RPDs, are reported either well above or well below the adopted guideline criteria or have no applicable guideline criteria. Therefore, AECOM considers that these are not significant to impact the interpretation of results.

The elevated RPDs for sediment are likely to be attributed to the heterogeneous nature of the sediment sampled, and therefore are considered acceptable.

Where required for quantitative purposes, the highest concentrations from the primary and duplicate pairs were used in the assessment.

Overall Assessment

Data validation procedure employed in the assessment of the field and laboratory QA/QC data indicated that the reported analytical results are representative of the sample locations and that the overall quality of the analytical data produced is acceptably reliable for the purpose of this report.

Attached:

Table D1 – Water RPDs

Table D2 – Sediment RPDs

Table D3 – Rinsate Blank Results

Table D4 – Field Blank Results

Table D1 - Water Duplicate RPDs

Lab Report Number Field ID Matrix Type Date				ES2411964		ES2411964		RPD	ES2411964		348827		RPD	ES2411964		ES2411964		RPD	ES2411964		348827		RPD	ES2411964		ES2411964		RPD
				0020_MW012_240408		0020_QC101_240408			0020_MW012_240408		0020_QC201_240408			0020_MW109_240408		0020_QC100_240408			0020_MW109_240408		0020_QC200_240408			0020_SW012_240408		0020_QC104_240408		
				Water		Water			Water		Water			Water		Water			Water		Water			Water		Water		
				08 Apr 2024		08 Apr 2024		RPD	08 Apr 2024		08 Apr 2024		RPD	08 Apr 2024		08 Apr 2024		RPD	08 Apr 2024		08 Apr 2024		RPD	08 Apr 2024		08 Apr 2024		RPD
	Unit	LOR	RPD																									
PFAS																												
Perfluorooctanoic acid (PFOA)	µg/L	0.0002		0.07	0.06	15	0.07	0.07	0	0.01	0.03	100	0.01	0.03	100	<0.01	<0.01	nc										
Perfluorooctane sulfonic acid (PFOS)	µg/L	0.0002		7.22	7.18	1	7.22	6.5	10	0.57	1.21	72	0.57	0.89	44	0.26	0.14	60										
Perfluorohexane sulfonic acid (PFHxS)	µg/L	0.0002		1.26	1.43	13	1.26	1.3	3	0.31	0.44	35	0.31	0.39	23	0.11	0.13	17										
Sum of PFHxS and PFOS	µg/L	0.0002		8.48	8.61	2	8.48	7.9	7	0.88	1.65	61	0.88	1.3	39	0.37	0.27	31										
Sum of PFAS	µg/L	0.0002		8.97	9.1	1	8.97	8.3	8	1.06	1.97	60	1.06	1.7	46	0.37	0.27	31										
PFAS - Perfluoroalkyl Sulfonic Acids																												
Perfluorobutane sulfonic acid (PFBS)	µg/L	0.0004		0.05	0.05	0	0.05	0.06	18	0.04	<0.02	nc	0.04	0.02	67	<0.02	<0.02	nc										
Perfluoropentane sulfonic acid (PFPeS)	µg/L	0.0005		0.09	0.08	12	0.09	0.08	12	0.04	0.02	67	0.04	0.03	29	<0.02	<0.02	nc										
Perfluoroheptane sulfonic acid (PFHpS)	µg/L	0.0005		0.08	0.1	22	0.08	0.08	0	0.03	0.06	67	0.03	0.06	67	<0.02	<0.02	nc										
Perfluorodecane sulfonic acid (PFDS)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
PFAS - Perfluoroalkyl Carboxylic Acids																												
Perfluorobutanoic acid (PFBA)	µg/L	0.002		<0.1	<0.1	nc	<0.1	<0.02	nc	<0.1	<0.1	nc	<0.1	0.05	nc	<0.1	<0.1	nc										
Perfluoropentanoic acid (PFPeA)	µg/L	0.0005		0.02	0.03	40	0.02	0.02	0	<0.02	0.02	nc	<0.02	0.05	nc	<0.02	<0.02	nc										
Perfluorohexanoic acid (PFHxA)	µg/L	0.0004		0.12	0.14	15	0.12	0.15	22	0.06	0.16	91	0.06	0.14	80	<0.02	<0.02	nc										
Perfluoroheptanoic acid (PFHpA)	µg/L	0.0004		0.03	0.03	0	0.03	0.02	40	<0.02	0.03	nc	<0.02	0.02	nc	<0.02	<0.02	nc										
Perfluorononanoic acid (PFNA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc										
Perfluorodecanoic acid (PFDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
Perfluoroundecanoic acid (PFUnDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
Perfluorododecanoic acid (PFDoDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.05	nc	<0.02	<0.02	nc	<0.02	<0.05	nc	<0.02	<0.02	nc										
Perfluorotridecanoic acid (PFTrDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.02	nc										
Perfluorotetradecanoic acid (PFTeDA)	µg/L	0.0005		<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.05	nc										
PFAS - (n:2) Fluorotelomer Sulfonic Acids																												
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc										
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	µg/L	0.0004		<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc										
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	µg/L	0.0004		<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc										
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc										
PFAS - Perfluoroalkyl Sulfonamides																												
Perfluorooctane sulfonamide (FOSA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.02	nc										
N-Methyl perfluorooctane sulfonamide (MeFOSA)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc										
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc										
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.1	nc	<0.05	<0.05	nc	<0.05	<0.1	nc	<0.05	<0.05	nc										
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.05	nc										

Notes
LOR = Limit of Reporting
nc = non calculable as concentrations in one or both samples are below the LOR
High RPDs (>30%, or >50% for results 10-20 x LOR) are highlighted in bold

Table D1 - Water Duplicate RPDs

Lab Report Number Field ID Matrix Type Date				ES2411964		348827		RPD	ES2411994		ES2411994		RPD	ES2411994		348825		RPD	ES2412012		ES2412012		RPD	ES2412012		348825		RPD
				0020_SW012_240408		0020_QC204_240408			0021_MW022_240408		0021_QC101_240408			0021_MW022_240408		0021_QC201_240408			0021_SW053_240409		0021_QC103_240409			0021_SW044_240409		0021_QC203_240409		
				Water		Water			Water		Water			Water		Water			Water		Water			Water		Water		
				08 Apr 2024		08 Apr 2024			08 Apr 2024		08 Apr 2024			08 Apr 2024		08 Apr 2024			08 Apr 2024		09 Apr 2024			09 Apr 2024		09 Apr 2024		
	Unit	LOR	RPD																									
PFAS																												
Perfluorooctanoic acid (PFOA)	µg/L	0.0002		<0.01	<0.01	nc	0.04	0.05	22	0.04	0.04	0	0.04	0.04	0	0.02	0.04	67										
Perfluorooctane sulfonic acid (PFOS)	µg/L	0.0002		0.26	0.27	4	0.82	0.86	5	0.82	0.66	22	1.66	1.73	4	1.23	1.7	32										
Perfluorohexane sulfonic acid (PFHxS)	µg/L	0.0002		0.11	0.14	24	0.71	0.74	4	0.71	0.67	6	0.96	1.08	12	0.67	0.87	26										
Sum of PFHxS and PFOS	µg/L	0.0002		0.37	0.41	10	1.53	1.6	4	1.53	1.3	16	2.62	2.81	7	1.9	2.6	31										
Sum of PFAS	µg/L	0.0002		0.37	0.44	17	1.7	1.79	5	1.7	1.5	12	2.85	3.05	7	2.05	2.8	31										
PFAS - Perfluoroalkyl Sulfonic Acids																												
Perfluorobutane sulfonic acid (PFBS)	µg/L	0.0004		<0.02	0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	0.03	0.04	29	0.02	0.03	40										
Perfluoropentane sulfonic acid (PFPeS)	µg/L	0.0005		<0.02	<0.01	nc	0.02	0.03	40	0.02	0.02	0	0.05	0.06	18	0.04	0.04	0										
Perfluoroheptane sulfonic acid (PFHpS)	µg/L	0.0005		<0.02	<0.01	nc	0.06	0.06	0	0.06	0.05	18	0.06	0.06	0	0.04	0.06	40										
Perfluorodecane sulfonic acid (PFDS)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
PFAS - Perfluoroalkyl Carboxylic Acids																												
Perfluorobutanoic acid (PFBA)	µg/L	0.002		<0.1	<0.02	nc	<0.1	<0.1	nc	<0.1	<0.02	nc	<0.1	<0.1	nc	<0.1	<0.02	nc										
Perfluoropentanoic acid (PFPeA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
Perfluorohexanoic acid (PFHxA)	µg/L	0.0004		<0.02	0.02	nc	0.05	0.05	0	0.05	0.06	18	0.05	0.04	22	0.03	0.04	29										
Perfluoroheptanoic acid (PFHpA)	µg/L	0.0004		<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	0.01	nc	<0.02	<0.02	nc	<0.02	0.01	nc										
Perfluorononanoic acid (PFNA)	µg/L	0.0005		<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc										
Perfluorodecanoic acid (PFDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
Perfluoroundecanoic acid (PFUnDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
Perfluorododecanoic acid (PFDoDA)	µg/L	0.0005		<0.02	<0.05	nc	<0.02	<0.02	nc	<0.02	<0.05	nc	<0.02	<0.02	nc	<0.02	<0.05	nc										
Perfluorotridecanoic acid (PFTrDA)	µg/L	0.0005		<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc										
Perfluorotetradecanoic acid (PFTeDA)	µg/L	0.0005		<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc										
PFAS - (n:2) Fluorotelomer Sulfonic Acids																												
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	µg/L	0.001		<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc										
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	µg/L	0.0004		<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc										
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	µg/L	0.0004		<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc										
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	µg/L	0.001		<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc										
PFAS - Perfluoroalkyl Sulfonamides																												
Perfluorooctane sulfonamide (FOSA)	µg/L	0.0005		<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc										
N-Methyl perfluorooctane sulfonamide (MeFOSA)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc										
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc										
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	µg/L	0.001		<0.05	<0.1	nc	<0.05	<0.05	nc	<0.05	<0.1	nc	<0.05	<0.05	nc	<0.05	<0.1	nc										
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	µg/L	0.001		<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc										

Notes
LOR = Limit of Reporting
nc = non calculable as concentrations in one or both samples ≤
High RPDs (>30%, or >50% for results 10-20 x LOR) are high

Table D1 - Water Duplicate RPDs

Lab Report Number Field ID Matrix Type Date				ES2411994		ES2411994		RPD	ES2411994		348825		RPD	ES2412012		ES2412012		RPD	ES2412012		ES2412012		RPD
				0021_MW139_240409	0021_QC100_240409	0021_MW139_240409			0021_QC200_240409	0021_SW076_240410		0021_QC105_240410		0021_SW076_240410		0021_QC205_240410	0021_SW080_240410		0021_QC109_240410				
				Water	Water	Water			Water	Water		Water		Water		Water	Water		Water				
				09 Apr 2024	09 Apr 2024	09 Apr 2024			09 Apr 2024	10 Apr 2024		10 Apr 2024		10 Apr 2024		10 Apr 2024	10 Apr 2024		10 Apr 2024				
	Unit	LOR	RPD																				
PFAS																							
Perfluorooctanoic acid (PFOA)	µg/L	0.0002		<0.0005	<0.0005	nc	<0.0005	<0.0002	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	<0.01	nc	
Perfluorooctane sulfonic acid (PFOS)	µg/L	0.0002		<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	<0.01	nc	
Perfluorohexane sulfonic acid (PFHxS)	µg/L	0.0002		<0.0005	<0.0005	nc	<0.0005	<0.0002	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	<0.01	nc	
Sum of PFHxS and PFOS	µg/L	0.0002		<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	<0.01	nc	
Sum of PFAS	µg/L	0.0002		<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	<0.01	nc	
PFAS - Perfluoroalkyl Sulfonic Acids																							
Perfluorobutane sulfonic acid (PFBS)	µg/L	0.0004		<0.0005	<0.0005	nc	<0.0005	<0.0004	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.02	<0.02	nc	
Perfluoropentane sulfonic acid (PFPeS)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.001	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.02	<0.02	nc	
Perfluoroheptane sulfonic acid (PFHpS)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.001	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.02	<0.02	nc	
Perfluorodecane sulfonic acid (PFDS)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.002	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	<0.02	nc	
PFAS - Perfluoroalkyl Carboxylic Acids																							
Perfluorobutanoic acid (PFBA)	µg/L	0.002		<0.0020	<0.0020	nc	<0.0020	<0.002	nc	<0.1	<0.1	nc	<0.1	<0.02	nc	<0.1	<0.02	nc	<0.1	<0.02	<0.02	nc	
Perfluoropentanoic acid (PFPeA)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.002	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	<0.02	nc	
Perfluorohexanoic acid (PFHxA)	µg/L	0.0004		<0.0005	<0.0005	nc	<0.0005	<0.0004	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.01	nc	<0.02	<0.01	<0.01	nc	
Perfluoroheptanoic acid (PFHpA)	µg/L	0.0004		<0.0005	<0.0005	nc	<0.0005	<0.0004	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.01	nc	<0.02	<0.01	<0.01	nc	
Perfluorononanoic acid (PFNA)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.001	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.01	nc	<0.02	<0.01	<0.01	nc	
Perfluorodecanoic acid (PFDA)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.002	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	<0.02	nc	
Perfluoroundecanoic acid (PFUnDA)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.002	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	<0.02	nc	
Perfluorododecanoic acid (PFDoDA)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.005	nc	<0.02	<0.02	nc	<0.02	<0.05	nc	<0.02	<0.05	nc	<0.02	<0.05	<0.05	nc	
Perfluorotridecanoic acid (PFTrDA)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.1	nc	<0.02	<0.1	<0.1	nc	
Perfluorotetradecanoic acid (PFTeDA)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.5	nc	<0.05	<0.5	<0.5	nc	
PFAS - (n:2) Fluorotelomer Sulfonic Acids																							
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	µg/L	0.001		<0.001	<0.001	nc	<0.001	<0.001	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.01	nc	<0.05	<0.01	<0.01	nc	
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	µg/L	0.0004		<0.001	<0.001	nc	<0.001	<0.0004	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.01	nc	<0.05	<0.01	<0.01	nc	
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	µg/L	0.0004		<0.001	<0.001	nc	<0.001	<0.0004	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.02	nc	<0.05	<0.02	<0.02	nc	
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	µg/L	0.001		<0.001	<0.001	nc	<0.001	<0.002	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.02	nc	<0.05	<0.02	<0.02	nc	
PFAS - Perfluoroalkyl Sulfonamides																							
Perfluorooctane sulfonamide (FOSA)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.1	nc	<0.02	<0.1	<0.1	nc	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	µg/L	0.001		<0.001	<0.001	nc	<0.001	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	<0.05	nc	
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.002	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	<0.02	nc	
N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	µg/L	0.001		<0.001	<0.001	nc	<0.001	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	<0.05	nc	
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	µg/L	0.001		<0.001	<0.001	nc	<0.001	<0.1	nc	<0.05	<0.05	nc	<0.05	<0.1	nc	<0.05	<0.1	nc	<0.05	<0.1	<0.1	nc	
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	µg/L	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.002	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	<0.02	nc	
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	µg/L	0.001		<0.001	<0.001	nc	<0.001	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.5	nc	<0.05	<0.5	<0.5	nc	

Notes
LOR = Limit of Reporting
nc = non calculable as concentrations in one or both samples ≤
High RPDs (>30%, or >50% for results 10-20 x LOR) are high

Table D1 - Water Duplicate RPDs

Lab Report Number Field ID Matrix Type Date				ES2412012		348825		RPD	ES2411994		ES2411994		RPD	ES2411994		ES2411994		RPD	ES2411994		348825		RPD				
				0021_SW080_240410		0021_QC209_240410			0021_MW128_240410		0021_QC104_240410			0021_MW128_240410		0021_QC204_240410			0021_MW121_240410		0021_QC111_240410			0021_MW121_240410		0021_QC211_240410	
				Water		Water			Water		Water			Water		Water			Water		Water			Water		Water	
				10 Apr 2024		10 Apr 2024			10 Apr 2024		10 Apr 2024			10 Apr 2024		10 Apr 2024			10 Apr 2024		10 Apr 2024			10 Apr 2024		10 Apr 2024	
	Unit	LOR	RPD																								
PFAS																											
Perfluorooctanoic acid (PFOA)	µg/L	0.0002		<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01					
Perfluorooctane sulfonic acid (PFOS)	µg/L	0.0002		<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	0.02	0.03	40	0.02	0.02	40	0.02					
Perfluorohexane sulfonic acid (PFHxS)	µg/L	0.0002		<0.01	<0.01	nc	<0.01	0.03	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	0.02	0.03	40	0.02	0.02	40	0.02					
Sum of PFHxS and PFOS	µg/L	0.0002		<0.01	<0.01	nc	<0.01	0.03	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	0.04	0.06	40	0.04	0.05	40	0.05					
Sum of PFAS	µg/L	0.0002		<0.01	<0.01	nc	<0.01	0.03	nc	<0.01	<0.01	nc	<0.01	<0.01	nc	0.04	0.06	40	0.04	0.05	40	0.05					
PFAS - Perfluoroalkyl Sulfonic Acids																											
Perfluorobutane sulfonic acid (PFBS)	µg/L	0.0004		<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.01					
Perfluoropentane sulfonic acid (PFPeS)	µg/L	0.0005		<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.01					
Perfluoroheptane sulfonic acid (PFHpS)	µg/L	0.0005		<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.01					
Perfluorodecane sulfonic acid (PFDS)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02					
PFAS - Perfluoroalkyl Carboxylic Acids																											
Perfluorobutanoic acid (PFBA)	µg/L	0.002		<0.1	<0.02	nc	<0.1	<0.1	nc	<0.1	<0.02	nc	<0.1	<0.1	nc	<0.1	<0.1	nc	<0.1	<0.02	nc	<0.02					
Perfluoropentanoic acid (PFPeA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02					
Perfluorohexanoic acid (PFHxA)	µg/L	0.0004		<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.01					
Perfluoroheptanoic acid (PFHpA)	µg/L	0.0004		<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.01					
Perfluorononanoic acid (PFNA)	µg/L	0.0005		<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.01					
Perfluorodecanoic acid (PFDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02					
Perfluoroundecanoic acid (PFUnDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02					
Perfluorododecanoic acid (PFDoDA)	µg/L	0.0005		<0.02	<0.05	nc	<0.02	<0.02	nc	<0.02	<0.05	nc	<0.02	<0.05	nc	<0.02	<0.02	nc	<0.02	<0.05	nc	<0.05					
Perfluorotridecanoic acid (PFTrDA)	µg/L	0.0005		<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.1					
Perfluorotetradecanoic acid (PFTeDA)	µg/L	0.0005		<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.5					
PFAS - (n:2) Fluorotelomer Sulfonic Acids																											
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	µg/L	0.001		<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.01					
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	µg/L	0.0004		<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.01					
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	µg/L	0.0004		<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.02					
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	µg/L	0.001		<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.02					
PFAS - Perfluoroalkyl Sulfonamides																											
Perfluorooctane sulfonamide (FOSA)	µg/L	0.0005		<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.1					
N-Methyl perfluorooctane sulfonamide (MeFOSA)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05					
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02					
N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05					
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	µg/L	0.001		<0.05	<0.1	nc	<0.05	<0.05	nc	<0.05	<0.1	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.1	nc	<0.1					
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02					
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	µg/L	0.001		<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.5					

Notes
LOR = Limit of Reporting
nc = non calculable as concentrations in one or both samples ≤
High RPDs (>30%, or >50% for results 10-20 x LOR) are high

Table D1 - Water Duplicate RPDs

Lab Report Number Field ID Matrix Type Date				ES2412012		ES2412012		RPD	ES2412012		348825		RPD	ES2412012		ES2412012		RPD	ES2412012		348825		RPD	ES2411994		ES2411994		RPD
				0021_SW013_240410		0021_QC106_240410			0021_SW013_240410		0021_QC206_240410			0021_SW110_240410		0021_QC210_240410			0021_MW107_240411		0021_QC112_240411							
				Water		Water			Water		Water			Water		Water			Water		Water							
				10 Apr 2024		10 Apr 2024			10 Apr 2024		10 Apr 2024			10 Apr 2024		10 Apr 2024			10 Apr 2024		11 Apr 2024			11 Apr 2024				
	Unit	LOR	RPD																									
PFAS																												
Perfluorooctanoic acid (PFOA)	µg/L	0.0002		<0.01	<0.01	nc	<0.01	<0.01	nc	0.02	0.02	0	0.02	0.02	0	0.1	0.1	0										
Perfluorooctane sulfonic acid (PFOS)	µg/L	0.0002		0.13	0.13	0	0.13	0.13	0	0.7	0.72	3	0.7	0.61	14	2.42	2.76	13										
Perfluorohexane sulfonic acid (PFHxS)	µg/L	0.0002		0.18	0.18	0	0.18	0.16	12	0.46	0.46	0	0.46	0.41	11	3.18	3.31	4										
Sum of PFHxS and PFOS	µg/L	0.0002		0.31	0.31	0	0.31	0.29	7	1.16	1.18	2	1.16	1	15	5.6	6.07	8										
Sum of PFAS	µg/L	0.0002		0.31	0.31	0	0.31	0.3	3	1.33	1.37	3	1.33	1.2	10	6.87	7.39	7										
PFAS - Perfluoroalkyl Sulfonic Acids																												
Perfluorobutane sulfonic acid (PFBS)	µg/L	0.0004		<0.02	<0.02	nc	<0.02	0.01	nc	0.03	0.03	0	0.03	0.02	40	0.17	0.18	6										
Perfluoropentane sulfonic acid (PFPeS)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.01	nc	0.04	0.04	0	0.04	0.04	0	0.23	0.26	12										
Perfluoroheptane sulfonic acid (PFHpS)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	0.11	0.08	32										
Perfluorodecane sulfonic acid (PFDS)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
PFAS - Perfluoroalkyl Carboxylic Acids																												
Perfluorobutanoic acid (PFBA)	µg/L	0.002		<0.1	<0.1	nc	<0.1	<0.02	nc	<0.1	<0.1	nc	<0.1	<0.02	nc	<0.1	<0.1	nc										
Perfluoropentanoic acid (PFPeA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	0.08	0.1	22										
Perfluorohexanoic acid (PFHxA)	µg/L	0.0004		<0.02	<0.02	nc	<0.02	<0.01	nc	0.08	0.1	22	0.08	0.1	22	0.43	0.47	9										
Perfluoroheptanoic acid (PFHpA)	µg/L	0.0004		<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	0.06	0.05	18										
Perfluorononanoic acid (PFNA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc	<0.02	<0.02	nc										
Perfluorodecanoic acid (PFDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
Perfluoroundecanoic acid (PFUnDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
Perfluorododecanoic acid (PFDoDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.05	nc	<0.02	<0.02	nc	<0.02	<0.05	nc	<0.02	<0.02	nc										
Perfluorotridecanoic acid (PFTrDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.02	nc										
Perfluorotetradecanoic acid (PFTeDA)	µg/L	0.0005		<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.05	nc										
PFAS - (n:2) Fluorotelomer Sulfonic Acids																												
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc										
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	µg/L	0.0004		<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc	<0.05	<0.05	nc										
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	µg/L	0.0004		<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc										
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc	<0.05	<0.05	nc										
PFAS - Perfluoroalkyl Sulfonamides																												
Perfluorooctane sulfonamide (FOSA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc	<0.02	<0.02	nc										
N-Methyl perfluorooctane sulfonamide (MeFOSA)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc										
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc										
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.1	nc	<0.05	<0.05	nc	<0.05	<0.1	nc	<0.05	<0.05	nc										
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc										
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc	<0.05	<0.05	nc										

Notes
LOR = Limit of Reporting
nc = non calculable as concentrations in one or both samples ≤
High RPDs (>30%, or >50% for results 10-20 x LOR) are high

Table D1 - Water Duplicate RPDs

Lab Report Number Field ID Matrix Type Date				ES2411994		348825		ES2412012		ES2412012		ES2412012		348825			
				0021_MW107_240411		0021_QC212_240411		0021_SW126_240411		0021_QC114_240411		0021_SW126_240411		0021_QC214_240411			
				Water		Water		Water		Water		Water		Water			
				11 Apr 2024		11 Apr 2024		RPD		11 Apr 2024		11 Apr 2024		RPD		11 Apr 2024	
	Unit	LOR	RPD														
PFAS																	
Perfluorooctanoic acid (PFOA)	µg/L	0.0002		0.1	0.09	11	0.03	0.03	0	0.03	0.03	0					
Perfluorooctane sulfonic acid (PFOS)	µg/L	0.0002		2.42	2.3	5	0.23	0.17	30	0.23	0.2	14					
Perfluorohexane sulfonic acid (PFHxS)	µg/L	0.0002		3.18	3	6	1.36	1.33	2	1.36	1.1	21					
Sum of PFHxS and PFOS	µg/L	0.0002		5.6	5.3	6	1.59	1.5	6	1.59	1.3	20					
Sum of PFAS	µg/L	0.0002		6.87	6.4	7	3.27	3.18	3	3.27	2.8	15					
PFAS - Perfluoroalkyl Sulfonic Acids																	
Perfluorobutane sulfonic acid (PFBS)	µg/L	0.0004		0.17	0.17	0	0.28	0.29	4	0.28	0.26	7					
Perfluoropentane sulfonic acid (PFPeS)	µg/L	0.0005		0.23	0.21	9	0.3	0.29	3	0.3	0.25	18					
Perfluoroheptane sulfonic acid (PFHpS)	µg/L	0.0005		0.11	0.09	20	<0.02	<0.02	nc	<0.02	<0.01	nc					
Perfluorodecane sulfonic acid (PFDS)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc					
PFAS - Perfluoroalkyl Carboxylic Acids																	
Perfluorobutanoic acid (PFBA)	µg/L	0.002		<0.1	0.04	nc	<0.1	<0.1	nc	<0.1	0.07	nc					
Perfluoropentanoic acid (PFPeA)	µg/L	0.0005		0.08	0.08	0	0.18	0.19	5	0.18	0.2	11					
Perfluorohexanoic acid (PFHxA)	µg/L	0.0004		0.43	0.4	7	0.72	0.71	1	0.72	0.64	12					
Perfluoroheptanoic acid (PFHpA)	µg/L	0.0004		0.06	0.05	18	0.07	0.07	0	0.07	0.06	15					
Perfluorononanoic acid (PFNA)	µg/L	0.0005		<0.02	<0.01	nc	<0.02	<0.02	nc	<0.02	<0.01	nc					
Perfluorodecanoic acid (PFDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc					
Perfluoroundecanoic acid (PFUnDA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc					
Perfluorododecanoic acid (PFDoDA)	µg/L	0.0005		<0.02	<0.05	nc	<0.02	<0.02	nc	<0.02	<0.05	nc					
Perfluorotridecanoic acid (PFTTrDA)	µg/L	0.0005		<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc					
Perfluorotetradecanoic acid (PFTeDA)	µg/L	0.0005		<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc					
PFAS - (n:2) Fluorotelomer Sulfonic Acids																	
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	µg/L	0.001		<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc					
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	µg/L	0.0004		<0.05	<0.01	nc	<0.05	<0.05	nc	<0.05	<0.01	nc					
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	µg/L	0.0004		<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc					
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	µg/L	0.001		<0.05	<0.02	nc	<0.05	<0.05	nc	<0.05	<0.02	nc					
PFAS - Perfluoroalkyl Sulfonamides																	
Perfluorooctane sulfonamide (FOSA)	µg/L	0.0005		<0.02	<0.1	nc	<0.02	<0.02	nc	<0.02	<0.1	nc					
N-Methyl perfluorooctane sulfonamide (MeFOSA)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc					
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc					
N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	µg/L	0.001		<0.05	<0.05	nc	<0.05	<0.05	nc	<0.05	<0.05	nc					
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	µg/L	0.001		<0.05	<0.1	nc	<0.05	<0.05	nc	<0.05	<0.1	nc					
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	µg/L	0.0005		<0.02	<0.02	nc	<0.02	<0.02	nc	<0.02	<0.02	nc					
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	µg/L	0.001		<0.05	<0.5	nc	<0.05	<0.05	nc	<0.05	<0.5	nc					

Notes

LOR = Limit of Reporting
nc = non calculable as concentrations in one or both samples ≤
High RPDs (>30%, or >50% for results 10-20 x LOR) are highl

Table D2 - Sediment Duplicate RPDs

Lab Report Number				ES2411964		ES2411964		RPD	ES2411964		348827		RPD	ES2411964		348827		RPD	ES2411995		ES2411995		RPD			
Field ID				0020_SD019_240408	0020_QC103_240408	0020_SD019_240408			0020_QC203_240408	0020_QC102_240408				0020_QC102_240408			0021_SD031_240409			0021_QC102_240409						
Matrix Type				Soil	Soil	Soil			Soil	Soil				Soil			Soil									
Date				08 Apr 2024	08 Apr 2024	08 Apr 2024			08 Apr 2024	08 Apr 2024				08 Apr 2024			08 Apr 2024			09 Apr 2024				09 Apr 2024		
				Unit	LOR	RPD																				
PFAS																										
Perfluorooctanoic acid (PFOA)				mg/kg	0.0001		<0.0002	<0.0002	nc	<0.0002	0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002				
Perfluorooctane sulfonic acid (PFOS)				mg/kg	0.0001		0.0116	0.0094	21	0.0116	0.01	15	<0.0002	<0.0002	nc	<0.0002	0.0003	nc	<0.0002	<0.0002	nc	<0.0002				
Perfluorohexane sulfonic acid (PFHxS)				mg/kg	0.0001		0.0007	0.0007	0	0.0007	0.0005	33	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002				
Sum of PFHxS and PFOS				mg/kg	0.0001		0.0123	0.0101	20	0.0123	0.011	11	<0.0002	<0.0002	nc	<0.0002	0.0003	nc	<0.0002	<0.0002	nc	<0.0002				
Sum of PFAS				mg/kg	0.0001		0.0137	0.0108	24	0.0137	0.011	22	<0.0002	<0.0002	nc	<0.0002	0.0003	nc	0.0014	<0.0002	nc	<0.0002				
PFAS - Perfluoroalkyl Sulfonic Acids																										
Perfluorobutane sulfonic acid (PFBS)				mg/kg	0.0001		<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002				
Perfluoropentane sulfonic acid (PFPeS)				mg/kg	0.0001		<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002				
Perfluoroheptane sulfonic acid (PFHpS)				mg/kg	0.0001		<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002				
Perfluorodecane sulfonic acid (PFDS)				mg/kg	0.0002		<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002				
PFAS - Perfluoroalkyl Carboxylic Acids																										
Perfluorobutanoic acid (PFBA)				mg/kg	0.0002		<0.001	<0.001	nc	<0.001	<0.0002	nc	<0.001	<0.001	nc	<0.001	<0.0002	nc	<0.001	<0.0002	nc	<0.001				
Perfluoropentanoic acid (PFPeA)				mg/kg	0.0002		<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002				
Perfluorohexanoic acid (PFHxA)				mg/kg	0.0001		<0.0002	<0.0002	nc	<0.0002	0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0001	nc	<0.0002				
Perfluoroheptanoic acid (PFHpA)				mg/kg	0.0001		<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0001	nc	<0.0002				
Perfluorononanoic acid (PFNA)				mg/kg	0.0001		<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0001	nc	<0.0002				
Perfluorodecanoic acid (PFDA)				mg/kg	0.0002		0.0002	<0.0002	nc	0.0002	<0.0005	nc	<0.0002	<0.0002	nc	<0.0002	<0.0005	nc	<0.0002	<0.0005	nc	<0.0002				
Perfluoroundecanoic acid (PFUnDA)				mg/kg	0.0002		0.0006	0.0004	40	0.0006	<0.0005	18	<0.0002	<0.0002	nc	<0.0002	<0.0005	nc	<0.0002	<0.0005	nc	<0.0002				
Perfluorododecanoic acid (PFDoDA)				mg/kg	0.0002		0.0004	0.0003	29	0.0004	<0.0005	nc	<0.0002	<0.0002	nc	<0.0002	<0.0005	nc	<0.0002	<0.0005	nc	<0.0002				
Perfluorotridecanoic acid (PFTriDA)				mg/kg	0.0002		0.0002	<0.0002	nc	0.0002	<0.0005	nc	<0.0002	<0.0002	nc	<0.0002	<0.0005	nc	<0.0002	<0.0005	nc	<0.0002				
Perfluorotetradecanoic acid (PFTeDA)				mg/kg	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.005	nc	<0.0005	<0.0005	nc	<0.0005	<0.005	nc	<0.0005	<0.005	nc	<0.0005				
PFAS - (n:2) Fluorotelomer Sulfonic Acids																										
4:2 Fluorotelomer sulfonic acid (4:2 FTS)				mg/kg	0.0001		<0.0005	<0.0005	nc	<0.0005	<0.0001	nc	<0.0005	<0.0005	nc	<0.0005	<0.0001	nc	<0.0005	<0.0001	nc	<0.0005				
6:2 Fluorotelomer sulfonic acid (6:2 FTS)				mg/kg	0.0001		<0.0005	<0.0005	nc	<0.0005	<0.0001	nc	<0.0005	<0.0005	nc	<0.0005	<0.0001	nc	<0.0005	<0.0001	nc	<0.0005				
8:2 Fluorotelomer sulfonic acid (8:2 FTS)				mg/kg	0.0002		<0.0005	<0.0005	nc	<0.0005	<0.0002	nc	<0.0005	<0.0005	nc	<0.0005	<0.0002	nc	<0.0005	<0.0002	nc	<0.0005				
10:2 Fluorotelomer sulfonic acid (10:2 FTS)				mg/kg	0.0002		<0.0005	<0.0005	nc	<0.0005	<0.0002	nc	<0.0005	<0.0005	nc	<0.0005	<0.0002	nc	<0.0005	<0.0002	nc	<0.0005				
PFAS - Perfluoroalkyl Sulfonamides																										
Perfluorooctane sulfonamide (FOSA)				mg/kg	0.0002		<0.0002	<0.0002	nc	<0.0002	<0.001	nc	<0.0002	<0.0002	nc	<0.0002	<0.001	nc	<0.0002	<0.001	nc	<0.0002				
N-Methyl perfluorooctane sulfonamide (MeFOSA)				mg/kg	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.001	nc	<0.0005	<0.0005	nc	<0.0005	<0.001	nc	<0.0005	<0.001	nc	<0.0005				
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)				mg/kg	0.0002		<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002				
N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)				mg/kg	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.001	nc	<0.0005	<0.0005	nc	<0.0005	<0.001	nc	<0.0005	<0.001	nc	<0.0005				
N-Ethyl perfluorooctane sulfonamide (EtFOSA)				mg/kg	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.001	nc	<0.0005	<0.0005	nc	<0.0005	<0.001	nc	<0.0005	<0.001	nc	<0.0005				
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)				mg/kg	0.0002		<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002				
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)				mg/kg	0.0005		<0.0005	<0.0005	nc	<0.0005	<0.005	nc	<0.0005	<0.0005	nc	<0.0005	<0.005	nc	0.0014	<0.0005	nc	<0.0005				

Table D2 - Sediment Duplicate RPDs

Lab Report Number Field ID Matrix Type Date				ES2411995		348825	ES2411995		ES2411995		ES2411995		ES2411995		ES2411995		ES2411995		348825		
				0021_SD031_240409		0021_QC202_240409	0021_SD069_240410		0021_QC107_240410	0021_SD069_240410		0021_QC207_240410	0021_SD049_240410		0021_QC108_240410	0021_SD049_240410		0021_QC208_240410			
				Soil		Soil	Soil		Soil	Soil		Soil	Soil		Soil	Soil		Soil			
				09 Apr 2024		09 Apr 2024	RPD	10 Apr 2024		10 Apr 2024	RPD	10 Apr 2024		10 Apr 2024	RPD	10 Apr 2024		10 Apr 2024	RPD	10 Apr 2024	
	Unit	LOR	RPD																		
PFAS																					
Perfluorooctanoic acid (PFOA)	mg/kg	0.0001		<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc			
Perfluorooctane sulfonic acid (PFOS)	mg/kg	0.0001		<0.0002	<0.0001	nc	0.0404	0.046	13	0.0404	0.043	6	0.0005	0.0003	50	0.0005	0.0007	33			
Perfluorohexane sulfonic acid (PFHxS)	mg/kg	0.0001		<0.0002	<0.0001	nc	0.0044	0.0052	17	0.0044	0.0044	0	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc			
Sum of PFHxS and PFOS	mg/kg	0.0001		<0.0002	<0.0001	nc	0.0448	0.0512	13	0.0448	0.047	5	0.0005	0.0003	50	0.0005	0.0007	33			
Sum of PFAS	mg/kg	0.0001		0.0014	<0.0001	nc	0.0457	0.0512	11	0.0457	0.048	5	0.0005	0.0003	50	0.0005	0.0007	33			
PFAS - Perfluoroalkyl Sulfonic Acids																					
Perfluorobutane sulfonic acid (PFBS)	mg/kg	0.0001		<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc			
Perfluoropentane sulfonic acid (PFPeS)	mg/kg	0.0001		<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc			
Perfluoroheptane sulfonic acid (PFHpS)	mg/kg	0.0001		<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc			
Perfluorodecane sulfonic acid (PFDS)	mg/kg	0.0002		<0.0002	<0.0002	nc	0.0009	<0.0002	nc	0.0009	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc			
PFAS - Perfluoroalkyl Carboxylic Acids																					
Perfluorobutanoic acid (PFBA)	mg/kg	0.0002		<0.001	<0.0002	nc	<0.001	<0.001	nc	<0.001	<0.0002	nc	<0.001	<0.001	nc	<0.001	<0.0002	nc			
Perfluoropentanoic acid (PFPeA)	mg/kg	0.0002		<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc			
Perfluorohexanoic acid (PFHxA)	mg/kg	0.0001		<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc			
Perfluoroheptanoic acid (PFHpA)	mg/kg	0.0001		<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc			
Perfluorononanoic acid (PFNA)	mg/kg	0.0001		<0.0002	<0.0001	nc	<0.0002	<0.0002	nc	<0.0002	0.0001	nc	<0.0002	<0.0002	nc	<0.0002	<0.0001	nc			
Perfluorodecanoic acid (PFDA)	mg/kg	0.0002		<0.0002	<0.0005	nc	<0.0002	<0.0002	nc	<0.0002	<0.002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0005	nc			
Perfluoroundecanoic acid (PFUnDA)	mg/kg	0.0002		<0.0002	<0.0005	nc	<0.0002	<0.0002	nc	<0.0002	<0.002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0005	nc			
Perfluorododecanoic acid (PFDoDA)	mg/kg	0.0002		<0.0002	<0.0005	nc	<0.0002	<0.0002	nc	<0.0002	<0.0050	nc	<0.0002	<0.0002	nc	<0.0002	<0.0005	nc			
Perfluorotridecanoic acid (PFTrDA)	mg/kg	0.0002		<0.0002	<0.0005	nc	<0.0002	<0.0002	nc	<0.0002	<0.0005	nc	<0.0002	<0.0002	nc	<0.0002	<0.0005	nc			
Perfluorotetradecanoic acid (PFTeDA)	mg/kg	0.0005		<0.0005	<0.005	nc	<0.0005	<0.0006	nc	<0.0005	<0.005	nc	<0.0005	<0.0005	nc	<0.0005	<0.005	nc			
PFAS - (n:2) Fluorotelomer Sulfonic Acids																					
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	mg/kg	0.0001		<0.0005	<0.0001	nc	<0.0005	<0.0005	nc	<0.0005	<0.0001	nc	<0.0005	<0.0005	nc	<0.0005	<0.0001	nc			
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	mg/kg	0.0001		<0.0005	<0.0001	nc	<0.0005	<0.0005	nc	<0.0005	<0.0001	nc	<0.0005	<0.0005	nc	<0.0005	<0.0001	nc			
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	mg/kg	0.0002		<0.0005	<0.0002	nc	<0.0005	<0.0005	nc	<0.0005	<0.0002	nc	<0.0005	<0.0005	nc	<0.0005	<0.0002	nc			
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	mg/kg	0.0002		<0.0005	<0.0002	nc	<0.0005	<0.0005	nc	<0.0005	<0.0002	nc	<0.0005	<0.0005	nc	<0.0005	<0.0002	nc			
PFAS - Perfluoroalkyl Sulfonamides																					
Perfluorooctane sulfonamide (FOSA)	mg/kg	0.0002		<0.0002	<0.001	nc	<0.0002	<0.0002	nc	<0.0002	<0.001	nc	<0.0002	<0.0002	nc	<0.0002	<0.001	nc			
N-Methyl perfluorooctane sulfonamide (MeFOSA)	mg/kg	0.0005		<0.0005	<0.001	nc	<0.0005	<0.0006	nc	<0.0005	<0.01	nc	<0.0005	<0.0005	nc	<0.0005	<0.001	nc			
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	mg/kg	0.0002		<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc			
N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	mg/kg	0.0005		<0.0005	<0.001	nc	<0.0005	<0.0006	nc	<0.0005	<0.005	nc	<0.0005	<0.0005	nc	<0.0005	<0.001	nc			
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	mg/kg	0.0005		<0.0005	<0.001	nc	<0.0005	<0.0006	nc	<0.0005	<0.005	nc	<0.0005	<0.0005	nc	<0.0005	<0.001	nc			
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	mg/kg	0.0002		<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc	<0.0002	<0.0002	nc			
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	mg/kg	0.0005		0.0014	<0.005	nc	<0.0005	<0.0006	nc	<0.0005	<0.02	nc	<0.0005	<0.0005	nc	<0.0005	<0.005	nc			

Notes
LOR = Limit of Reporting
nc = non calculable as concentrations in one or both samples are
High RPDs (>30%, or >50% for results 10-20 x LOR) are highlight

Notes
LOR = Limit of Reporting
nc = non calculable as concentrations in one or both samples are
High RPDs (>30%, or >50% for results 10-20 x LOR) are highlighted

Table D3 - Rinsate Blank Results

Lab Report Number			ES2411964	ES2411994	ES2411994	ES2411994	ES2411994	ES2411994
Field ID			0020_QC300_240408	0021_QC300_240408	0021_QC301_240409	0021_QC302_240410	0021_QC303_240411	0021_QC304_240412
Matrix Type			Water	Water	Water	Water	Water	Water
Date			08 Apr 2024	08 Apr 2024	09 Apr 2024	10 Apr 2024	11 Apr 2024	12 Apr 2024
	Unit	LOR						
PFAS								
Perfluorooctanoic acid (PFOA)	µg/L	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorooctane sulfonic acid (PFOS)	µg/L	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorohexane sulfonic acid (PFHxS)	µg/L	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
Sum of PFHxS and PFOS	µg/L	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
Sum of PFAS	µg/L	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
PFAS - Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroheptane sulfonic acid (PFHpS)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecane sulfonic acid (PFDS)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
PFAS - Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	µg/L	0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroheptanoic acid (PFHpA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorononanoic acid (PFNA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
PFAS - (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
PFAS - Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05

Notes
LOR = Limit of Reporting

Table D4 - Field Blank Results

Lab Report Number			ES2411964		ES2411994		ES2411994		ES2411994		ES2411994											
			Field ID		0020	QC400	240408	0021	QC400	240408	0021	QC401	240409	0021	QC402	240410	0021	QC403	240411	0021	QC404	240412
			Matrix Type		Water		Water		Water		Water		Water		Water		Water		Water			
			Date		08 Apr 2024		08 Apr 2024		09 Apr 2024		10 Apr 2024		11 Apr 2024		12 Apr 2024							
	Unit	LOR																				
PFAS																						
Perfluorooctanoic acid (PFOA)	µg/L	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01		
Perfluorooctane sulfonic acid (PFOS)	µg/L	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01		
Perfluorohexane sulfonic acid (PFHxS)	µg/L	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01		
Sum of PFHxS and PFOS	µg/L	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01		
Sum of PFAS	µg/L	0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01		
PFAS - Perfluoroalkyl Sulfonic Acids																						
Perfluorobutane sulfonic acid (PFBS)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
Perfluoropentane sulfonic acid (PFPeS)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
Perfluoroheptane sulfonic acid (PFHpS)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
Perfluorodecane sulfonic acid (PFDS)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
PFAS - Perfluoroalkyl Carboxylic Acids																						
Perfluorobutanoic acid (PFBA)	µg/L	0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1		
Perfluoropentanoic acid (PFPeA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
Perfluorohexanoic acid (PFHxA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
Perfluoroheptanoic acid (PFHpA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
Perfluorononanoic acid (PFNA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
Perfluorodecanoic acid (PFDA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
Perfluoroundecanoic acid (PFUnDA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
Perfluorododecanoic acid (PFDoDA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
Perfluorotridecanoic acid (PFTriDA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
Perfluorotetradecanoic acid (PFTeDA)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05		
PFAS - (n:2) Fluorotelomer Sulfonic Acids																						
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05		
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05		
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05		
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05		
PFAS - Perfluoroalkyl Sulfonamides																						
Perfluorooctane sulfonamide (FOSA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
N-Methyl perfluorooctane sulfonamide (MeFOSA)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05		
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
N-methyl perfluorooctane sulfonamidoethanol (MeFOSE)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05		
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05		
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02		
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	µg/L	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05		

Notes
LOR = Limit of Reporting

Appendix E

Laboratory Certificates



CERTIFICATE OF ANALYSIS

Work Order : **ES2411964**

Amendment : **1**

Client : **AECOM AUSTRALIA PTY LTD**

Contact : [REDACTED]

Address : LEVEL 2 60 MARCUS CLARKE ST
CANBERRA ACT, AUSTRALIA 2600

Telephone : ----

Project : ACT_0020_PFASOMP_24

Order number : 60612562_4.1

C-O-C number : 65532

Sampler : [REDACTED] [REDACTED]

Site : HMAS Creswell (0020)

Quote number : SY/139/19 v4 60612562_4.1

No. of samples received : 49

No. of samples analysed : 49

Page : 1 of 25

Laboratory : Environmental Division Sydney

Contact : [REDACTED]

Address : 277-289 Woodpark Road Smithfield NSW Australia 2164

Telephone : +61 2 8784 8555

Date Samples Received : 12-Apr-2024 17:48

Date Analysis Commenced : 17-Apr-2024

Issue Date : 20-May-2024 21:14



Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted, unless the sampling was conducted by ALS. This document shall not be reproduced, except in full.

This Certificate of Analysis contains the following information:

- General Comments
- Analytical Results
- Surrogate Control Limits

Additional information pertinent to this report will be found in the following separate attachments: Quality Control Report, QA/QC Compliance Assessment to assist with Quality Review and Sample Receipt Notification.

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	Position	Accreditation Category
[REDACTED]	Senior Chemist - Inorganics	Sydney Inorganics, Smithfield, NSW
[REDACTED]	LCMS Coordinator	Sydney Inorganics, Smithfield, NSW
[REDACTED]	LCMS Coordinator	Sydney Organics, Smithfield, NSW



General Comments

The analytical procedures used by ALS have been developed from established internationally recognised procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are fully validated and are often at the client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis.

Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

When sampling time information is not provided by the client, sampling dates are shown without a time component. In these instances, the time component has been assumed by the laboratory for processing purposes.

Where a result is required to meet compliance limits the associated uncertainty must be considered. Refer to the ALS Contract for details.

Key : CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.

LOR = Limit of reporting

^ = This result is computed from individual analyte detections at or above the level of reporting

ø = ALS is not NATA accredited for these tests.

~ = Indicates an estimated value.

- EP231X - Per- and Polyfluoroalkyl Substances (PFAS): Samples received in 20mL or 125mL bottles have been tested in accordance with the QSM5.4 compliant, NATA accredited method. 60mL or 250mL bottles have been tested to the legacy QSM 5.1 aligned, NATA accredited method.
- Amendment (20/05/2024): This report has been amended as a result of a request to change sampling time for sample 046, 0020_QC102_240408. All analysis results are as per the previous report.
- EP231: Stable isotope enriched internal standards are added to samples prior to extraction. Target compounds have a direct analogous internal standard with the exception of PFPeS, PFHpA, PFDS, PFTrDA and 10:2 FTS. These compounds use an internal standard that is chemically related and has a retention time close to that of the target compound. The DQO for internal standard response is 50-150% of that established at initial calibration or as per tables in USEPA 1633 where listed. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. These practices are in line with recommendations in the National Environmental Management Plan for PFAS and also conform to QSM 5.4 (US DoD) requirements.
- EP231: Stable isotope enriched internal standards are added to samples prior to extraction. Target compounds have a direct analogous internal standard with the exception of PFPeS, PFHpA, PFDS, PFTrDA and 10:2 FTS. These compounds use an internal standard that is chemically related and has a retention time close to that of the target compound. The DQO for internal standard response is 50-150% of that established at initial calibration or as per USEPA 1633 limits where LISTED. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. These practices are in line with recommendations in the National Environmental Management Plan for PFAS and also conform to QSM 5.4 (US DoD) requirements.



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: GROUNDWATER (Matrix: WATER)				Sample ID	0020_MW007_240408	0020_MW012_240408	0020_MW017_240408	0020_MW037_240408	0020_MW102D_240408
Sampling date / time					08-Apr-2024 10:03	08-Apr-2024 10:01	08-Apr-2024 10:31	08-Apr-2024 11:23	08-Apr-2024 08:23
Compound	CAS Number	LOR	Unit	ES2411964-001	ES2411964-002	ES2411964-003	ES2411964-004	ES2411964-005	
				Result	Result	Result	Result	Result	
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.03	0.05	<0.02	1.35	0.02	
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.09	0.02	1.80	0.02	
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.14	1.26	0.32	7.17	0.43	
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.08	0.03	0.93	0.06	
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.11	7.22	1.03	3.00	1.16	
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	0.8	<0.1	
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.02	<0.02	2.49	0.05	
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.12	0.05	3.36	0.15	
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.03	0.02	0.66	0.02	
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.07	0.02	0.87	0.02	
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0020_MW007_240408	0020_MW012_240408	0020_MW017_240408	0020_MW037_240408	0020_MW102D_240408
Sampling date / time				08-Apr-2024 10:03	08-Apr-2024 10:01	08-Apr-2024 10:31	08-Apr-2024 11:23	08-Apr-2024 08:23
Compound	CAS Number	LOR	Unit	ES2411964-001	ES2411964-002	ES2411964-003	ES2411964-004	ES2411964-005
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	5.60	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	0.28	8.97	1.49	28.6	1.93
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.25	8.48	1.35	10.2	1.59
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.28	8.77	1.44	25.3	1.85
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	95.3	103	97.9	102	98.9
13C8-PFOA	----	0.02	%	106	112	103	101	108



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: GROUNDWATER (Matrix: WATER)				Sample ID	0020_MW105_240408	0020_MW109_240408	0020_MW110_240408	0020_MW111_240408	0020_MW112_240408
Sampling date / time				08-Apr-2024 08:43	08-Apr-2024 11:05	08-Apr-2024 13:06	08-Apr-2024 11:44	08-Apr-2024 11:05	
Compound	CAS Number	LOR	Unit	ES2411964-006	ES2411964-007	ES2411964-008	ES2411964-009	ES2411964-010	
				Result	Result	Result	Result	Result	
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.04	0.06	0.09	0.13	
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.04	0.09	0.12	0.10	
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.31	1.63	1.31	0.74	
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.03	0.14	0.05	<0.02	
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.57	4.36	14.4	0.19	
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	0.2	<0.1	
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.20	0.53	0.04	
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.06	0.11	0.35	0.14	
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.06	0.18	0.04	
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.01	0.13	0.14	0.07	
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	0.05	<0.02	
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0020_MW105_240408	0020_MW109_240408	0020_MW110_240408	0020_MW111_240408	0020_MW112_240408
Sampling date / time				08-Apr-2024 08:43	08-Apr-2024 11:05	08-Apr-2024 13:06	08-Apr-2024 11:44	08-Apr-2024 11:05
Compound	CAS Number	LOR	Unit	ES2411964-006	ES2411964-007	ES2411964-008	ES2411964-009	ES2411964-010
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	0.21	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	<0.01	1.06	6.78	17.8	1.48
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	<0.01	0.88	5.99	15.7	0.93
Sum of PFAS (WA DER List)	----	0.01	µg/L	<0.01	0.99	6.55	17.4	1.35
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	86.3	108	111	107	104
13C8-PFOA	----	0.02	%	99.7	106	100	110	109



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0020_MW115_240408	0020_QC100_240408	----	----	----
Sampling date / time				08-Apr-2024 11:30	08-Apr-2024 11:06	----	----	----
Compound	CAS Number	LOR	Unit	ES2411964-011	ES2411964-044	-----	-----	-----
				Result	Result	----	----	----
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.02	----	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.08	0.44	----	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.06	----	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	3.26	1.21	----	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	----	----	----
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	----	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.02	----	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.16	----	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.03	----	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.03	----	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	----	----	----
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	----	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	----	----	----



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0020_MW115_240408	0020_QC100_240408	----	----	----
Sampling date / time				08-Apr-2024 11:30	08-Apr-2024 11:06	----	----	----
Compound	CAS Number	LOR	Unit	ES2411964-011	ES2411964-044	-----	-----	-----
				Result	Result	----	----	----
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	----	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	----	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	----	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	----	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	----	----	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	----	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	----	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	----	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	----	----	----
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	3.34	1.97	----	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	3.34	1.65	----	----	----
Sum of PFAS (WA DER List)	----	0.01	µg/L	3.34	1.89	----	----	----
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	104	99.5	----	----	----
13C8-PFOA	----	0.02	%	103	98.5	----	----	----



Analytical Results

Sub-Matrix: RINSATE
 (Matrix: WATER)

Sample ID

				0020_QC300_240408	0020_QC400_240408	----	----	----
Sampling date / time				08-Apr-2024 16:16	08-Apr-2024 16:18	----	----	----
Compound	CAS Number	LOR	Unit	ES2411964-043	ES2411964-049	-----	-----	-----
				Result	Result	----	----	----
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	----	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	----	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	----	----	----
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	----	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	----	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	----	----	----
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	----	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	----	----	----



Analytical Results

Sub-Matrix: RINSATE
 (Matrix: WATER)

Sample ID

				0020_QC300_240408	0020_QC400_240408	----	----	----
Sampling date / time				08-Apr-2024 16:16	08-Apr-2024 16:18	----	----	----
Compound	CAS Number	LOR	Unit	ES2411964-043	ES2411964-049	-----	-----	-----
				Result	Result	----	----	----
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	----	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	----	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	----	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	----	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	----	----	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	----	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	----	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	----	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	----	----	----
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	----	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	<0.01	<0.01	----	----	----
Sum of PFAS (WA DER List)	----	0.01	µg/L	<0.01	<0.01	----	----	----
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	102	93.1	----	----	----
13C8-PFOA	----	0.02	%	102	97.4	----	----	----



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0020_SD001_240408	0020_SD002_240408	0020_SD004_240408	0020_SD006_240408	0020_SD007_240408
Sampling date / time				08-Apr-2024 11:50	08-Apr-2024 11:37	08-Apr-2024 10:45	08-Apr-2024 08:50	08-Apr-2024 12:04
Compound	CAS Number	LOR	Unit	ES2411964-012	ES2411964-013	ES2411964-014	ES2411964-015	ES2411964-016
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	18.9	42.1	38.1	26.1	5.0
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	0.0004	0.0003	0.0008	<0.0002
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.0007	0.0048	0.0030	<0.0002
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTriDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0020_SD001_240408	0020_SD002_240408	0020_SD004_240408	0020_SD006_240408	0020_SD007_240408
Sampling date / time				08-Apr-2024 11:50	08-Apr-2024 11:37	08-Apr-2024 10:45	08-Apr-2024 08:50	08-Apr-2024 12:04
Compound	CAS Number	LOR	Unit	ES2411964-012	ES2411964-013	ES2411964-014	ES2411964-015	ES2411964-016
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	<0.0002	0.0011	0.0051	0.0038	<0.0002
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	<0.0002	0.0011	0.0051	0.0038	<0.0002
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	<0.0002	0.0011	0.0051	0.0038	<0.0002
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	92.6	99.2	96.2	97.2	95.3
13C8-PFOA	----	0.0002	%	103	104	99.9	107	98.6



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0020_SD018_240408	0020_SD019_240408	0020_SD024_240408	0020_SD025_240408	0020_SD026_240408
Sampling date / time				08-Apr-2024 10:42	08-Apr-2024 10:32	08-Apr-2024 09:33	08-Apr-2024 13:46	08-Apr-2024 13:09
Compound	CAS Number	LOR	Unit	ES2411964-017	ES2411964-018	ES2411964-019	ES2411964-020	ES2411964-021
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	10.0	49.7	32.4	28.2	17.6
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	0.0007	<0.0002	0.0005	<0.0002
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.0116	0.0016	0.0029	<0.0002
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	0.0006	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	0.0008	<0.0002
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	0.0006	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	0.0004	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0020_SD018_240408	0020_SD019_240408	0020_SD024_240408	0020_SD025_240408	0020_SD026_240408
Sampling date / time				08-Apr-2024 10:42	08-Apr-2024 10:32	08-Apr-2024 09:33	08-Apr-2024 13:46	08-Apr-2024 13:09
Compound	CAS Number	LOR	Unit	ES2411964-017	ES2411964-018	ES2411964-019	ES2411964-020	ES2411964-021
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	<0.0002	0.0137	0.0016	0.0048	<0.0002
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	<0.0002	0.0123	0.0016	0.0034	<0.0002
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	<0.0002	0.0123	0.0016	0.0048	<0.0002
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	100	101	88.8	102	99.8
13C8-PFOA	----	0.0002	%	101	106	98.8	102	102



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0020_SD028_240408	0020_SD032_240408	0020_SD033_240408	0020_QC102_240408	0020_QC103_240408
Sampling date / time				08-Apr-2024 13:19	08-Apr-2024 11:10	08-Apr-2024 11:47	08-Apr-2024 13:10	08-Apr-2024 10:32
Compound	CAS Number	LOR	Unit	ES2411964-022	ES2411964-023	ES2411964-024	ES2411964-046	ES2411964-047
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	24.7	30.2	50.0	17.3	36.7
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0005	0.0011	0.0019	<0.0002	0.0007
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0094	0.0132	0.0115	<0.0002	0.0094
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.0005	<0.0002	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.0013	<0.0002	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.0005	<0.0002	<0.0002
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.0004	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	0.0004	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0003	<0.0002	0.0004
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.0010	<0.0002	0.0003
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0006	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	0.0003	0.0019	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0020_SD028_240408	0020_SD032_240408	0020_SD033_240408	0020_QC102_240408	0020_QC103_240408
Sampling date / time				08-Apr-2024 13:19	08-Apr-2024 11:10	08-Apr-2024 11:47	08-Apr-2024 13:10	08-Apr-2024 10:32
Compound	CAS Number	LOR	Unit	ES2411964-022	ES2411964-023	ES2411964-024	ES2411964-046	ES2411964-047
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	0.0008	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	0.0103	0.0154	0.0199	<0.0002	0.0108
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	0.0099	0.0143	0.0134	<0.0002	0.0101
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	0.0099	0.0143	0.0156	<0.0002	0.0101
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	98.1	103	100	103	91.7
13C8-PFOA	----	0.0002	%	102	98.8	93.2	94.6	92.3



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0020_SW004_240408	0020_SW005_240408	0020_SW010_240408	0020_SW011_240408	0020_SW012_240408
Sampling date / time				08-Apr-2024 10:47	08-Apr-2024 10:28	08-Apr-2024 09:34	08-Apr-2024 13:45	08-Apr-2024 13:13
Compound	CAS Number	LOR	Unit	ES2411964-025	ES2411964-026	ES2411964-027	ES2411964-028	ES2411964-029
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.12	0.06	0.12	0.16	0.11
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.25	0.33	0.16	0.26	0.26
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.02	<0.02	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0020_SW004_240408	0020_SW005_240408	0020_SW010_240408	0020_SW011_240408	0020_SW012_240408
Sampling date / time				08-Apr-2024 10:47	08-Apr-2024 10:28	08-Apr-2024 09:34	08-Apr-2024 13:45	08-Apr-2024 13:13
Compound	CAS Number	LOR	Unit	ES2411964-025	ES2411964-026	ES2411964-027	ES2411964-028	ES2411964-029
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	0.37	0.39	0.30	0.42	0.37
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.37	0.39	0.28	0.42	0.37
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.37	0.39	0.30	0.42	0.37
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	101	95.0	94.3	104	95.8
13C8-PFOA	----	0.02	%	101	112	108	110	105



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: SURFACE WATER (Matrix: WATER)				Sample ID	0020_SW016_240408	0020_SW018_240408	0020_SW022_240408	0020_SW023_240408	0020_SW026_240408
Sampling date / time				08-Apr-2024 13:39	08-Apr-2024 13:21	08-Apr-2024 11:11	08-Apr-2024 11:45	08-Apr-2024 11:51	
Compound	CAS Number	LOR	Unit	ES2411964-030	ES2411964-031	ES2411964-032	ES2411964-033	ES2411964-034	
				Result	Result	Result	Result	Result	
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.08	0.04	0.08	0.07	<0.02	
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.02	<0.02	0.10	0.05	<0.02	
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.30	0.24	0.99	0.43	0.06	
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.02	<0.02	0.03	<0.02	<0.02	
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.82	0.46	1.92	0.30	0.08	
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1	
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.03	0.16	<0.02	
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.05	0.05	0.11	0.16	<0.02	
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.02	0.05	<0.02	
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.01	0.01	0.04	0.03	<0.01	
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0020_SW016_240408	0020_SW018_240408	0020_SW022_240408	0020_SW023_240408	0020_SW026_240408
Sampling date / time				08-Apr-2024 13:39	08-Apr-2024 13:21	08-Apr-2024 11:11	08-Apr-2024 11:45	08-Apr-2024 11:51
Compound	CAS Number	LOR	Unit	ES2411964-030	ES2411964-031	ES2411964-032	ES2411964-033	ES2411964-034
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	0.15	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	1.30	0.80	3.32	1.43	0.14
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	1.12	0.70	2.91	0.73	0.14
Sum of PFAS (WA DER List)	----	0.01	µg/L	1.26	0.80	3.19	1.35	0.14
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	98.8	98.4	103	102	104
13C8-PFOA	----	0.02	%	98.6	112	94.1	108	107



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: SURFACE WATER (Matrix: WATER)				Sample ID	0020_SW027_240408	0020_SW029_240408	0020_SW030_240408	0020_SW032_240408	0020_SW033_240408
Sampling date / time				08-Apr-2024 11:38	08-Apr-2024 10:46	08-Apr-2024 08:39	08-Apr-2024 08:52	08-Apr-2024 12:03	
Compound	CAS Number	LOR	Unit	ES2411964-035	ES2411964-036	ES2411964-037	ES2411964-038	ES2411964-039	
				Result	Result	Result	Result	Result	
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.07	0.06	0.09	<0.01	<0.01	
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.06	0.06	0.11	0.01	0.01	
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1	
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01	
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: SURFACE WATER (Matrix: WATER)				Sample ID	0020_SW027_240408	0020_SW029_240408	0020_SW030_240408	0020_SW032_240408	0020_SW033_240408
Sampling date / time				08-Apr-2024 11:38	08-Apr-2024 10:46	08-Apr-2024 08:39	08-Apr-2024 08:52	08-Apr-2024 12:03	
Compound	CAS Number	LOR	Unit	ES2411964-035	ES2411964-036	ES2411964-037	ES2411964-038	ES2411964-039	
				Result	Result	Result	Result	Result	
EP231C: Perfluoroalkyl Sulfonamides - Continued									
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
EP231P: PFAS Sums									
Sum of PFAS	----	0.01	µg/L	0.13	0.12	0.20	0.01	0.01	
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.13	0.12	0.20	0.01	0.01	
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.13	0.12	0.20	0.01	0.01	
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.02	%	89.5	101	107	106	95.1	
13C8-PFOA	----	0.02	%	92.3	103	101	112	89.1	



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: SURFACE WATER (Matrix: WATER)				Sample ID	0020_SW035_240408	0020_SW036_240408	0020_SW037_240408	0020_QC101_240408	0020_QC104_240408
Sampling date / time				08-Apr-2024 09:37	08-Apr-2024 09:48	08-Apr-2024 09:55	08-Apr-2024 10:02	08-Apr-2024 13:12	
Compound	CAS Number	LOR	Unit	ES2411964-040	ES2411964-041	ES2411964-042	ES2411964-045	ES2411964-048	
				Result	Result	Result	Result	Result	
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.03	0.03	0.05	<0.02	
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.04	0.02	0.02	0.08	<0.02	
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	1.17	0.37	0.33	1.43	0.13	
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.03	<0.02	<0.02	0.10	<0.02	
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	1.01	0.60	0.55	7.18	0.14	
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	0.03	<0.02	<0.02	<0.02	<0.02	
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1	
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	0.25	<0.02	<0.02	0.03	<0.02	
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.34	0.04	0.04	0.14	<0.02	
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	0.05	<0.02	<0.02	0.03	<0.02	
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.08	0.01	0.02	0.06	<0.01	
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	0.03	<0.02	<0.02	<0.02	<0.02	
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	0.08	<0.02	<0.02	<0.02	<0.02	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: SURFACE WATER (Matrix: WATER)				Sample ID	0020_SW035_240408	0020_SW036_240408	0020_SW037_240408	0020_QC101_240408	0020_QC104_240408
Sampling date / time					08-Apr-2024 09:37	08-Apr-2024 09:48	08-Apr-2024 09:55	08-Apr-2024 10:02	08-Apr-2024 13:12
Compound	CAS Number	LOR	Unit	ES2411964-040	ES2411964-041	ES2411964-042	ES2411964-045	ES2411964-048	
				Result	Result	Result	Result	Result	
EP231C: Perfluoroalkyl Sulfonamides - Continued									
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
EP231P: PFAS Sums									
Sum of PFAS	----	0.01	µg/L	3.15	1.07	0.99	9.10	0.27	
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	2.18	0.97	0.88	8.61	0.27	
Sum of PFAS (WA DER List)	----	0.01	µg/L	2.90	1.05	0.97	8.92	0.27	
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.02	%	97.2	96.7	102	102	109	
13C8-PFOA	----	0.02	%	88.4	99.1	98.2	92.7	99.2	



Surrogate Control Limits

Sub-Matrix: GROUNDWATER		Recovery Limits (%)	
Compound	CAS Number	Low	High
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

Sub-Matrix: RINSATE		Recovery Limits (%)	
Compound	CAS Number	Low	High
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

Sub-Matrix: SEDIMENT		Recovery Limits (%)	
Compound	CAS Number	Low	High
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

Sub-Matrix: SURFACE WATER		Recovery Limits (%)	
Compound	CAS Number	Low	High
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120



QUALITY CONTROL REPORT

Work Order : **ES2411964**

Page : 1 of 15

Amendment : **1**

Client : **AECOM AUSTRALIA PTY LTD**
Contact : **[REDACTED]**
Address : **LEVEL 2 60 MARCUS CLARKE ST
CANBERRA ACT, AUSTRALIA 2600**

Laboratory : **Environmental Division Sydney**
Contact : **[REDACTED]**
Address : **277-289 Woodpark Road Smithfield NSW Australia 2164**

Telephone : **----**
Project : **ACT_0020_PFASOMP_24**
Order number : **60612562_4.1**
C-O-C number : **65532**
Sampler : **[REDACTED]**
Site : **HMAS Creswell (0020)**
Quote number : **SY/139/19 v4 60612562_4.1**
No. of samples received : **49**
No. of samples analysed : **49**

Telephone : **+61 2 8784 8555**
Date Samples Received : **12-Apr-2024**
Date Analysis Commenced : **17-Apr-2024**
Issue Date : **20-May-2024**



Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted, unless the sampling was conducted by ALS. This document shall not be reproduced, except in full.

This Quality Control Report contains the following information:

- Laboratory Duplicate (DUP) Report; Relative Percentage Difference (RPD) and Acceptance Limits
- Method Blank (MB) and Laboratory Control Spike (LCS) Report; Recovery and Acceptance Limits
- Matrix Spike (MS) Report; Recovery and Acceptance Limits

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	Position	Accreditation Category
[REDACTED]	Senior Chemist - Inorganics	Sydney Inorganics, Smithfield, NSW
[REDACTED]	LCMS Coordinator	Sydney Inorganics, Smithfield, NSW
[REDACTED]	LCMS Coordinator	Sydney Organics, Smithfield, NSW



General Comments

The analytical procedures used by ALS have been developed from established internationally recognised procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are fully validated and are often at the client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis. Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

Key :
 Anonymous = Refers to samples which are not specifically part of this work order but formed part of the QC process lot
 CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
 LOR = Limit of reporting
 RPD = Relative Percentage Difference
 # = Indicates failed QC

Laboratory Duplicate (DUP) Report

The quality control term Laboratory Duplicate refers to a randomly selected intralaboratory split. Laboratory duplicates provide information regarding method precision and sample heterogeneity. The permitted ranges for the Relative Percent Deviation (RPD) of Laboratory Duplicates are specified in ALS Method QWI-EN/38 and are dependent on the magnitude of results in comparison to the level of reporting: Result < 10 times LOR: No Limit; Result between 10 and 20 times LOR: 0% - 50%; Result > 20 times LOR: 0% - 20%.

Sub-Matrix: **SOIL**

Sub-Matrix: SOIL				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 5734853)									
ES2406590-011	Anonymous	EA055: Moisture Content	----	0.1	%	14.8	16.3	9.2	0% - 20%
ES2411964-020	0020_SD025_240408	EA055: Moisture Content	----	0.1	%	28.2	30.0	6.0	0% - 20%
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5734265)									
ES2411752-036	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
ES2411964-018	0020_SD019_240408	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0007	0.0008	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0116	0.0124	5.9	0% - 20%
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	0.0002	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5734265)									
ES2411752-036	Anonymous	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit



Sub-Matrix: SOIL				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5734265) - continued									
ES2411752-036	Anonymous	EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.0	No Limit
ES2411964-018	0020_SD019_240408	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.0002	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	0.0002	0.0002	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	0.0006	0.0006	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	0.0004	0.0004	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	0.0002	0.0002	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5734265)									
ES2411752-036	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
ES2411964-018	0020_SD019_240408	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit



Sub-Matrix: SOIL				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5734265) - continued									
ES2411964-018	0020_SD019_240408	EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5734265)									
ES2411752-036	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
ES2411964-018	0020_SD019_240408	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5729180)									
ES2411964-001	0020_MW007_240408	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.14	0.13	8.1	0% - 50%
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.11	0.10	13.8	0% - 50%
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.03	0.03	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
ES2411964-011	0020_MW115_240408	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.08	0.06	17.3	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	3.26	3.04	7.0	0% - 20%
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5729186)									
ES2411964-033	0020_SW023_240408	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.43	0.49	11.6	0% - 20%
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.30	0.33	8.4	0% - 20%



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5729186) - continued									
ES2411964-033	0020_SW023_240408	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.07	0.08	18.7	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.05	0.05	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
ES2411964-042	0020_SW037_240408	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.33	0.29	12.6	0% - 20%
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.55	0.59	6.8	0% - 20%
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.03	<0.02	53.9	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5729180)									
ES2411964-001	0020_MW007_240408	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
ES2411964-011	0020_MW115_240408	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5729186)									
ES2411964-033	0020_SW023_240408	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.03	0.03	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	0.16	0.17	7.2	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.16	0.17	10.6	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5729186) - continued									
ES2411964-033	0020_SW023_240408	EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	0.05	0.06	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDODA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
ES2411964-042	0020_SW037_240408	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.02	0.01	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.04	0.04	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDODA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
		EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5729180)							
ES2411964-001	0020_MW007_240408	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2411964-011	0020_MW115_240408	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5729180) - continued									
ES2411964-011	0020_MW115_240408	EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5729186)									
ES2411964-033	0020_SW023_240408	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2411964-042	0020_SW037_240408	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5729180)									
ES2411964-001	0020_MW007_240408	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5729180) - continued									
ES2411964-001	0020_MW007_240408	EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2411964-011	0020_MW115_240408	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5729186)									
ES2411964-033	0020_SW023_240408	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	0.15	0.16	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2411964-042	0020_SW037_240408	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231P: PFAS Sums (QC Lot: 5729180)									
ES2411964-001	0020_MW007_240408	EP231X: Sum of PFAS	----	0.01	µg/L	0.28	0.26	7.4	0% - 20%
ES2411964-011	0020_MW115_240408	EP231X: Sum of PFAS	----	0.01	µg/L	3.34	3.10	7.5	0% - 20%
EP231P: PFAS Sums (QC Lot: 5729186)									
ES2411964-033	0020_SW023_240408	EP231X: Sum of PFAS	----	0.01	µg/L	1.43	1.59	10.6	0% - 20%
ES2411964-042	0020_SW037_240408	EP231X: Sum of PFAS	----	0.01	µg/L	0.99	0.93	6.2	0% - 20%

The quality control term Method / Laboratory Blank refers to an analyte free matrix to which all reagents are added in the same volumes or proportions as used in standard sample preparation. The purpose of this QC parameter is to monitor potential laboratory contamination. The quality control term Laboratory Control Sample (LCS) refers to a certified reference material, or a known interference free matrix spiked with target analytes. The purpose of this QC parameter is to monitor method precision and accuracy independent of sample matrix. Dynamic Recovery Limits are based on statistical evaluation of processed LCS.

Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
	Spike	Spike Recovery (%)	Acceptable Limits (%)	
Result	Concentration	LCS	Low	High
<0.0002	0.00125 mg/kg	87.6	72.0	128
<0.0002	0.00125 mg/kg	93.0	73.0	123
<0.0002	0.00125 mg/kg	85.2	67.0	130
<0.0002	0.00125 mg/kg	120	70.0	132
<0.0002	0.00125 mg/kg	90.4	68.0	136
<0.0002	0.00125 mg/kg	100	59.0	134
<0.001	0.00625 mg/kg	88.8	71.0	135
<0.0002	0.00125 mg/kg	110	69.0	132
<0.0002	0.00125 mg/kg	115	70.0	132
<0.0002	0.00125 mg/kg	91.4	71.0	131
<0.0002	0.00125 mg/kg	101	69.0	133
<0.0002	0.00125 mg/kg	96.4	72.0	129
<0.0002	0.00125 mg/kg	102	69.0	133
<0.0002	0.00125 mg/kg	112	64.0	136
<0.0002	0.00125 mg/kg	120	69.0	135
<0.0002	0.00125 mg/kg	120	66.0	139
<0.0005	0.00312 mg/kg	98.7	69.0	133
<0.0002	0.00125 mg/kg	105	67.0	137
<0.0005	0.00312 mg/kg	121	71.6	129
<0.0005	0.00312 mg/kg	95.6	69.8	131
<0.0005	0.00312 mg/kg	97.9	68.7	130
<0.0005	0.00312 mg/kg	94.2	65.1	134
<0.0002	0.00125 mg/kg	102	63.0	144
<0.0002	0.00125 mg/kg	106	61.0	139

Sub-Matrix: WATER				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%)	Acceptable Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result		LCS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5729180)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.25 µg/L	99.4	72.0	130
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.25 µg/L	114	71.0	127
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.25 µg/L	90.3	68.0	131
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.25 µg/L	106	69.0	134
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.25 µg/L	106	65.0	140
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	0.25 µg/L	90.8	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5729186)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.25 µg/L	95.7	72.0	130
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.25 µg/L	111	71.0	127
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.25 µg/L	110	68.0	131
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.25 µg/L	113	69.0	134
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.25 µg/L	100	65.0	140
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	0.25 µg/L	94.5	53.0	142
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5729180)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	1.25 µg/L	111	73.0	129
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.25 µg/L	100	72.0	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.25 µg/L	105	72.0	129
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.25 µg/L	90.0	72.0	130
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.25 µg/L	109	71.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	0.25 µg/L	112	69.0	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	0.25 µg/L	110	71.0	129
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	0.25 µg/L	122	69.0	133
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.25 µg/L	116	72.0	134
EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	0.25 µg/L	109	65.0	144
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	0.625 µg/L	112	71.0	132

EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5729186)

Sub-Matrix: WATER				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%)	Acceptable Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result		LCS	Low	High
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5729186) - continued								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	1.25 µg/L	114	73.0	129
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.25 µg/L	111	72.0	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.25 µg/L	105	72.0	129
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.25 µg/L	105	72.0	130
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.25 µg/L	104	71.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	0.25 µg/L	115	69.0	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	0.25 µg/L	112	71.0	129
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	0.25 µg/L	119	69.0	133
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.25 µg/L	122	72.0	134
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	0.25 µg/L	129	65.0	144
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	0.625 µg/L	111	71.0	132
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5729180)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	0.25 µg/L	110	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	0.625 µg/L	122	68.0	141
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	0.625 µg/L	106	62.6	147
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	0.625 µg/L	115	66.0	145
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	0.625 µg/L	106	57.6	145
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	0.25 µg/L	117	65.0	136
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	0.25 µg/L	115	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5729186)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	0.25 µg/L	111	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	0.625 µg/L	126	68.0	141
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	0.625 µg/L	112	62.6	147
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	0.625 µg/L	100	66.0	145
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	0.625 µg/L	115	57.6	145
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	0.25 µg/L	112	65.0	136
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	0.25 µg/L	100	61.0	135
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5729180)								

Method Blank (MB) Report

Spike

Spike Recovery (%)

Acceptable Limits (%)

Matrix Spike (MS) Report

Sub-Matrix: **SOIL**

Matrix Spike (MS) Report

Spike

	<i>SpikeRecovery</i> (%)
1	100.0
2	100.0
3	100.0
4	100.0
5	100.0
6	100.0
7	100.0
8	100.0
9	100.0
10	100.0
11	100.0
12	100.0
13	100.0
14	100.0
15	100.0
16	100.0
17	100.0
18	100.0
19	100.0
20	100.0
21	100.0
22	100.0
23	100.0
24	100.0
25	100.0
26	100.0
27	100.0
28	100.0
29	100.0
30	100.0
31	100.0
32	100.0
33	100.0
34	100.0
35	100.0
36	100.0
37	100.0
38	100.0
39	100.0
40	100.0
41	100.0
42	100.0
43	100.0
44	100.0
45	100.0
46	100.0
47	100.0
48	100.0
49	100.0
50	100.0
51	100.0
52	100.0
53	100.0
54	100.0
55	100.0
56	100.0
57	100.0
58	100.0
59	100.0
60	100.0
61	100.0
62	100.0
63	100.0
64	100.0
65	100.0
66	100.0
67	100.0
68	100.0
69	100.0
70	100.0
71	100.0
72	100.0
73	100.0
74	100.0
75	100.0
76	100.0
77	100.0
78	100.0
79	100.0
80	100.0
81	100.0
82	100.0
83	100.0
84	100.0
85	100.0
86	100.0
87	100.0
88	100.0
89	100.0
90	100.0
91	100.0
92	100.0
93	100.0
94	100.0
95	100.0
96	100.0
97	100.0
98	100.0
99	100.0
100	100.0

Acceptable Limits (%)

Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5734265)							
ES2411752-036	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.00125 mg/kg	92.0	72.0	128
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.00125 mg/kg	93.4	73.0	123
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.00125 mg/kg	87.0	67.0	130
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.00125 mg/kg	125	70.0	132
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.00125 mg/kg	98.7	68.0	136
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.00125 mg/kg	110	59.0	134
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5734265)							
ES2411752-036	Anonymous	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.00625 mg/kg	80.6	71.0	135
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.00125 mg/kg	95.8	69.0	132
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.00125 mg/kg	98.5	70.0	132
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.00125 mg/kg	95.4	71.0	131
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.00125 mg/kg	100	69.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.00125 mg/kg	103	72.0	129
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.00125 mg/kg	100	69.0	133
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.00125 mg/kg	111	64.0	136
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.00125 mg/kg	106	69.0	135
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.00125 mg/kg	116	66.0	139
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.00312 mg/kg	99.5	69.0	133		
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5734265)							



Sub-Matrix: SOIL				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5734265) - continued							
ES2411752-036	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.00125 mg/kg	109	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.00312 mg/kg	113	71.6	129
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.00312 mg/kg	99.9	69.8	131
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.00312 mg/kg	89.3	68.7	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.00312 mg/kg	102	65.1	134
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.00125 mg/kg	110	63.0	144
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.00125 mg/kg	102	61.0	139
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5734265)							
ES2411752-036	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.00125 mg/kg	81.4	62.0	145
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.00125 mg/kg	92.0	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.00125 mg/kg	96.2	65.0	137
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.00125 mg/kg	103	69.2	143
Sub-Matrix: WATER				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5729180)							
ES2411964-002	0020_MW012_240408	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.25 µg/L	99.4	72.0	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.25 µg/L	102	71.0	127
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.25 µg/L	# Not Determined	68.0	131
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.25 µg/L	130	69.0	134
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.25 µg/L	# Not Determined	65.0	140
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.25 µg/L	110	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5729186)							
ES2411964-034	0020_SW026_240408	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.25 µg/L	91.2	72.0	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.25 µg/L	112	71.0	127
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.25 µg/L	113	68.0	131
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.25 µg/L	113	69.0	134
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.25 µg/L	81.6	65.0	140
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.25 µg/L	86.0	53.0	142
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5729180)							
ES2411964-002	0020_MW012_240408	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	1.25 µg/L	105	73.0	129



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5729180) - continued							
ES2411964-002	0020_MW012_240408	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.25 µg/L	112	72.0	129
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.25 µg/L	110	72.0	129
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.25 µg/L	94.8	72.0	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.25 µg/L	114	71.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.25 µg/L	112	69.0	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.25 µg/L	110	71.0	129
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.25 µg/L	118	69.0	133
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.25 µg/L	123	72.0	134
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.25 µg/L	104	65.0	144
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.625 µg/L	115	71.0	132
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5729186)							
ES2411964-034	0020_SW026_240408	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	1.25 µg/L	119	73.0	129
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.25 µg/L	112	72.0	129
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.25 µg/L	103	72.0	129
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.25 µg/L	103	72.0	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.25 µg/L	96.9	71.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.25 µg/L	114	69.0	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.25 µg/L	102	71.0	129
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.25 µg/L	105	69.0	133
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.25 µg/L	111	72.0	134
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.25 µg/L	105	65.0	144
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.625 µg/L	102	71.0	132
		EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5729180)					
ES2411964-002	0020_MW012_240408	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.25 µg/L	106	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.625 µg/L	115	68.0	141
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.625 µg/L	96.8	62.6	147
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.625 µg/L	106	66.0	145
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.625 µg/L	105	57.6	145
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.25 µg/L	117	65.0	136
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.25 µg/L	106	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5729186)							
ES2411964-034	0020_SW026_240408	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.25 µg/L	109	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.625 µg/L	115	68.0	141



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5729186) - continued							
ES2411964-034	0020_SW026_240408	EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.625 µg/L	95.2	62.6	147
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.625 µg/L	92.7	66.0	145
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.625 µg/L	110	57.6	145
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.25 µg/L	106	65.0	136
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.25 µg/L	92.9	61.0	135
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5729180)							
ES2411964-002	0020_MW012_240408	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.25 µg/L	83.4	63.0	143
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.25 µg/L	113	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.25 µg/L	106	67.0	138
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.25 µg/L	79.1	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5729186)							
ES2411964-034	0020_SW026_240408	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.25 µg/L	104	63.0	143
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.25 µg/L	106	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.25 µg/L	123	67.0	138
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.25 µg/L	108	71.4	144



QA/QC Compliance Assessment to assist with Quality Review

Work Order	: ES2411964	Page	: 1 of 8
Amendment	: 1		
Client	: AECOM AUSTRALIA PTY LTD	Laboratory	: Environmental Division Sydney
Contact	: [REDACTED]	Telephone	: +61 2 8784 8555
Project	: ACT_0020_PFASOMP_24	Date Samples Received	: 12-Apr-2024
Site	: HMAS Creswell (0020)	Issue Date	: 20-May-2024
Sampler	: [REDACTED] [REDACTED]	No. of samples received	: 49
Order number	: 60612562_4.1	No. of samples analysed	: 49

This report is automatically generated by the ALS LIMS through interpretation of the ALS Quality Control Report and several Quality Assurance parameters measured by ALS. This automated reporting highlights any non-conformances, facilitates faster and more accurate data validation and is designed to assist internal expert and external Auditor review. Many components of this report contribute to the overall DQO assessment and reporting for guideline compliance.

Brief method summaries and references are also provided to assist in traceability.

Summary of Outliers

Outliers : Quality Control Samples

This report highlights outliers flagged in the Quality Control (QC) Report.

- **NO** Method Blank value outliers occur.
- **NO** Duplicate outliers occur.
- **NO** Laboratory Control outliers occur.
- Matrix Spike outliers exist - please see following pages for full details.
- For all regular sample matrices, where applicable to the methodology, **NO** surrogate recovery outliers occur.

Outliers : Analysis Holding Time Compliance

- **NO** Analysis Holding Time Outliers exist.

Outliers : Frequency of Quality Control Samples

- **NO** Quality Control Sample Frequency Outliers exist.



Outliers : Quality Control Samples

Duplicates, Method Blanks, Laboratory Control Samples and Matrix Spikes

Matrix: **WATER**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Matrix Spike (MS) Recoveries							
EP231A: Perfluoroalkyl Sulfonic Acids	ES2411964--002	0020_MW012_240408	Perfluorohexane sulfonic acid (PFHxS)	355-46-4	Not Determined	----	MS recovery not determined, background level greater than or equal to 4x spike level.
EP231A: Perfluoroalkyl Sulfonic Acids	ES2411964--002	0020_MW012_240408	Perfluorooctane sulfonic acid (PFOS)	1763-23-1	Not Determined	----	MS recovery not determined, background level greater than or equal to 4x spike level.

Analysis Holding Time Compliance

If samples are identified below as having been analysed or extracted outside of recommended holding times, this should be taken into consideration when interpreting results.

This report summarizes extraction / preparation and analysis times and compares each with ALS recommended holding times (referencing USEPA SW 846, APHA, AS and NEPM) based on the sample container provided. Dates reported represent first date of extraction or analysis and preclude subsequent dilutions and reruns. A listing of breaches (if any) is provided herein.

Holding time for leachate methods (e.g. TCLP) vary according to the analytes reported. Assessment compares the leach date with the shortest analyte holding time for the equivalent soil method. These are: organics 14 days, mercury 28 days & other metals 180 days. A recorded breach does not guarantee a breach for all non-volatile parameters.

Holding times for VOC in soils vary according to analytes of interest. Vinyl Chloride and Styrene holding time is 7 days; others 14 days. A recorded breach does not guarantee a breach for all VOC analytes and should be verified in case the reported breach is a false positive or Vinyl Chloride and Styrene are not key analytes of interest/concern.

Matrix: **SOIL**

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EA055: Moisture Content (Dried @ 105-110°C)								
HDPE Soil Jar (EA055) 0020_SD001_240408, 0020_SD004_240408, 0020_SD007_240408, 0020_SD019_240408, 0020_SD025_240408, 0020_SD028_240408, 0020_SD033_240408, 0020_QC103_240408	0020_SD002_240408, 0020_SD006_240408, 0020_SD018_240408, 0020_SD024_240408, 0020_SD026_240408, 0020_SD032_240408, 0020_QC102_240408,	08-Apr-2024	----	----	----	18-Apr-2024	22-Apr-2024	✓
EP231A: Perfluoroalkyl Sulfonic Acids								
HDPE Soil Jar (EP231X) 0020_SD001_240408, 0020_SD004_240408, 0020_SD007_240408, 0020_SD019_240408, 0020_SD025_240408, 0020_SD028_240408, 0020_SD033_240408, 0020_QC103_240408	0020_SD002_240408, 0020_SD006_240408, 0020_SD018_240408, 0020_SD024_240408, 0020_SD026_240408, 0020_SD032_240408, 0020_QC102_240408,	08-Apr-2024	19-Apr-2024	05-Oct-2024	✓	22-Apr-2024	29-May-2024	✓



Matrix: **SOIL**

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231B: Perfluoroalkyl Carboxylic Acids								
HDPE Soil Jar (EP231X) 0020_SD001_240408, 0020_SD004_240408, 0020_SD007_240408, 0020_SD019_240408, 0020_SD025_240408, 0020_SD028_240408, 0020_SD033_240408, 0020_QC103_240408	0020_SD002_240408, 0020_SD006_240408, 0020_SD018_240408, 0020_SD024_240408, 0020_SD026_240408, 0020_SD032_240408, 0020_QC102_240408,	08-Apr-2024	19-Apr-2024	05-Oct-2024	✔	22-Apr-2024	29-May-2024	✔
EP231C: Perfluoroalkyl Sulfonamides								
HDPE Soil Jar (EP231X) 0020_SD001_240408, 0020_SD004_240408, 0020_SD007_240408, 0020_SD019_240408, 0020_SD025_240408, 0020_SD028_240408, 0020_SD033_240408, 0020_QC103_240408	0020_SD002_240408, 0020_SD006_240408, 0020_SD018_240408, 0020_SD024_240408, 0020_SD026_240408, 0020_SD032_240408, 0020_QC102_240408,	08-Apr-2024	19-Apr-2024	05-Oct-2024	✔	22-Apr-2024	29-May-2024	✔
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
HDPE Soil Jar (EP231X) 0020_SD001_240408, 0020_SD004_240408, 0020_SD007_240408, 0020_SD019_240408, 0020_SD025_240408, 0020_SD028_240408, 0020_SD033_240408, 0020_QC103_240408	0020_SD002_240408, 0020_SD006_240408, 0020_SD018_240408, 0020_SD024_240408, 0020_SD026_240408, 0020_SD032_240408, 0020_QC102_240408,	08-Apr-2024	19-Apr-2024	05-Oct-2024	✔	22-Apr-2024	29-May-2024	✔
EP231P: PFAS Sums								
HDPE Soil Jar (EP231X) 0020_SD001_240408, 0020_SD004_240408, 0020_SD007_240408, 0020_SD019_240408, 0020_SD025_240408, 0020_SD028_240408, 0020_SD033_240408, 0020_QC103_240408	0020_SD002_240408, 0020_SD006_240408, 0020_SD018_240408, 0020_SD024_240408, 0020_SD026_240408, 0020_SD032_240408, 0020_QC102_240408,	08-Apr-2024	19-Apr-2024	05-Oct-2024	✔	22-Apr-2024	29-May-2024	✔

Matrix: **WATER**

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231A: Perfluoroalkyl Sulfonic Acids								
HDPE (no PTFE) (EP231X) 0020_MW007_240408, 0020_MW017_240408, 0020_MW102D_240408, 0020_MW109_240408, 0020_MW111_240408, 0020_MW115_240408, 0020_SW005_240408, 0020_SW011_240408, 0020_SW016_240408, 0020_SW022_240408	0020_MW012_240408, 0020_MW037_240408, 0020_MW105_240408, 0020_MW110_240408, 0020_MW112_240408, 0020_SW004_240408, 0020_SW010_240408, 0020_SW012_240408, 0020_SW018_240408,	08-Apr-2024	17-Apr-2024	05-Oct-2024	✓	22-Apr-2024	05-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0020_SW023_240408, 0020_SW027_240408, 0020_SW030_240408, 0020_SW033_240408, 0020_SW036_240408, 0020_QC300_240408, 0020_QC101_240408, 0020_QC400_240408	0020_SW026_240408, 0020_SW029_240408, 0020_SW032_240408, 0020_SW035_240408, 0020_SW037_240408, 0020_QC100_240408, 0020_QC104_240408,	08-Apr-2024	19-Apr-2024	05-Oct-2024	✓	22-Apr-2024	05-Oct-2024	✓
EP231B: Perfluoroalkyl Carboxylic Acids								
HDPE (no PTFE) (EP231X) 0020_MW007_240408, 0020_MW017_240408, 0020_MW102D_240408, 0020_MW109_240408, 0020_MW111_240408, 0020_MW115_240408, 0020_SW005_240408, 0020_SW011_240408, 0020_SW016_240408, 0020_SW022_240408	0020_MW012_240408, 0020_MW037_240408, 0020_MW105_240408, 0020_MW110_240408, 0020_MW112_240408, 0020_SW004_240408, 0020_SW010_240408, 0020_SW012_240408, 0020_SW018_240408,	08-Apr-2024	17-Apr-2024	05-Oct-2024	✓	22-Apr-2024	05-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0020_SW023_240408, 0020_SW027_240408, 0020_SW030_240408, 0020_SW033_240408, 0020_SW036_240408, 0020_QC300_240408, 0020_QC101_240408, 0020_QC400_240408	0020_SW026_240408, 0020_SW029_240408, 0020_SW032_240408, 0020_SW035_240408, 0020_SW037_240408, 0020_QC100_240408, 0020_QC104_240408,	08-Apr-2024	19-Apr-2024	05-Oct-2024	✓	22-Apr-2024	05-Oct-2024	✓

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231C: Perfluoroalkyl Sulfonamides								
HDPE (no PTFE) (EP231X) 0020_MW007_240408, 0020_MW017_240408, 0020_MW102D_240408, 0020_MW109_240408, 0020_MW111_240408, 0020_MW115_240408, 0020_SW005_240408, 0020_SW011_240408, 0020_SW016_240408, 0020_SW022_240408	0020_MW012_240408, 0020_MW037_240408, 0020_MW105_240408, 0020_MW110_240408, 0020_MW112_240408, 0020_SW004_240408, 0020_SW010_240408, 0020_SW012_240408, 0020_SW018_240408	08-Apr-2024	17-Apr-2024	05-Oct-2024	✓	22-Apr-2024	05-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0020_SW023_240408, 0020_SW027_240408, 0020_SW030_240408, 0020_SW033_240408, 0020_SW036_240408, 0020_QC300_240408, 0020_QC101_240408, 0020_QC400_240408	0020_SW026_240408, 0020_SW029_240408, 0020_SW032_240408, 0020_SW035_240408, 0020_SW037_240408, 0020_QC100_240408, 0020_QC104_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✓	22-Apr-2024	05-Oct-2024	✓
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
HDPE (no PTFE) (EP231X) 0020_MW007_240408, 0020_MW017_240408, 0020_MW102D_240408, 0020_MW109_240408, 0020_MW111_240408, 0020_MW115_240408, 0020_SW005_240408, 0020_SW011_240408, 0020_SW016_240408, 0020_SW022_240408	0020_MW012_240408, 0020_MW037_240408, 0020_MW105_240408, 0020_MW110_240408, 0020_MW112_240408, 0020_SW004_240408, 0020_SW010_240408, 0020_SW012_240408, 0020_SW018_240408	08-Apr-2024	17-Apr-2024	05-Oct-2024	✓	22-Apr-2024	05-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0020_SW023_240408, 0020_SW027_240408, 0020_SW030_240408, 0020_SW033_240408, 0020_SW036_240408, 0020_QC300_240408, 0020_QC101_240408, 0020_QC400_240408	0020_SW026_240408, 0020_SW029_240408, 0020_SW032_240408, 0020_SW035_240408, 0020_SW037_240408, 0020_QC100_240408, 0020_QC104_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✓	22-Apr-2024	05-Oct-2024	✓

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231P: PFAS Sums								
HDPE (no PTFE) (EP231X) 0020_MW007_240408, 0020_MW017_240408, 0020_MW102D_240408, 0020_MW109_240408, 0020_MW111_240408, 0020_MW115_240408, 0020_SW005_240408, 0020_SW011_240408, 0020_SW016_240408, 0020_SW022_240408	0020_MW012_240408, 0020_MW037_240408, 0020_MW105_240408, 0020_MW110_240408, 0020_MW112_240408, 0020_SW004_240408, 0020_SW010_240408, 0020_SW012_240408, 0020_SW018_240408,	08-Apr-2024	17-Apr-2024	05-Oct-2024	✓	22-Apr-2024	05-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0020_SW023_240408, 0020_SW027_240408, 0020_SW030_240408, 0020_SW033_240408, 0020_SW036_240408, 0020_QC300_240408, 0020_QC101_240408, 0020_QC400_240408	0020_SW026_240408, 0020_SW029_240408, 0020_SW032_240408, 0020_SW035_240408, 0020_SW037_240408, 0020_QC100_240408, 0020_QC104_240408,	08-Apr-2024	19-Apr-2024	05-Oct-2024	✓	22-Apr-2024	05-Oct-2024	✓



Quality Control Parameter Frequency Compliance

The following report summarises the frequency of laboratory QC samples analysed within the analytical lot(s) in which the submitted sample(s) was(were) processed. Actual rate should be greater than or equal to the expected rate. A listing of breaches is provided in the Summary of Outliers.

Matrix: **SOIL**

Evaluation: ✖ = Quality Control frequency not within specification ; ✔ = Quality Control frequency within specification.

Quality Control Sample Type	Method	Count		Rate (%)			Quality Control Specification
Analytical Methods		QC	Regular	Actual	Expected	Evaluation	
Laboratory Duplicates (DUP)							
Moisture Content	EA055	2	20	10.00	10.00	✔	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	2	20	10.00	10.00	✔	NEPM 2013 B3 & ALS QC Standard
Laboratory Control Samples (LCS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	20	5.00	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Method Blanks (MB)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	20	5.00	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	20	5.00	5.00	✔	NEPM 2013 B3 & ALS QC Standard

Matrix: **WATER**

Evaluation: ✖ = Quality Control frequency not within specification ; ✔ = Quality Control frequency within specification.

Quality Control Sample Type	Method	Count		Rate (%)			Quality Control Specification
Analytical Methods		QC	Regular	Actual	Expected	Evaluation	
Laboratory Duplicates (DUP)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	4	38	10.53	10.00	✔	NEPM 2013 B3 & ALS QC Standard
Laboratory Control Samples (LCS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	2	38	5.26	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Method Blanks (MB)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	2	38	5.26	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	2	38	5.26	5.00	✔	NEPM 2013 B3 & ALS QC Standard



Brief Method Summaries

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the US EPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request. The following report provides brief descriptions of the analytical procedures employed for results reported in the Certificate of Analysis. Sources from which ALS methods have been developed are provided within the Method Descriptions.

Analytical Methods	Method	Matrix	Method Descriptions
Moisture Content	EA055	SOIL	In house: A gravimetric procedure based on weight loss over a 12 hour drying period at 105-110 degrees C. This method is compliant with NEPM Schedule B(3).
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	SOIL	In-house: Analysis of soils by solvent extraction followed by LC-Electrospray-MS-MS, Negative Mode using MRM using internal standard quantitation. Isotopically labelled analogues of target analytes used as internal standards and surrogates are added to a portion of soil which is then extracted with MTBE and an ion pairing reagent. A portion of extract is exchanged into the analytical solvent mixture, combined with an equal volume reagent water and filtered for analysis. Method procedures and data quality objectives conform to US DoD QSM 5.4, table B-15 requirements.
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	WATER	In-house: Analysis of fresh and saline waters by Solid Phase Extraction (SPE) followed by LC-Electrospray-MS-MS, Negative Mode using MRM and internal standard quantitation. Isotopically labelled analogues of target analytes used as internal standards and surrogates are added to the sample container. The entire contents are transferred to a solid phase extraction (SPE) cartridge. The sample container is successively rinsed with aliquots of the elution solvent. The eluted extract is combined with an equal volume of reagent water and a portion is filtered for analysis. Method procedures and data quality objectives conform to US DoD QSM 5.4, table B-15 requirements.
Preparation Methods	Method	Matrix	Method Descriptions
QuEChERS Extraction of Solids	ORG71	SOIL	In house: Sequential extractions with Acetonitrile/Methanol by shaking. Extraction efficiency aided by the addition of salts under acidic conditions. Where relevant, interferences from co-extracted organics are removed with dispersive clean-up media (dSPE). The extract is either diluted or concentrated and exchanged into the analytical solvent.
Solid Phase Extraction (SPE) for PFAS in water	ORG72	WATER	In-house: Isotopically labelled analogues of target analytes used as internal standards and surrogates are added to the sample container. The entire contents are transferred to a solid phase extraction (SPE) cartridge. The sample container is successively rinsed with aliquots of the elution solvent. The eluted extract is combined with an equal volume of reagent water and a portion is filtered for analysis. Method procedures conform to US DoD QSM 5.3, table B-15 requirements.



SAMPLE RECEIPT NOTIFICATION (SRN)

Work Order : ES2411964

Amendment : 1

Client : AECOM AUSTRALIA PTY LTD
Contact : [REDACTED]
Address : LEVEL 2 60 MARCUS CLARKE ST
CANBERRA ACT, AUSTRALIA 2600

E-mail : [REDACTED]
Telephone : ----
Facsimile : ----

Project : ACT_0020_PFASOMP_24
Order number : 60612562_4.1

C-O-C number : 65532
Site : HMAS Creswell (0020)
Sampler : [REDACTED]

Laboratory : Environmental Division Sydney
Contact : [REDACTED]
Address : 277-289 Woodpark Road Smithfield
NSW Australia 2164

E-mail : [REDACTED]@ALSGlobal.com
Telephone : +61 2 8784 8555
Facsimile : +61-2-8784 8500

Page : 1 of 4
Quote number : ES2021AECOMAU0026 (SY/139/19 v4
60612562_4.1)
QC Level : NEPM 2013 B3 & ALS QC Standard

Dates

Date Samples Received : 12-Apr-2024 17:48
Client Requested Due Date : 22-Apr-2024

Issue Date : 20-May-2024
Scheduled Reporting Date : **22-Apr-2024**

Delivery Details

Mode of Delivery : Carrier
No. of coolers/boxes : 8

Security Seal : Not Available
Temperature : 4.5°C 3.8°C 3.5°C - Ice
present

Receipt Detail : No. of samples received / analysed : 49 / 49

General Comments

- This report contains the following information:
 - Sample Container(s)/Preservation Non-Compliances
 - Summary of Sample(s) and Requested Analysis
 - Proactive Holding Time Report
 - Requested Deliverables
- **Please refer to the Proactive Holding Time Report table below which summarises breaches of recommended holding times that have occurred prior to samples/instructions being received at the laboratory. The laboratory will process these samples unless instructions are received from you indicating you do not wish to proceed. The absence of this summary table indicates that all samples have been received within the recommended holding times for the analysis requested.**
- Please direct any queries you have regarding this work order to the above ALS laboratory contact.
- Analytical work for this work order will be conducted at ALS Sydney.
- Sample Disposal - Aqueous (3 weeks), Solid (2 months ± 1 week) from receipt of samples.
- Please be aware that APHA/NEPM recommends water and soil samples be chilled to less than or equal to 6°C for chemical analysis, and less than or equal to 10°C but unfrozen for Microbiological analysis. Where samples are received above this temperature, it should be taken into consideration when interpreting results. Refer to ALS EnviroMail 85 for ALS recommendations of the best practice for chilling samples after sampling and for maintaining a cool temperature during transit.



Sample Container(s)/Preservation Non-Compliances

All comparisons are made against pretreatment/preservation AS, APHA, USEPA standards.

- No sample container / preservation non-compliance exists.

Summary of Sample(s) and Requested Analysis

Some items described below may be part of a laboratory process necessary for the execution of client requested tasks. Packages may contain additional analyses, such as the determination of moisture content and preparation tasks, that are included in the package.

If no sampling time is provided, the sampling time will default 00:00 on the date of sampling. If no sampling date is provided, the sampling date will be assumed by the laboratory and displayed in brackets without a time component

Matrix: **SOIL**

Laboratory sample ID	Sampling date / time	Sample ID	SOIL - EA055-103 Moisture Content	SOIL - EP231X (solids) PFAS - Full Suite (30 analytes)
ES2411964-012	08-Apr-2024 11:50	0020_SD001_240408	✓	✓
ES2411964-013	08-Apr-2024 11:37	0020_SD002_240408	✓	✓
ES2411964-014	08-Apr-2024 10:45	0020_SD004_240408	✓	✓
ES2411964-015	08-Apr-2024 08:50	0020_SD006_240408	✓	✓
ES2411964-016	08-Apr-2024 12:04	0020_SD007_240408	✓	✓
ES2411964-017	08-Apr-2024 10:42	0020_SD018_240408	✓	✓
ES2411964-018	08-Apr-2024 10:32	0020_SD019_240408	✓	✓
ES2411964-019	08-Apr-2024 09:33	0020_SD024_240408	✓	✓
ES2411964-020	08-Apr-2024 13:46	0020_SD025_240408	✓	✓
ES2411964-021	08-Apr-2024 13:09	0020_SD026_240408	✓	✓
ES2411964-022	08-Apr-2024 13:19	0020_SD028_240408	✓	✓
ES2411964-023	08-Apr-2024 11:10	0020_SD032_240408	✓	✓
ES2411964-024	08-Apr-2024 11:47	0020_SD033_240408	✓	✓
ES2411964-046	08-Apr-2024 13:10	0020_QC102_240408	✓	✓
ES2411964-047	08-Apr-2024 10:32	0020_QC103_240408	✓	✓

Matrix: **WATER**

Laboratory sample ID	Sampling date / time	Sample ID	WATER - EP231X PFAS - Full Suite (30 analytes)
ES2411964-001	08-Apr-2024 10:03	0020_MW007_240408	✓
ES2411964-002	08-Apr-2024 10:01	0020_MW012_240408	✓
ES2411964-003	08-Apr-2024 10:31	0020_MW017_240408	✓
ES2411964-004	08-Apr-2024 11:23	0020_MW037_240408	✓
ES2411964-005	08-Apr-2024 08:23	0020_MW102D_240408	✓
ES2411964-006	08-Apr-2024 08:43	0020_MW105_240408	✓
ES2411964-007	08-Apr-2024 11:05	0020_MW109_240408	✓
ES2411964-008	08-Apr-2024 13:06	0020_MW110_240408	✓



				WATER - EP231X PFAS - Full Suite (30 analytes)
ES2411964-009	08-Apr-2024 11:44	0020_MW111_240408	✓	
ES2411964-010	08-Apr-2024 11:05	0020_MW112_240408	✓	
ES2411964-011	08-Apr-2024 11:30	0020_MW115_240408	✓	
ES2411964-025	08-Apr-2024 10:47	0020_SW004_240408	✓	
ES2411964-026	08-Apr-2024 10:28	0020_SW005_240408	✓	
ES2411964-027	08-Apr-2024 09:34	0020_SW010_240408	✓	
ES2411964-028	08-Apr-2024 13:45	0020_SW011_240408	✓	
ES2411964-029	08-Apr-2024 13:13	0020_SW012_240408	✓	
ES2411964-030	08-Apr-2024 13:39	0020_SW016_240408	✓	
ES2411964-031	08-Apr-2024 13:21	0020_SW018_240408	✓	
ES2411964-032	08-Apr-2024 11:11	0020_SW022_240408	✓	
ES2411964-033	08-Apr-2024 11:45	0020_SW023_240408	✓	
ES2411964-034	08-Apr-2024 11:51	0020_SW026_240408	✓	
ES2411964-035	08-Apr-2024 11:38	0020_SW027_240408	✓	
ES2411964-036	08-Apr-2024 10:46	0020_SW029_240408	✓	
ES2411964-037	08-Apr-2024 08:39	0020_SW030_240408	✓	
ES2411964-038	08-Apr-2024 08:52	0020_SW032_240408	✓	
ES2411964-039	08-Apr-2024 12:03	0020_SW033_240408	✓	
ES2411964-040	08-Apr-2024 09:37	0020_SW035_240408	✓	
ES2411964-041	08-Apr-2024 09:48	0020_SW036_240408	✓	
ES2411964-042	08-Apr-2024 09:55	0020_SW037_240408	✓	
ES2411964-043	08-Apr-2024 16:16	0020_QC300_240408	✓	
ES2411964-044	08-Apr-2024 11:06	0020_QC100_240408	✓	
ES2411964-045	08-Apr-2024 10:02	0020_QC101_240408	✓	
ES2411964-048	08-Apr-2024 13:12	0020_QC104_240408	✓	
ES2411964-049	08-Apr-2024 16:18	0020_QC400_240408	✓	

Proactive Holding Time Report

Sample(s) have been received within the recommended holding times for the requested analysis.



Requested Deliverables

ACCOUNTS PAYABLE

- A4 - AU Tax Invoice (INV)

Email AP_CustomerService.ANZ@aecom.com



- Chain of Custody (CoC) (COC)

Email [Redacted]

DERP ESDAT REPORTS

- EDI Format - ESDAT (ESDAT)

Email derp.labreports@esdat.com.au



- *AU Certificate of Analysis - NATA (COA)
- *AU Interpretive QC Report - DEFAULT (Anon QCI Rep) (QCI)
- *AU QC Report - DEFAULT (Anon QC Rep) - NATA (QC)
- A4 - AU Sample Receipt Notification - Environmental HT (SRN)
- A4 - AU Tax Invoice (INV)
- Chain of Custody (CoC) (COC)
- EDI Format - ESDAT (ESDAT)

Email [Redacted]
Email [Redacted]
Email [Redacted]
Email [Redacted]
Email [Redacted]
Email [Redacted]
Email [Redacted]



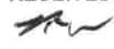
- *AU Certificate of Analysis - NATA (COA)
- *AU Interpretive QC Report - DEFAULT (Anon QCI Rep) (QCI)
- *AU QC Report - DEFAULT (Anon QC Rep) - NATA (QC)
- A4 - AU Sample Receipt Notification - Environmental HT (SRN)
- Chain of Custody (CoC) (COC)
- EDI Format - EQUIS V5 AECOM (EQUIS_V5_AECOM)
- EDI Format - ESDAT (ESDAT)

Email [Redacted]
Email [Redacted]
Email [Redacted]
Email [Redacted]
Email [Redacted]
Email [Redacted]
Email [Redacted]

CHAIN OF CUSTODY
ALS COC#: 65532 ALS Laboratory: ES Sydney Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:
15/4/24 1400

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd
PROJECT: ACT_0020_PFA\SOMP_24
SITE: HMAS Creswell (0020)
ORDER NO:
PROJECT MANAGER:
PRIMARY SAMPLER:
EMAIL REPORTS TO:
EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

CONTACT PH: SAMPLER MOBILE:
QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU0026

LABORATORY USE ONLY (Circle)

Custody Seal intact? Yes No N/A
Free ice / frozen ice bricks present upon receipt? Yes No N/A
Random Sample Temperature on Receipt: °C
Other comments:

SAMPLE DETAILS							ANALYSIS REQUIRED			
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
001	0020_MW007_240408		08/04/2024 10:03 AM	WATER	ALS: 4 Non ALS: 0	No		X		
002	0020_MW012_240408		08/04/2024 10:01 AM	WATER	ALS: 4 Non ALS: 0	No		X		
003	0020_MW017_240408		08/04/2024 10:31 AM	WATER	ALS: 4 Non ALS: 0	No		X		
004	0020_MW037_240408		08/04/2024 11:23 AM	WATER	ALS: 4 Non ALS: 0	No		X		
005	0020_MW102D_240408		08/04/2024 08:23 AM	WATER	ALS: 4 Non ALS: 0	No		X		
006	0020_MW105_240408		08/04/2024 08:43 AM	WATER	ALS: 4 Non ALS: 0	No		X		
007	0020_MW109_240408		08/04/2024 11:05 AM	WATER	ALS: 4 Non ALS: 0	No		X		

Environmental Division
Sydney
Work Order Reference
ES2411964



Telephone : + 61-2-8784 8555

 CHAIN OF CUSTODY COC#: 65532 ALS Laboratory: ES Sydney Environmental							RELINQUISHED BY:		RECEIVED BY:		RELINQUISHED BY:		RECEIVED BY:	
							DATE TIME:		DATE TIME:		DATE TIME:		DATE TIME:	
CLIENT: AECOMAU - AECOM Australia Pty Ltd							TURNAROUND REQUIREMENTS : 5 Days				LABORATORY USE ONLY (Circle)			
PROJECT: ACT_0020_PFASOMP_24														
SITE: HMAS Creswell (0020)							Biohazard info:				Custody Seal intact? Yes No N/A			
ORDER NO:														
PROJECT MANAGER: [REDACTED]							CONTACT PH: SAMPLER MOBILE: [REDACTED]				Free ice / frozen ice bricks present upon receipt? Yes No N/A			
PRIMARY SAMPLER: [REDACTED]														
EMAIL REPORTS TO:							QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU0026				Random Sample Temperature on Receipt: °C			
EMAIL INVOICES TO:														
Other comments:														
SAMPLE DETAILS							ANALYSIS REQUIRED							
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION				
008	0020_MW110_240408		08/04/2024 01:06 PM	WATER	ALS: 4 Non ALS: 0	No		X						
009	0020_MW111_240408		08/04/2024 11:44 AM	WATER	ALS: 4 Non ALS: 0	No		X						
010	0020_MW112_240408		08/04/2024 11:05 AM	WATER	ALS: 4 Non ALS: 0	No		X						
011	0020_MW115_240408		08/04/2024 11:30 AM	WATER	ALS: 4 Non ALS: 0	No		X						
012	0020_SD001_240408		08/04/2024 11:50 AM	SOIL	ALS: 1 Non ALS: 0	No	X							
013	0020_SD002_240408		08/04/2024 11:37 AM	SOIL	ALS: 1 Non ALS: 0	No	X							
014	0020_SD004_240408		08/04/2024 10:45 AM	SOIL	ALS: 1 Non ALS: 0	No	X							



CHAIN OF CUSTODY

COC#: 65532

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0020_PFASOMP_24

SITE: HMAS Creswell (0020)

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU002
6

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

C

Other comments:

SAMPLE DETAILS

ANALYSIS REQUIRED

SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
015	0020_SD006_240408		08/04/2024 08:50 AM	SOIL	ALS: 1 Non ALS: 0	No	X			
016	0020_SD007_240408		08/04/2024 12:04 PM	SOIL	ALS: 1 Non ALS: 0	No	X			
017	0020_SD018_240408		08/04/2024 10:42 AM	SOIL	ALS: 1 Non ALS: 0	No	X			
018	0020_SD019_240408		08/04/2024 10:32 AM	SOIL	ALS: 1 Non ALS: 0	No	X			
019	0020_SD024_240408		08/04/2024 09:33 AM	SOIL	ALS: 1 Non ALS: 0	No	X			
020	0020_SD025_240408		08/04/2024 01:46 PM	SOIL	ALS: 1 Non ALS: 0	No	X			
021	0020_SD026_240408		08/04/2024 01:09 PM	SOIL	ALS: 1 Non ALS: 0	No	X			



ALS Laboratory: ES Sydney
Environmental

DATE TIME:

DATE TIME:

DATE TIME

DATE TIME:

Other comments:



5 of 12



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:

Other comments:

8:11:01 PM

**CHAIN OF CUSTODY**

COC#: 65532

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0020_PFASOMP_24

SITE: HMAS Creswell (0020)

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS: 5 Days

Biohazard info:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU002
6**LABORATORY USE ONLY (Circle)**

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

°C

Other comments:

SAMPLE DETAILS**ANALYSIS REQUIRED**

SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
043	0020_QC300_240408		08/04/2024 04:16 PM	WATER	ALS: 4 Non ALS: 0	No		X		
044	0020_QC100_240408		08/04/2024 11:06 AM	WATER	ALS: 4 Non ALS: 0	No		X		
045	0020_QC101_240408		08/04/2024 10:02 AM	WATER	ALS: 4 Non ALS: 0	No		X		
046	0020_QC102_240408		08/04/2024 01:51 PM	SOIL	ALS: 1 Non ALS: 0	No	X			
047	0020_QC103_240408		08/04/2024 10:32 AM	SOIL	ALS: 1 Non ALS: 0	No	X			
048	0020_QC104_240408		08/04/2024 01:12 PM	WATER	ALS: 4 Non ALS: 0	No		X		
049	0020_QC400_240408		08/04/2024 04:18 PM	WATER	ALS: 4 Non ALS: 0	No		X		

**CHAIN OF CUSTODY**

COC#: 65532

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0020_PFSOMP_24

SITE: HMAS Creswell (0020)

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

CONTACT PH:

SAMPLER MOBILE

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU002

6

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

C

Other comments:

SAMPLE	SAMPLE NAME	BOTTLE NAME	VOLUME	BARCODE	TYPE	FILTERED	REASON
001	0020_MW007_240408	HDPE (no PTFE)	20 mL	00352312011008	Grey	No	
001	0020_MW007_240408	HDPE (no PTFE)	20 mL	00352312011078	Grey	No	
001	0020_MW007_240408	HDPE (no PTFE)	20 mL	00352312010898	Grey	No	
001	0020_MW007_240408	HDPE (no PTFE)	20 mL	00352312010996	Grey	No	
002	0020_MW012_240408	HDPE (no PTFE)	20 mL	00352312019658	Grey	No	
002	0020_MW012_240408	HDPE (no PTFE)	20 mL	00352312019532	Grey	No	
002	0020_MW012_240408	HDPE (no PTFE)	20 mL	00352312019600	Grey	No	
002	0020_MW012_240408	HDPE (no PTFE)	20 mL	00352312019526	Grey	No	
003	0020_MW017_240408	HDPE (no PTFE)	20 mL	00352312010990	Grey	No	
003	0020_MW017_240408	HDPE (no PTFE)	20 mL	00352312011041	Grey	No	
003	0020_MW017_240408	HDPE (no PTFE)	20 mL	00352312010998	Grey	No	
003	0020_MW017_240408	HDPE (no PTFE)	20 mL	00352312010993	Grey	No	
004	0020_MW037_240408	HDPE (no PTFE)	20 mL	00352312019818	Grey	No	
004	0020_MW037_240408	HDPE (no PTFE)	20 mL	00352312019751	Grey	No	
004	0020_MW037_240408	HDPE (no PTFE)	20 mL	00352312019527	Grey	No	
004	0020_MW037_240408	HDPE (no PTFE)	20 mL	00352312019577	Grey	No	
005	0020_MW102D_240408	HDPE (no PTFE)	20 mL	00352312019758	Grey	No	
005	0020_MW102D_240408	HDPE (no PTFE)	20 mL	00352312019760	Grey	No	
005	0020_MW102D_240408	HDPE (no PTFE)	20 mL	00352312019559	Grey	No	
005	0020_MW102D_240408	HDPE (no PTFE)	20 mL	00352312019710	Grey	No	
006	0020_MW105_240408	HDPE (no PTFE)	20 mL	00352312019787	Grey	No	
006	0020_MW105_240408	HDPE (no PTFE)	20 mL	00352312019668	Grey	No	
006	0020_MW105_240408	HDPE (no PTFE)	20 mL	00352312019589	Grey	No	
006	0020_MW105_240408	HDPE (no PTFE)	20 mL	00352312019628	Grey	No	
007	0020_MW109_240408	HDPE (no PTFE)	20 mL	00352312010942	Grey	No	
007	0020_MW109_240408	HDPE (no PTFE)	20 mL	00352312011071	Grey	No	

**CHAIN OF CUSTODY**

COC#: 65532

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

RECEIVED BY:

RELINQUISHED BY:

RECEIVED BY:

DATE TIME:

DATE TIME:

DATE TIME:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0020_PFASOMP_24

SITE: HMAS Creswell (0020)

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU002
6**LABORATORY USE ONLY (Circle)**

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

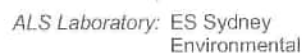
Yes No N/A

Random Sample Temperature on Receipt:

°C

Other comments:

007	0020_MW109_240408	HDPE (no PTFE)	20 mL	00352312010875	Grey	No	
007	0020_MW109_240408	HDPE (no PTFE)	20 mL	00352312011063	Grey	No	
008	0020_MW110_240408	HDPE (no PTFE)	20 mL	00352312019809	Grey	No	
008	0020_MW110_240408	HDPE (no PTFE)	20 mL	00352312019688	Grey	No	
008	0020_MW110_240408	HDPE (no PTFE)	20 mL	00352312019642	Grey	No	
008	0020_MW110_240408	HDPE (no PTFE)	20 mL	00352312019662	Grey	No	
009	0020_MW111_240408	HDPE (no PTFE)	20 mL	00352312019793	Grey	No	
009	0020_MW111_240408	HDPE (no PTFE)	20 mL	00352312019646	Grey	No	
009	0020_MW111_240408	HDPE (no PTFE)	20 mL	00352312019734	Grey	No	
009	0020_MW111_240408	HDPE (no PTFE)	20 mL	00352312019738	Grey	No	
010	0020_MW112_240408	HDPE (no PTFE)	20 mL	00352312019601	Grey	No	
010	0020_MW112_240408	HDPE (no PTFE)	20 mL	00352312019773	Grey	No	
010	0020_MW112_240408	HDPE (no PTFE)	20 mL	00352312019587	Grey	No	
010	0020_MW112_240408	HDPE (no PTFE)	20 mL	00352312019685	Grey	No	
011	0020_MW115_240408	HDPE (no PTFE)	20 mL	00352312019634	Grey	No	
011	0020_MW115_240408	HDPE (no PTFE)	20 mL	00352312019581	Grey	No	
011	0020_MW115_240408	HDPE (no PTFE)	20 mL	00352312019573	Grey	No	
011	0020_MW115_240408	HDPE (no PTFE)	20 mL	00352312019635	Grey	No	
012	0020_SD001_240408	HDPE Soil Jar	200 mL	00621223016453	Grey	No	
013	0020_SD002_240408	HDPE Soil Jar	200 mL	00621223016540	Grey	No	
014	0020_SD004_240408	HDPE Soil Jar	200 mL	00621223016480	Grey	No	
015	0020_SD006_240408	HDPE Soil Jar	200 mL	00621223016409	Grey	No	
016	0020_SD007_240408	HDPE Soil Jar	200 mL	00621223016539	Grey	No	
017	0020_SD018_240408	HDPE Soil Jar	200 mL	00621223016417	Grey	No	
018	0020_SD019_240408	HDPE Soil Jar	200 mL	00621223016405	Grey	No	
019	0020_SD024_240408	HDPE Soil Jar	200 mL	00621223016483	Grey	No	
020	0020_SD025_240408	HDPE Soil Jar	200 mL	00621223016505	Grey	No	



RECEIVED BY:

DATE TIME:

Other comments:

EMAIL INVOICES TO:

10 of 12



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:

Other comments:

11 of 12



CHAIN OF CUSTODY

COC#: 65532

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

RECEIVED BY:

RELINQUISHED BY:

RECEIVED BY:

DATE TIME:

DATE TIME:

DATE TIME:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0020_PFSOMP_24

SITE: HMAS Creswell (0020)

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU002
6

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

C

Other comments:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

037	0020_SW030_240408	HDPE (no PTFE)	20 mL	00352312011012	Grey	No	
037	0020_SW030_240408	HDPE (no PTFE)	20 mL	00352312010888	Grey	No	
038	0020_SW032_240408	HDPE (no PTFE)	20 mL	00352312010857	Grey	No	
038	0020_SW032_240408	HDPE (no PTFE)	20 mL	00352312010959	Grey	No	
038	0020_SW032_240408	HDPE (no PTFE)	20 mL	00352312010976	Grey	No	
038	0020_SW032_240408	HDPE (no PTFE)	20 mL	00352312010858	Grey	No	
039	0020_SW033_240408	HDPE (no PTFE)	20 mL	00352312010907	Grey	No	
039	0020_SW033_240408	HDPE (no PTFE)	20 mL	00352312011038	Grey	No	
039	0020_SW033_240408	HDPE (no PTFE)	20 mL	00352312010982	Grey	No	
039	0020_SW033_240408	HDPE (no PTFE)	20 mL	00352312011081	Grey	No	
040	0020_SW035_240408	HDPE (no PTFE)	20 mL	00352312019661	Grey	No	
040	0020_SW035_240408	HDPE (no PTFE)	20 mL	00352312019788	Grey	No	
040	0020_SW035_240408	HDPE (no PTFE)	20 mL	00352312019737	Grey	No	
040	0020_SW035_240408	HDPE (no PTFE)	20 mL	00352312019632	Grey	No	
041	0020_SW036_240408	HDPE (no PTFE)	20 mL	00352312019605	Grey	No	
041	0020_SW036_240408	HDPE (no PTFE)	20 mL	00352312019727	Grey	No	
041	0020_SW036_240408	HDPE (no PTFE)	20 mL	00352312019687	Grey	No	
041	0020_SW036_240408	HDPE (no PTFE)	20 mL	00352312019730	Grey	No	
042	0020_SW037_240408	HDPE (no PTFE)	20 mL	00352312019630	Grey	No	
042	0020_SW037_240408	HDPE (no PTFE)	20 mL	00352312019672	Grey	No	
042	0020_SW037_240408	HDPE (no PTFE)	20 mL	00352312019747	Grey	No	
042	0020_SW037_240408	HDPE (no PTFE)	20 mL	00352312019753	Grey	No	
043	0020_QC300_240408	HDPE (no PTFE)	20 mL	00352312010961	Grey	No	
043	0020_QC300_240408	HDPE (no PTFE)	20 mL	00352312011075	Grey	No	
043	0020_QC300_240408	HDPE (no PTFE)	20 mL	00352312010954	Grey	No	
043	0020_QC300_240408	HDPE (no PTFE)	20 mL	00352312011111	Grey	No	
044	0020_QC100_240408	HDPE (no PTFE)	20 mL	00352312010951	Grey	No	

 CHAIN OF CUSTODY COC#: 65532 ALS Laboratory: ES Sydney Environmental		RELINQUISHED BY: DATE TIME:		RECEIVED BY: DATE TIME:		RELINQUISHED BY: DATE TIME:		RECEIVED BY: DATE TIME:	
CLIENT: AECOMAU - AECOM Australia Pty Ltd		TURNAROUND REQUIREMENTS : 5 Days Biohazard info:		LABORATORY USE ONLY (Circle) Custody Seal intact? Yes No N/A Free ice / frozen ice bricks present upon receipt? Yes No N/A Random Sample Temperature on Receipt: °C Other comments:					
PROJECT: ACT_0020_PFSOMP_24									
SITE: HMAS Creswell (0020)									
ORDER NO:									
PROJECT MANAGER: [REDACTED]		CONTACT PH:		SAMPLER MOBILE: [REDACTED]					
PRIMARY SAMPLER: [REDACTED]		QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU002		6					
EMAIL REPORTS TO:									
EMAIL INVOICES TO:									
044	0020_QC100_240408	HDPE (no PTFE)	20 mL	00352312010838	Grey	No			
044	0020_QC100_240408	HDPE (no PTFE)	20 mL	00352312011035	Grey	No			
044	0020_QC100_240408	HDPE (no PTFE)	20 mL	00352312010966	Grey	No			
045	0020_QC101_240408	HDPE (no PTFE)	20 mL	00352312019702	Grey	No			
045	0020_QC101_240408	HDPE (no PTFE)	20 mL	00352312019547	Grey	No			
045	0020_QC101_240408	HDPE (no PTFE)	20 mL	00352312019733	Grey	No			
045	0020_QC101_240408	HDPE (no PTFE)	20 mL	00352312019723	Grey	No			
046	0020_QC102_240408	HDPE Soil Jar	200 mL	00621223016438	Grey	No			
047	0020_QC103_240408	HDPE Soil Jar	200 mL	00621223016444	Grey	No			
048	0020_QC104_240408	HDPE (no PTFE)	20 mL	00352312010918	Grey	No			
048	0020_QC104_240408	HDPE (no PTFE)	20 mL	00352312011062	Grey	No			
048	0020_QC104_240408	HDPE (no PTFE)	20 mL	00352312010900	Grey	No			
048	0020_QC104_240408	HDPE (no PTFE)	20 mL	00352312011127	Grey	No			
049	0020_QC400_240408	HDPE (no PTFE)	20 mL	00352312011088	Grey	No			
049	0020_QC400_240408	HDPE (no PTFE)	20 mL	00352312011011	Grey	No			
049	0020_QC400_240408	HDPE (no PTFE)	20 mL	00352312011126	Grey	No			
049	0020_QC400_240408	HDPE (no PTFE)	20 mL	00352312010839	Grey	No			
Total Bottle Count: ALS: 151, Non ALS: 0									



CERTIFICATE OF ANALYSIS

Work Order : **ES2411994**

Amendment : **2**

Client : **AECOM AUSTRALIA PTY LTD**

Contact : [REDACTED]

Address : LEVEL 2 60 MARCUS CLARKE ST
CANBERRA ACT, AUSTRALIA 2600

Telephone : ----

Project : ACT_0021_PFASOMP_24

Order number : 60612562_4.1

C-O-C number : 65535

Sampler : [REDACTED] [REDACTED]

Site : 0021_PFAS

Quote number : SY/139/19 v4 60612562_4.1

No. of samples received : 59

No. of samples analysed : 59

Page : 1 of 35

Laboratory : Environmental Division Sydney

Contact : [REDACTED]

Address : 277-289 Woodpark Road Smithfield NSW Australia 2164

Telephone : +61 2 8784 8555

Date Samples Received : 12-Apr-2024 17:48

Date Analysis Commenced : 17-Apr-2024

Issue Date : 20-May-2024 17:52



Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted, unless the sampling was conducted by ALS. This document shall not be reproduced, except in full.

This Certificate of Analysis contains the following information:

- General Comments
- Analytical Results
- Surrogate Control Limits

Additional information pertinent to this report will be found in the following separate attachments: Quality Control Report, QA/QC Compliance Assessment to assist with Quality Review and Sample Receipt Notification.

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories

Position

Accreditation Category

[REDACTED]

LCMS Coordinator

Sydney Organics, Smithfield, NSW



General Comments

The analytical procedures used by ALS have been developed from established internationally recognised procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are fully validated and are often at the client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis.

Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

When sampling time information is not provided by the client, sampling dates are shown without a time component. In these instances, the time component has been assumed by the laboratory for processing purposes.

Where a result is required to meet compliance limits the associated uncertainty must be considered. Refer to the ALS Contract for details.

Key : CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.

LOR = Limit of reporting

^ = This result is computed from individual analyte detections at or above the level of reporting

ø = ALS is not NATA accredited for these tests.

~ = Indicates an estimated value.

- EP231X - Per- and Polyfluoroalkyl Substances (PFAS): Samples received in 20mL or 125mL bottles have been tested in accordance with the QSM5.4 compliant, NATA accredited method. 60mL or 250mL bottles have been tested to the legacy QSM 5.1 aligned, NATA accredited method.
- Amendment (02/05/2024): This report has been amended and re-released to allow an update to pertinent comments regarding sample 0021_SD110_240412. All analysis as per the previous report.
- Amendment (20/05/2024): This report has been amended as a result of a request to change sample identification numbers (IDs) for samples 031 & 045. All analysis results are as per the previous report.
- EP231: Stable isotope enriched internal standards are added to samples prior to extraction. Target compounds have a direct analogous internal standard with the exception of PFPeS, PFHpA, PFDS, PFTrDA and 10:2 FTS. These compounds use an internal standard that is chemically related and has a retention time close to that of the target compound. The DQO for internal standard response is 50-150% of that established at initial calibration or as per tables in USEPA 1633 where listed. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. These practices are in line with recommendations in the National Environmental Management Plan for PFAS and also conform to QSM 5.4 (US DoD) requirements.
- EP231: Stable isotope enriched internal standards are added to samples prior to extraction. Target compounds have a direct analogous internal standard with the exception of PFPeS, PFHpA, PFDS, PFTrDA and 10:2 FTS. These compounds use an internal standard that is chemically related and has a retention time close to that of the target compound. The DQO for internal standard response is 50-150% of that established at initial calibration. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. These practices are in line with recommendations in the National Environmental Management Plan for PFAS (Australian HEPA) and also conform to QSM 5.3 (US DoD) requirements.



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW022_240408	0021_MW024_240408	0021_MW025_240412	0021_MW026_240412	0021_MW028_240412
Sampling date / time				08-Apr-2024 14:40	08-Apr-2024 14:25	12-Apr-2024 09:05	12-Apr-2024 08:50	12-Apr-2024 09:45
Compound	CAS Number	LOR	Unit	ES2411994-001	ES2411994-002	ES2411994-003	ES2411994-004	ES2411994-005
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.02	<0.02	<0.02	<0.02	0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.71	<0.01	0.01	0.01	0.24
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.06	<0.02	<0.02	<0.02	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.82	<0.01	<0.01	<0.01	0.20
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.05	<0.02	<0.02	<0.02	0.09
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.04	<0.01	<0.01	<0.01	0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW022_240408	0021_MW024_240408	0021_MW025_240412	0021_MW026_240412	0021_MW028_240412
Sampling date / time				08-Apr-2024 14:40	08-Apr-2024 14:25	12-Apr-2024 09:05	12-Apr-2024 08:50	12-Apr-2024 09:45
Compound	CAS Number	LOR	Unit	ES2411994-001	ES2411994-002	ES2411994-003	ES2411994-004	ES2411994-005
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	1.70	<0.01	0.01	0.01	0.56
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	1.53	<0.01	0.01	0.01	0.44
Sum of PFAS (WA DER List)	----	0.01	µg/L	1.62	<0.01	0.01	0.01	0.54
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	97.4	100	99.5	103	99.9
13C8-PFOA	----	0.02	%	99.4	91.8	97.7	92.5	97.3



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW030_240410	0021_MW061_240411	0021_MW062_240411	0021_MW101_240410	0021_MW102_240410
Sampling date / time				10-Apr-2024 11:10	11-Apr-2024 08:40	11-Apr-2024 09:30	10-Apr-2024 14:15	10-Apr-2024 13:56
Compound	CAS Number	LOR	Unit	ES2411994-006	ES2411994-007	ES2411994-008	ES2411994-009	ES2411994-010
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.08	0.98	<0.02	0.31
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.12	1.14	<0.02	0.32
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	1.75	18.5	0.13	3.19
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.12	1.22	<0.02	0.34
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	5.23	78.4	0.20	5.73
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.11	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.4	<0.1	0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.05	0.63	<0.02	0.16
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.32	4.62	<0.02	0.91
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.05	0.90	<0.02	0.14
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.11	1.37	<0.01	0.25
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.07	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.05	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW030_240410	0021_MW061_240411	0021_MW062_240411	0021_MW101_240410	0021_MW102_240410
Sampling date / time				10-Apr-2024 11:10	11-Apr-2024 08:40	11-Apr-2024 09:30	10-Apr-2024 14:15	10-Apr-2024 13:56
Compound	CAS Number	LOR	Unit	ES2411994-006	ES2411994-007	ES2411994-008	ES2411994-009	ES2411994-010
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	<0.01	7.88	109	0.33	11.6
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	<0.01	6.98	96.9	0.33	8.92
Sum of PFAS (WA DER List)	----	0.01	µg/L	<0.01	7.59	106	0.33	10.8
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	98.5	93.4	104	96.7	100
13C8-PFOA	----	0.02	%	96.2	101	98.4	95.3	96.1



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW103_240411	0021_MW104_240411	0021_MW105_240411	0021_MW106_240410	0021_MW107_240411
Sampling date / time				11-Apr-2024 08:57	11-Apr-2024 09:39	11-Apr-2024 10:11	10-Apr-2024 14:35	11-Apr-2024 09:54
Compound	CAS Number	LOR	Unit	ES2411994-011	ES2411994-012	ES2411994-013	ES2411994-014	ES2411994-015
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.23	<0.02	0.70	0.64	0.17
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.29	<0.02	0.80	1.41	0.23
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	3.39	0.12	6.83	19.8	3.18
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.41	<0.02	0.29	1.34	0.11
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	36.8	0.12	11.0	78.2	2.42
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	0.04	<0.02	0.04	0.19	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	0.1	<0.1	<0.1	0.2	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	0.11	<0.02	0.07	0.45	0.08
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.74	<0.02	0.86	4.37	0.43
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	0.09	<0.02	0.14	0.40	0.06
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.18	<0.01	0.24	0.97	0.10
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	0.03	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW103_240411	0021_MW104_240411	0021_MW105_240411	0021_MW106_240410	0021_MW107_240411
Sampling date / time				11-Apr-2024 08:57	11-Apr-2024 09:39	11-Apr-2024 10:11	10-Apr-2024 14:35	11-Apr-2024 09:54
Compound	CAS Number	LOR	Unit	ES2411994-011	ES2411994-012	ES2411994-013	ES2411994-014	ES2411994-015
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	42.7	0.24	21.3	109	6.87
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	40.2	0.24	17.8	98.0	5.60
Sum of PFAS (WA DER List)	----	0.01	µg/L	41.6	0.24	19.8	105	6.44
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	99.1	103	94.1	101	98.2
13C8-PFOA	----	0.02	%	98.6	94.0	96.4	96.0	96.7



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW108_240411	0021_MW109_240410	0021_MW110_240410	0021_MW111_240410	0021_MW112_240408
Sampling date / time				11-Apr-2024 10:40	10-Apr-2024 13:45	10-Apr-2024 12:35	10-Apr-2024 12:40	08-Apr-2024 14:52
Compound	CAS Number	LOR	Unit	ES2411994-016	ES2411994-017	ES2411994-018	ES2411994-019	ES2411994-020
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.18	0.04	<0.02	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.28	0.05	<0.02	<0.02	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	4.01	0.67	0.21	0.02	<0.01
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.16	0.02	<0.02	<0.02	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	5.87	1.48	0.04	0.02	<0.01
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	0.10	0.04	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.52	0.19	<0.02	<0.02	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	0.08	<0.02	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.15	0.03	<0.01	<0.01	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW108_240411	0021_MW109_240410	0021_MW110_240410	0021_MW111_240410	0021_MW112_240408
Sampling date / time				11-Apr-2024 10:40	10-Apr-2024 13:45	10-Apr-2024 12:35	10-Apr-2024 12:40	08-Apr-2024 14:52
Compound	CAS Number	LOR	Unit	ES2411994-016	ES2411994-017	ES2411994-018	ES2411994-019	ES2411994-020
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	11.4	2.52	0.25	0.04	<0.01
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	9.88	2.15	0.25	0.04	<0.01
Sum of PFAS (WA DER List)	----	0.01	µg/L	10.9	2.45	0.25	0.04	<0.01
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	97.2	103	101	98.6	93.4
13C8-PFOA	----	0.02	%	97.3	97.2	98.9	96.9	98.2



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: GROUNDWATER (Matrix: WATER)				Sample ID	0021_MW113_240410	0021_MW114_240409	0021_MW115_240411	0021_MW117_240412	0021_MW118_240412
Sampling date / time				10-Apr-2024 12:10	09-Apr-2024 13:03	11-Apr-2024 12:17	12-Apr-2024 10:41	12-Apr-2024 10:32	
Compound	CAS Number	LOR	Unit	ES2411994-021	ES2411994-022	ES2411994-023	ES2411994-024	ES2411994-025	
				Result	Result	Result	Result	Result	
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	0.02	
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	<0.01	0.17	0.45	
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.01	<0.01	0.01	0.06	0.26	
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1	
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01	
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW113_240410	0021_MW114_240409	0021_MW115_240411	0021_MW117_240412	0021_MW118_240412
Sampling date / time				10-Apr-2024 12:10	09-Apr-2024 13:03	11-Apr-2024 12:17	12-Apr-2024 10:41	12-Apr-2024 10:32
Compound	CAS Number	LOR	Unit	ES2411994-021	ES2411994-022	ES2411994-023	ES2411994-024	ES2411994-025
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	0.01	<0.01	0.01	0.23	0.73
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.01	<0.01	0.01	0.23	0.71
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.01	<0.01	0.01	0.23	0.71
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	95.0	96.2	91.9	93.9	94.7
13C8-PFOA	----	0.02	%	93.6	96.8	97.1	96.9	100



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW119_240412	0021_MW120_240412	0021_MW121_240410	0021_MW123_240412	0021_MW124_240410
Sampling date / time				12-Apr-2024 10:02	12-Apr-2024 09:55	10-Apr-2024 10:40	12-Apr-2024 09:33	10-Apr-2024 12:03
Compound	CAS Number	LOR	Unit	ES2411994-026	ES2411994-027	ES2411994-028	ES2411994-029	ES2411994-030
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.14	<0.02	0.07	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.16	<0.02	0.18	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.89	0.02	1.17	0.22
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	0.12	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.43	0.02	1.02	0.31
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.05	<0.02	0.05	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.18	<0.02	0.15	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	0.04	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.02	<0.01	0.10	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW119_240412	0021_MW120_240412	0021_MW121_240410	0021_MW123_240412	0021_MW124_240410
Sampling date / time				12-Apr-2024 10:02	12-Apr-2024 09:55	10-Apr-2024 10:40	12-Apr-2024 09:33	10-Apr-2024 12:03
Compound	CAS Number	LOR	Unit	ES2411994-026	ES2411994-027	ES2411994-028	ES2411994-029	ES2411994-030
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	<0.01	1.92	0.04	2.90	0.53
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	<0.01	1.32	0.04	2.19	0.53
Sum of PFAS (WA DER List)	----	0.01	µg/L	<0.01	1.71	0.04	2.60	0.53
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	91.4	94.8	92.5	101	96.8
13C8-PFOA	----	0.02	%	97.4	96.5	98.1	99.2	99.4



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW125_240410	0021_MW126_240410	0021_MW128_240410	0021_MW129_240409	0021_MW130_240409
Sampling date / time				10-Apr-2024 09:34	10-Apr-2024 09:22	10-Apr-2024 10:14	09-Apr-2024 12:43	09-Apr-2024 15:24
Compound	CAS Number	LOR	Unit	ES2411994-031	ES2411994-032	ES2411994-033	ES2411994-034	ES2411994-035
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0005	µg/L	----	----	----	0.0026	<0.0005
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.08	<0.01	<0.01	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	µg/L	----	----	----	0.0066	<0.0002
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.03	<0.01	<0.01	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	----	----
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	----	----



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW125_240410	0021_MW126_240410	0021_MW128_240410	0021_MW129_240409	0021_MW130_240409
Sampling date / time				10-Apr-2024 09:34	10-Apr-2024 09:22	10-Apr-2024 10:14	09-Apr-2024 12:43	09-Apr-2024 15:24
Compound	CAS Number	LOR	Unit	ES2411994-031	ES2411994-032	ES2411994-033	ES2411994-034	ES2411994-035
				Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued								
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	----	----
Perfluorobutanoic acid (PFBA)	375-22-4	0.0020	µg/L	----	----	----	<0.0020	<0.0020
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0005	µg/L	----	----	----	0.0011	<0.0005
Perfluorooctanoic acid (PFOA)	335-67-1	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorononanoic acid (PFNA)	375-95-1	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorodecanoic acid (PFDA)	335-76-2	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	µg/L	----	----	----	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	----	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	----	----



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW125_240410	0021_MW126_240410	0021_MW128_240410	0021_MW129_240409	0021_MW130_240409
Sampling date / time				10-Apr-2024 09:34	10-Apr-2024 09:22	10-Apr-2024 10:14	09-Apr-2024 12:43	09-Apr-2024 15:24
Compound	CAS Number	LOR	Unit	ES2411994-031	ES2411994-032	ES2411994-033	ES2411994-034	ES2411994-035
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0005	µg/L	----	----	----	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.001	µg/L	----	----	----	<0.001	<0.001
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.001	µg/L	----	----	----	<0.001	<0.001
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.001	µg/L	----	----	----	<0.001	<0.001
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.001	µg/L	----	----	----	<0.001	<0.001
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0005	µg/L	----	----	----	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0005	µg/L	----	----	----	<0.0005	<0.0005
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	----	----
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.001	µg/L	----	----	----	<0.001	<0.001



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW125_240410	0021_MW126_240410	0021_MW128_240410	0021_MW129_240409	0021_MW130_240409
Sampling date / time				10-Apr-2024 09:34	10-Apr-2024 09:22	10-Apr-2024 10:14	09-Apr-2024 12:43	09-Apr-2024 15:24
Compound	CAS Number	LOR	Unit	ES2411994-031	ES2411994-032	ES2411994-033	ES2411994-034	ES2411994-035
				Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued								
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.001	µg/L	----	----	----	<0.001	<0.001
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.001	µg/L	----	----	----	<0.001	<0.001
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.001	µg/L	----	----	----	<0.001	<0.001
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	0.11	<0.01	<0.01	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.11	<0.01	<0.01	----	----
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.11	<0.01	<0.01	----	----
^ Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	µg/L	----	----	----	0.0092	<0.0002
^ Sum of PFAS (WA DER List)	----	0.0002	µg/L	----	----	----	0.0103	<0.0002
^ Sum of PFAS	----	0.0002	µg/L	----	----	----	0.0103	<0.0002
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	95.1	100	90.9	----	----
13C8-PFOA	----	0.02	%	97.5	99.0	97.0	----	----
13C4-PFOS	----	0.0005	%	----	----	----	98.1	96.7
13C8-PFOA	----	0.0005	%	----	----	----	93.1	95.0



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW131_240409	0021_MW132_240409	0021_MW133_240409	0021_MW135_240409	0021_MW136_240409
Sampling date / time				09-Apr-2024 10:51	09-Apr-2024 14:50	09-Apr-2024 11:40	09-Apr-2024 08:53	09-Apr-2024 09:11
Compound	CAS Number	LOR	Unit	ES2411994-036	ES2411994-037	ES2411994-038	ES2411994-039	ES2411994-040
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.12	<0.01	<0.01	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	µg/L	----	----	----	0.0056	<0.0002
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.07	<0.01	<0.01	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	----	----
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	----	----



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW131_240409	0021_MW132_240409	0021_MW133_240409	0021_MW135_240409	0021_MW136_240409
Sampling date / time				09-Apr-2024 10:51	09-Apr-2024 14:50	09-Apr-2024 11:40	09-Apr-2024 08:53	09-Apr-2024 09:11
Compound	CAS Number	LOR	Unit	ES2411994-036	ES2411994-037	ES2411994-038	ES2411994-039	ES2411994-040
				Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued								
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	----	----
Perfluorobutanoic acid (PFBA)	375-22-4	0.0020	µg/L	----	----	----	<0.0020	<0.0020
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorooctanoic acid (PFOA)	335-67-1	0.0005	µg/L	----	----	----	0.0020	<0.0005
Perfluorononanoic acid (PFNA)	375-95-1	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorodecanoic acid (PFDA)	335-76-2	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0005	µg/L	----	----	----	<0.0005	<0.0005
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	µg/L	----	----	----	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	----	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	----	----



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW131_240409	0021_MW132_240409	0021_MW133_240409	0021_MW135_240409	0021_MW136_240409
Sampling date / time				09-Apr-2024 10:51	09-Apr-2024 14:50	09-Apr-2024 11:40	09-Apr-2024 08:53	09-Apr-2024 09:11
Compound	CAS Number	LOR	Unit	ES2411994-036	ES2411994-037	ES2411994-038	ES2411994-039	ES2411994-040
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0005	µg/L	----	----	----	0.0009	<0.0005
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.001	µg/L	----	----	----	<0.001	<0.001
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.001	µg/L	----	----	----	<0.001	<0.001
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.001	µg/L	----	----	----	<0.001	<0.001
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.001	µg/L	----	----	----	<0.001	<0.001
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0005	µg/L	----	----	----	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0005	µg/L	----	----	----	<0.0005	<0.0005
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	----	----
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.001	µg/L	----	----	----	<0.001	<0.001



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW131_240409	0021_MW132_240409	0021_MW133_240409	0021_MW135_240409	0021_MW136_240409
Sampling date / time				09-Apr-2024 10:51	09-Apr-2024 14:50	09-Apr-2024 11:40	09-Apr-2024 08:53	09-Apr-2024 09:11
Compound	CAS Number	LOR	Unit	ES2411994-036	ES2411994-037	ES2411994-038	ES2411994-039	ES2411994-040
				Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued								
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.001	µg/L	----	----	----	<0.001	<0.001
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.001	µg/L	----	----	----	<0.001	<0.001
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.001	µg/L	----	----	----	<0.001	<0.001
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	0.19	<0.01	<0.01	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.19	<0.01	<0.01	----	----
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.19	<0.01	<0.01	----	----
^ Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	µg/L	----	----	----	0.0056	<0.0002
^ Sum of PFAS (WA DER List)	----	0.0002	µg/L	----	----	----	0.0076	<0.0002
^ Sum of PFAS	----	0.0002	µg/L	----	----	----	0.0085	0.0033
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	93.9	97.5	101	----	----
13C8-PFOA	----	0.02	%	103	101	105	----	----
13C4-PFOS	----	0.0005	%	----	----	----	95.8	92.0
13C8-PFOA	----	0.0005	%	----	----	----	99.5	101



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW137_240409	0021_MW138_240409	0021_MW139_240409	0021_MW140_240409	0021_QC100_240409
Sampling date / time				09-Apr-2024 09:01	09-Apr-2024 13:54	09-Apr-2024 13:43	09-Apr-2024 14:04	09-Apr-2024 13:44
Compound	CAS Number	LOR	Unit	ES2411994-041	ES2411994-042	ES2411994-043	ES2411994-044	ES2411994-045
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	µg/L	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.0020	µg/L	<0.0020	<0.0020	<0.0020	<0.0020	<0.0020
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0005	µg/L	<0.0005	0.0006	<0.0005	<0.0005	<0.0005
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0005	µg/L	<0.0005	0.0009	<0.0005	<0.0005	<0.0005
Perfluorooctanoic acid (PFOA)	335-67-1	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
Perfluorononanoic acid (PFNA)	375-95-1	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
Perfluorodecanoic acid (PFDA)	335-76-2	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.001	µg/L	<0.001	<0.001	<0.001	<0.001	<0.001



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_MW137_240409	0021_MW138_240409	0021_MW139_240409	0021_MW140_240409	0021_QC100_240409
Sampling date / time				09-Apr-2024 09:01	09-Apr-2024 13:54	09-Apr-2024 13:43	09-Apr-2024 14:04	09-Apr-2024 13:44
Compound	CAS Number	LOR	Unit	ES2411994-041	ES2411994-042	ES2411994-043	ES2411994-044	ES2411994-045
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.001	µg/L	<0.001	<0.001	<0.001	<0.001	<0.001
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.001	µg/L	<0.001	<0.001	<0.001	<0.001	<0.001
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.001	µg/L	<0.001	<0.001	<0.001	<0.001	<0.001
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0005	µg/L	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.001	µg/L	<0.001	<0.001	<0.001	<0.001	<0.001
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.001	µg/L	<0.001	0.010	<0.001	<0.001	<0.001
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.001	µg/L	<0.001	<0.001	<0.001	<0.001	<0.001
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.001	µg/L	<0.001	<0.001	<0.001	<0.001	<0.001
EP231P: PFAS Sums								
^ Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	µg/L	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
^ Sum of PFAS (WA DER List)	----	0.0002	µg/L	<0.0002	0.0115	<0.0002	<0.0002	<0.0002
^ Sum of PFAS	----	0.0002	µg/L	<0.0002	0.0115	<0.0002	<0.0002	<0.0002
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0005	%	95.4	92.8	101	91.3	96.3
13C8-PFOA	----	0.0005	%	104	102	113	96.8	118



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

0021_QC112_240411

Sampling date / time

11-Apr-2024 09:55

Compound	CAS Number	LOR	Unit

ES2411994-049

Result

EP231A: Perfluoroalkyl Sulfonic Acids

Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.18	----	----	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.26	----	----	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	3.31	----	----	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.08	----	----	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	2.76	----	----	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	----	----	----	----

EP231B: Perfluoroalkyl Carboxylic Acids

Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	----	----	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	0.10	----	----	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.47	----	----	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	0.05	----	----	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.10	----	----	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	----	----	----	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	----	----	----	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	----	----	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	----	----	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	----	----	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	----	----	----	----

EP231C: Perfluoroalkyl Sulfonamides

Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	----	----	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	----	----	----	----



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

0021_QC112_240411

Sampling date / time

11-Apr-2024 09:55

Compound

CAS Number

LOR

Unit

ES2411994-049

Result

EP231C: Perfluoroalkyl Sulfonamides - Continued

N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	----	----	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	----	----	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	----	----	----	----

EP231D: (n:2) Fluorotelomer Sulfonic Acids

4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	----	----	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	----	----	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	----	----	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	----	----	----	----

EP231P: PFAS Sums

Sum of PFAS	----	0.01	µg/L	7.39	----	----	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	6.07	----	----	----	----
Sum of PFAS (WA DER List)	----	0.01	µg/L	6.97	----	----	----	----

EP231S: PFAS Surrogate

13C4-PFOS	----	0.02	%	97.7	----	----	----	----
13C8-PFOA	----	0.02	%	91.7	----	----	----	----



Analytical Results

Sub-Matrix: RINSATE
 (Matrix: WATER)

Sample ID

				0021_QC300_240408	0021_QC301_240409	0021_QC302_240410	0021_QC303_240411	0021_QC304_240412
Sampling date / time				08-Apr-2024 16:11	09-Apr-2024 16:52	10-Apr-2024 15:35	11-Apr-2024 13:22	12-Apr-2024 10:54
Compound	CAS Number	LOR	Unit	ES2411994-050	ES2411994-051	ES2411994-052	ES2411994-053	ES2411994-054
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: RINSATE
 (Matrix: WATER)

Sample ID

				0021_QC300_240408	0021_QC301_240409	0021_QC302_240410	0021_QC303_240411	0021_QC304_240412
Sampling date / time				08-Apr-2024 16:11	09-Apr-2024 16:52	10-Apr-2024 15:35	11-Apr-2024 13:22	12-Apr-2024 10:54
Compound	CAS Number	LOR	Unit	ES2411994-050	ES2411994-051	ES2411994-052	ES2411994-053	ES2411994-054
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Sum of PFAS (WA DER List)	----	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	99.3	99.7	98.2	104	94.1
13C8-PFOA	----	0.02	%	95.8	98.1	101	101	95.4



Analytical Results

Sub-Matrix: RINSATE
 (Matrix: WATER)

Sample ID

				0021_QC400_240408	0021_QC401_240409	0021_QC402_240410	0021_QC403_240411	0021_QC404_240412
Sampling date / time				08-Apr-2024 16:12	09-Apr-2024 16:54	10-Apr-2024 15:36	11-Apr-2024 13:23	12-Apr-2024 10:55
Compound	CAS Number	LOR	Unit	ES2411994-055	ES2411994-056	ES2411994-057	ES2411994-058	ES2411994-059
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: RINSATE
 (Matrix: WATER)

Sample ID

				0021_QC400_240408	0021_QC401_240409	0021_QC402_240410	0021_QC403_240411	0021_QC404_240412
Sampling date / time				08-Apr-2024 16:12	09-Apr-2024 16:54	10-Apr-2024 15:36	11-Apr-2024 13:23	12-Apr-2024 10:55
Compound	CAS Number	LOR	Unit	ES2411994-055	ES2411994-056	ES2411994-057	ES2411994-058	ES2411994-059
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Sum of PFAS (WA DER List)	----	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	97.4	96.2	95.5	101	93.2
13C8-PFOA	----	0.02	%	95.1	90.0	95.2	88.5	90.3



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_QC101_240408	0021_QC104_240410	----	----	----
Sampling date / time				08-Apr-2024 14:40	10-Apr-2024 10:15	----	----	----
Compound	CAS Number	LOR	Unit	ES2411994-046	ES2411994-047	-----	-----	-----
				Result	Result	----	----	----
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.03	<0.02	----	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.74	0.03	----	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.06	<0.02	----	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.86	<0.01	----	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	----	----	----
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	----	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.05	<0.02	----	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.05	<0.01	----	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	----	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	----	----	----
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	----	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	----	----	----



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_QC101_240408	0021_QC104_240410	----	----	----
Sampling date / time				08-Apr-2024 14:40	10-Apr-2024 10:15	----	----	----
Compound	CAS Number	LOR	Unit	ES2411994-046	ES2411994-047	-----	-----	-----
				Result	Result	----	----	----
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	----	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	----	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	----	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	----	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	----	----	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	----	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	----	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	----	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	----	----	----
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	1.79	0.03	----	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	1.60	0.03	----	----	----
Sum of PFAS (WA DER List)	----	0.01	µg/L	1.70	0.03	----	----	----
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	95.0	94.5	----	----	----
13C8-PFOA	----	0.02	%	101	103	----	----	----



Analytical Results

Sub-Matrix: WATER
 (Matrix: WATER)

Sample ID

0021_QC111_240410

Sampling date / time

10-Apr-2024 10:40

Compound	CAS Number	LOR	Unit

ES2411994-048

Result

EP231A: Perfluoroalkyl Sulfonic Acids

Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	----	----	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	----	----	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.03	----	----	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	----	----	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.03	----	----	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	----	----	----	----

EP231B: Perfluoroalkyl Carboxylic Acids

Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	----	----	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	----	----	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	----	----	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	----	----	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	----	----	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	----	----	----	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	----	----	----	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	----	----	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	----	----	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	----	----	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	----	----	----	----

EP231C: Perfluoroalkyl Sulfonamides

Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	----	----	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	----	----	----	----



Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Sample ID	0021_QC111_240410	----	----	----	----
Sampling date / time					10-Apr-2024 10:40	----	----	----	----
Compound	CAS Number	LOR	Unit		ES2411994-048	-----	-----	-----	-----
				Result	----	----	----	----	----
EP231C: Perfluoroalkyl Sulfonamides - Continued									
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L		<0.05	----	----	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L		<0.05	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L		<0.05	----	----	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L		<0.02	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L		<0.02	----	----	----	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L		<0.05	----	----	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L		<0.05	----	----	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L		<0.05	----	----	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L		<0.05	----	----	----	----
EP231P: PFAS Sums									
Sum of PFAS	----	0.01	µg/L		0.06	----	----	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L		0.06	----	----	----	----
Sum of PFAS (WA DER List)	----	0.01	µg/L		0.06	----	----	----	----
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.02	%		88.7	----	----	----	----
13C8-PFOA	----	0.02	%		93.1	----	----	----	----



Surrogate Control Limits

Sub-Matrix: GROUNDWATER		Recovery Limits (%)	
Compound	CAS Number	Low	High
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

Sub-Matrix: RINSATE		Recovery Limits (%)	
Compound	CAS Number	Low	High
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

Sub-Matrix: SURFACE WATER		Recovery Limits (%)	
Compound	CAS Number	Low	High
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

Sub-Matrix: WATER		Recovery Limits (%)	
Compound	CAS Number	Low	High
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120



QUALITY CONTROL REPORT

Work Order : **ES2411994**

Page : 1 of 16

Amendment : **2**

Client : **AECOM AUSTRALIA PTY LTD**

Laboratory : Environmental Division Sydney

Contact : [REDACTED]

Contact : [REDACTED]

Address : LEVEL 2 60 MARCUS CLARKE ST
CANBERRA ACT, AUSTRALIA 2600

Address : 277-289 Woodpark Road Smithfield NSW Australia 2164

Telephone : ----

Telephone : +61 2 8784 8555

Project : ACT_0021_PFASOMP_24

Date Samples Received : 12-Apr-2024

Order number : 60612562_4.1

Date Analysis Commenced : 17-Apr-2024

C-O-C number : 65535

Issue Date : 20-May-2024

Sampler : [REDACTED]

Site : 0021_PFAS

Quote number : SY/139/19 v4 60612562_4.1

No. of samples received : 59

No. of samples analysed : 59



Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted, unless the sampling was conducted by ALS. This document shall not be reproduced, except in full.

This Quality Control Report contains the following information:

- Laboratory Duplicate (DUP) Report; Relative Percentage Difference (RPD) and Acceptance Limits
- Method Blank (MB) and Laboratory Control Spike (LCS) Report; Recovery and Acceptance Limits
- Matrix Spike (MS) Report; Recovery and Acceptance Limits

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories

Position

Accreditation Category

[REDACTED]

LCMS Coordinator

Sydney Organics, Smithfield, NSW



General Comments

The analytical procedures used by ALS have been developed from established internationally recognised procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are fully validated and are often at the client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis. Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

Key :
 Anonymous = Refers to samples which are not specifically part of this work order but formed part of the QC process lot
 CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
 LOR = Limit of reporting
 RPD = Relative Percentage Difference
 # = Indicates failed QC

Laboratory Duplicate (DUP) Report

The quality control term Laboratory Duplicate refers to a randomly selected intralaboratory split. Laboratory duplicates provide information regarding method precision and sample heterogeneity. The permitted ranges for the Relative Percent Deviation (RPD) of Laboratory Duplicates are specified in ALS Method QWI-EN/38 and are dependent on the magnitude of results in comparison to the level of reporting: Result < 10 times LOR: No Limit; Result between 10 and 20 times LOR: 0% - 50%; Result > 20 times LOR: 0% - 20%.

Sub-Matrix: **WATER**

Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5730583)									
ES2411994-001	0021_MW022_240408	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.71	0.60	16.4	0% - 20%
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.82	0.83	1.6	0% - 20%
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.02	0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.06	0.06	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
ES2411994-014	0021_MW106_240410	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	19.8	21.2	6.6	0% - 20%
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	78.2	76.2	2.6	0% - 20%
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.64	0.68	5.8	0% - 20%
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	1.41	1.50	5.9	0% - 20%
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	1.34	1.49	10.5	0% - 20%
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	0.19	0.16	17.0	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5730617)									
ES2411994-020	0021_MW112_240408	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
ES2411994-033	0021_MW128_240410	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5730617) - continued									
ES2411994-033	0021_MW128_240410	EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5731025)									
ES2411994-053	0021_QC303_240411	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
ES2411994-058	0021_QC403_240411	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5730583)									
ES2411994-001	0021_MW022_240408	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.04	0.04	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.05	0.05	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
		ES2411994-014	0021_MW106_240410	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.97	1.07
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3			0.02	µg/L	0.45	0.48	7.4	0% - 20%
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4			0.02	µg/L	4.37	4.70	7.5	0% - 20%
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9			0.02	µg/L	0.40	0.44	10.9	0% - 20%
EP231X: Perfluorononanoic acid (PFNA)	375-95-1			0.02	µg/L	0.03	0.02	0.0	No Limit
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2			0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8			0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1			0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8			0.02	µg/L	<0.02	<0.02	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5730583) - continued									
ES2411994-014	0021_MW106_240410	EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	0.2	0.2	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5730617)									
ES2411994-020	0021_MW112_240408	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
ES2411994-033	0021_MW128_240410	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5731025)									
ES2411994-053	0021_QC303_240411	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5731025) - continued									
ES2411994-058	0021_QC403_240411	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5730583)									
ES2411994-001	0021_MW022_240408	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2411994-014	0021_MW106_240410	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	0.02	0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5730617)									
ES2411994-020	0021_MW112_240408	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5730617) - continued									
ES2411994-020	0021_MW112_240408	EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2411994-033	0021_MW128_240410	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5731025)									
ES2411994-053	0021_QC303_240411	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2411994-058	0021_QC403_240411	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5731025) - continued									
ES2411994-058	0021_QC403_240411	EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5730583)									
ES2411994-001	0021_MW022_240408	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2411994-014	0021_MW106_240410	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5730617)									
ES2411994-020	0021_MW112_240408	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2411994-033	0021_MW128_240410	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5730617) - continued									
ES2411994-033	0021_MW128_240410	EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5731025)									
ES2411994-053	0021_QC303_240411	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2411994-058	0021_QC403_240411	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231P: PFAS Sums (QC Lot: 5730583)									
ES2411994-001	0021_MW022_240408	EP231X: Sum of PFAS	----	0.01	µg/L	1.70	1.60	6.1	0% - 20%
ES2411994-014	0021_MW106_240410	EP231X: Sum of PFAS	----	0.01	µg/L	109	109	0.2	0% - 20%
EP231P: PFAS Sums (QC Lot: 5730617)									
ES2411994-020	0021_MW112_240408	EP231X: Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	0.0	No Limit
ES2411994-033	0021_MW128_240410	EP231X: Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	0.0	No Limit
EP231P: PFAS Sums (QC Lot: 5731025)									
ES2411994-053	0021_QC303_240411	EP231X: Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	0.0	No Limit
ES2411994-058	0021_QC403_240411	EP231X: Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	0.0	No Limit



Method Blank (MB) and Laboratory Control Sample (LCS) Report

The quality control term Method / Laboratory Blank refers to an analyte free matrix to which all reagents are added in the same volumes or proportions as used in standard sample preparation. The purpose of this QC parameter is to monitor potential laboratory contamination. The quality control term Laboratory Control Sample (LCS) refers to a certified reference material, or a known interference free matrix spiked with target analytes. The purpose of this QC parameter is to monitor method precision and accuracy independent of sample matrix. Dynamic Recovery Limits are based on statistical evaluation of processed LCS.

Sub-Matrix: **WATER**

Sub-Matrix: WATER				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%) Low High	
Method: Compound	CAS Number	LOR	Unit	Result				
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5730583)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.25 µg/L	88.4	72.0	130
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.25 µg/L	89.9	71.0	127
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.25 µg/L	83.9	68.0	131
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.25 µg/L	103	69.0	134
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.25 µg/L	89.8	65.0	140
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	0.25 µg/L	94.9	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5730617)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.25 µg/L	95.0	72.0	130
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.25 µg/L	89.8	71.0	127
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.25 µg/L	84.7	68.0	131
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.25 µg/L	99.8	69.0	134
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.25 µg/L	90.8	65.0	140
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	0.25 µg/L	90.8	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5731025)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.25 µg/L	91.5	72.0	130
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.25 µg/L	87.3	71.0	127
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.25 µg/L	95.3	68.0	131
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.25 µg/L	118	69.0	134
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.25 µg/L	97.0	65.0	140
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	0.25 µg/L	81.0	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5733430)								
EP231X-SUT: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0005	µg/L	<0.0005	0.004 µg/L	90.3	72.0	130
EP231X-SUT: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0005	µg/L	<0.0005	0.004 µg/L	102	71.0	127
EP231X-SUT: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0005	µg/L	<0.0005	0.004 µg/L	94.8	68.0	131
EP231X-SUT: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0005	µg/L	<0.0005	0.004 µg/L	99.5	69.0	134
EP231X-SUT: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	µg/L	<0.0002	0.004 µg/L	98.3	65.0	140
EP231X-SUT: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0005	µg/L	<0.0005	0.004 µg/L	91.9	53.0	142
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5730583)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	1.25 µg/L	93.0	73.0	129
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.25 µg/L	100	72.0	129

Sub-Matrix: WATER				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%)	Acceptable Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result		LCS	Low	High
EP231B: Perfluoroalkyl Carboxylic Acids (QCLOT: 5730583) - continued								
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.25 µg/L	90.3	72.0	129
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.25 µg/L	98.8	72.0	130
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.25 µg/L	97.1	71.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	0.25 µg/L	96.6	69.0	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	0.25 µg/L	92.4	71.0	129
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	0.25 µg/L	109	69.0	133
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.25 µg/L	115	72.0	134
EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	0.25 µg/L	116	65.0	144
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	0.625 µg/L	105	71.0	132
EP231B: Perfluoroalkyl Carboxylic Acids (QCLOT: 5730617)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	1.25 µg/L	97.9	73.0	129
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.25 µg/L	106	72.0	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.25 µg/L	92.7	72.0	129
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.25 µg/L	99.3	72.0	130
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.25 µg/L	94.7	71.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	0.25 µg/L	105	69.0	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	0.25 µg/L	98.2	71.0	129
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	0.25 µg/L	104	69.0	133
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.25 µg/L	104	72.0	134
EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	0.25 µg/L	107	65.0	144
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	0.625 µg/L	92.6	71.0	132
EP231B: Perfluoroalkyl Carboxylic Acids (QCLOT: 5731025)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	1.25 µg/L	96.8	73.0	129
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.25 µg/L	103	72.0	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.25 µg/L	100	72.0	129
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.25 µg/L	97.3	72.0	130
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.25 µg/L	95.6	71.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	0.25 µg/L	99.5	69.0	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	0.25 µg/L	93.8	71.0	129
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	0.25 µg/L	99.4	69.0	133
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.25 µg/L	104	72.0	134
EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	0.25 µg/L	99.1	65.0	144
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	0.625 µg/L	90.4	71.0	132
EP231B: Perfluoroalkyl Carboxylic Acids (QCLOT: 5733430)								

Sub-Matrix: WATER				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%)	Acceptable Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result		LCS	Low	High
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5733430) - continued								
EP231X-SUT: Perfluorobutanoic acid (PFBA)	375-22-4	0.002	µg/L	<0.0020	0.02 µg/L	103	73.0	129
EP231X-SUT: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0005	µg/L	<0.0005	0.004 µg/L	104	72.0	129
EP231X-SUT: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0005	µg/L	<0.0005	0.004 µg/L	88.5	72.0	129
EP231X-SUT: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0005	µg/L	<0.0005	0.004 µg/L	105	72.0	130
EP231X-SUT: Perfluorooctanoic acid (PFOA)	335-67-1	0.0005	µg/L	<0.0005	0.004 µg/L	98.8	71.0	133
EP231X-SUT: Perfluorononanoic acid (PFNA)	375-95-1	0.0005	µg/L	<0.0005	0.004 µg/L	87.7	69.0	130
EP231X-SUT: Perfluorodecanoic acid (PFDA)	335-76-2	0.0005	µg/L	<0.0005	0.004 µg/L	101	71.0	129
EP231X-SUT: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0005	µg/L	<0.0005	0.004 µg/L	108	69.0	133
EP231X-SUT: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0005	µg/L	<0.0005	0.004 µg/L	107	72.0	134
EP231X-SUT: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0005	µg/L	<0.0005	0.004 µg/L	91.9	65.0	144
EP231X-SUT: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	µg/L	<0.0005	0.01 µg/L	102	71.0	132
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5730583)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	0.25 µg/L	108	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	0.625 µg/L	105	68.0	141
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	0.625 µg/L	76.8	62.6	147
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	0.625 µg/L	94.6	66.0	145
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	0.625 µg/L	97.6	57.6	145
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	0.25 µg/L	90.1	65.0	136
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	0.25 µg/L	100	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5730617)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	0.25 µg/L	99.4	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	0.625 µg/L	105	68.0	141
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	0.625 µg/L	95.6	62.6	147
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	0.625 µg/L	85.4	66.0	145
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	0.625 µg/L	99.0	57.6	145
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	0.25 µg/L	119	65.0	136
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	0.25 µg/L	99.8	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5731025)								



Sub-Matrix: **WATER**

				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result			Low	High
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5731025) - continued								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	0.25 µg/L	96.7	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	0.625 µg/L	98.0	68.0	141
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	0.625 µg/L	98.8	62.6	147
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	0.625 µg/L	90.6	66.0	145
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	0.625 µg/L	100	57.6	145
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	0.25 µg/L	95.0	65.0	136
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	0.25 µg/L	95.8	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5733430)								
EP231X-SUT: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0005	µg/L	<0.0005	0.004 µg/L	102	67.0	137
EP231X-SUT: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.001	µg/L	<0.001	0.01 µg/L	116	68.0	141
EP231X-SUT: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.001	µg/L	<0.001	0.01 µg/L	107	56.6	136
EP231X-SUT: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.001	µg/L	<0.001	0.01 µg/L	105	61.9	129
EP231X-SUT: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.001	µg/L	<0.001	0.01 µg/L	121	52.8	135
EP231X-SUT: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0005	µg/L	<0.0005	0.004 µg/L	114	65.0	136
EP231X-SUT: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0005	µg/L	<0.0005	0.004 µg/L	106	61.0	135
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5730583)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	0.25 µg/L	120	63.0	143
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	0.25 µg/L	100	64.0	140
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	0.25 µg/L	89.1	67.0	138
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	0.25 µg/L	85.4	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5730617)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	0.25 µg/L	99.0	63.0	143
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	0.25 µg/L	97.7	64.0	140
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	0.25 µg/L	88.2	67.0	138
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	0.25 µg/L	82.6	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5731025)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	0.25 µg/L	80.2	63.0	143



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%) Low High	
Method: Compound	CAS Number	LOR	Unit	Result				
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5731025) - continued								
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	0.25 µg/L	89.5	64.0	140
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	0.25 µg/L	101	67.0	138
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	0.25 µg/L	74.7	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5733430)								
EP231X-SUT: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.001	µg/L	<0.001	0.004 µg/L	105	63.0	143
EP231X-SUT: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.001	µg/L	<0.001	0.004 µg/L	88.9	64.0	140
EP231X-SUT: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.001	µg/L	<0.001	0.004 µg/L	97.6	67.0	138
EP231X-SUT: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.001	µg/L	<0.001	0.004 µg/L	88.3	60.9	136
EP231P: PFAS Sums (QCLot: 5733430)								
EP231X-SUT: Sum of PFHxS and PFOS	355-46-4/17 63-23-1	0.0002	µg/L	<0.0002	----	----	----	----
EP231X-SUT: Sum of PFAS (WA DER List)	----	0.0002	µg/L	<0.0002	----	----	----	----
EP231X-SUT: Sum of PFAS	----	0.0002	µg/L	<0.0002	----	----	----	----

Matrix Spike (MS) Report

The quality control term Matrix Spike (MS) refers to an intralaboratory split sample spiked with a representative set of target analytes. The purpose of this QC parameter is to monitor potential matrix effects on analyte recoveries. Static Recovery Limits as per laboratory Data Quality Objectives (DQOs). Ideal recovery ranges stated may be waived in the event of sample matrix interference.

Sub-Matrix: **WATER**

Sub-Matrix: WATER				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5730583)							
ES2411994-002	0021_MW024_240408	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.25 µg/L	85.8	72.0	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.25 µg/L	85.7	71.0	127
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.25 µg/L	82.9	68.0	131
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.25 µg/L	113	69.0	134
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.25 µg/L	90.6	65.0	140
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.25 µg/L	104	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5730617)							
ES2411994-021	0021_MW113_240410	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.25 µg/L	95.4	72.0	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.25 µg/L	87.7	71.0	127
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.25 µg/L	83.5	68.0	131
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.25 µg/L	104	69.0	134
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.25 µg/L	96.1	65.0	140
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.25 µg/L	93.1	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5731025)							
ES2411994-059	0021_QC404_240412	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.25 µg/L	83.8	72.0	130



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5731025) - continued							
ES2411994-059	0021_QC404_240412	EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.25 µg/L	93.8	71.0	127
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.25 µg/L	98.2	68.0	131
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.25 µg/L	113	69.0	134
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.25 µg/L	93.4	65.0	140
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.25 µg/L	83.0	53.0	142
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5730583)							
ES2411994-002	0021_MW024_240408	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	1.25 µg/L	92.5	73.0	129
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.25 µg/L	98.4	72.0	129
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.25 µg/L	91.6	72.0	129
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.25 µg/L	92.2	72.0	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.25 µg/L	98.6	71.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.25 µg/L	91.9	69.0	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.25 µg/L	91.2	71.0	129
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.25 µg/L	98.6	69.0	133
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.25 µg/L	102	72.0	134
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.25 µg/L	95.1	65.0	144
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.625 µg/L	97.0	71.0	132
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5730617)							
ES2411994-021	0021_MW113_240410	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	1.25 µg/L	99.9	73.0	129
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.25 µg/L	105	72.0	129
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.25 µg/L	97.3	72.0	129
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.25 µg/L	103	72.0	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.25 µg/L	97.2	71.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.25 µg/L	91.4	69.0	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.25 µg/L	93.9	71.0	129
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.25 µg/L	99.2	69.0	133
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.25 µg/L	104	72.0	134
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.25 µg/L	97.1	65.0	144
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.625 µg/L	100	71.0	132
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5731025)							
ES2411994-059	0021_QC404_240412	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	1.25 µg/L	91.0	73.0	129
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.25 µg/L	103	72.0	129
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.25 µg/L	99.4	72.0	129
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.25 µg/L	85.8	72.0	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.25 µg/L	94.5	71.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.25 µg/L	100	69.0	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.25 µg/L	93.8	71.0	129
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.25 µg/L	96.8	69.0	133



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5731025) - continued							
ES2411994-059	0021_QC404_240412	EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.25 µg/L	98.8	72.0	134
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.25 µg/L	87.4	65.0	144
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.625 µg/L	93.4	71.0	132
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5730583)							
ES2411994-002	0021_MW024_240408	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.25 µg/L	101	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.625 µg/L	106	68.0	141
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.625 µg/L	90.4	62.6	147
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.625 µg/L	88.4	66.0	145
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.625 µg/L	102	57.6	145
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.25 µg/L	94.9	65.0	136
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.25 µg/L	99.9	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5730617)							
ES2411994-021	0021_MW113_240410	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.25 µg/L	107	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.625 µg/L	105	68.0	141
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.625 µg/L	90.8	62.6	147
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.625 µg/L	85.4	66.0	145
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.625 µg/L	98.3	57.6	145
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.25 µg/L	103	65.0	136
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.25 µg/L	106	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5731025)							
ES2411994-059	0021_QC404_240412	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.25 µg/L	92.1	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.625 µg/L	109	68.0	141
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.625 µg/L	101	62.6	147
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.625 µg/L	99.1	66.0	145
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.625 µg/L	96.0	57.6	145



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5731025) - continued							
ES2411994-059	0021_QC404_240412	EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.25 µg/L	103	65.0	136
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.25 µg/L	93.2	61.0	135
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5730583)							
ES2411994-002	0021_MW024_240408	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.25 µg/L	94.3	63.0	143
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.25 µg/L	116	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.25 µg/L	118	67.0	138
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.25 µg/L	82.3	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5730617)							
ES2411994-021	0021_MW113_240410	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.25 µg/L	76.8	63.0	143
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.25 µg/L	94.2	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.25 µg/L	95.9	67.0	138
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.25 µg/L	77.8	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5731025)							
ES2411994-059	0021_QC404_240412	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.25 µg/L	78.9	63.0	143
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.25 µg/L	119	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.25 µg/L	100	67.0	138
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.25 µg/L	74.5	71.4	144



QA/QC Compliance Assessment to assist with Quality Review

Work Order : ES2411994

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Amendment : 2

Client : AECOM AUSTRALIA PTY LTD

Laboratory : Environmental Division Sydney

Contact : [REDACTED]

Telephone : +61 2 8784 8555

Project : ACT_0021_PFASOMP_24

Date Samples Received : 12-Apr-2024

Site : 0021_PFAS

Issue Date : 20-May-2024

Sampler : [REDACTED] [REDACTED]

No. of samples received : 59

Order number : 60612562_4.1

No. of samples analysed : 59

This report is automatically generated by the ALS LIMS through interpretation of the ALS Quality Control Report and several Quality Assurance parameters measured by ALS. This automated reporting highlights any non-conformances, facilitates faster and more accurate data validation and is designed to assist internal expert and external Auditor review. Many components of this report contribute to the overall DQO assessment and reporting for guideline compliance.

Brief method summaries and references are also provided to assist in traceability.

Summary of Outliers

Outliers : Quality Control Samples

This report highlights outliers flagged in the Quality Control (QC) Report.

- NO Method Blank value outliers occur.
- NO Duplicate outliers occur.
- NO Laboratory Control outliers occur.
- NO Matrix Spike outliers occur.
- For all regular sample matrices, where applicable to the methodology, NO surrogate recovery outliers occur.

Outliers : Analysis Holding Time Compliance

- NO Analysis Holding Time Outliers exist.

Outliers : Frequency of Quality Control Samples

- Quality Control Sample Frequency Outliers exist - please see following pages for full details.



Outliers : Frequency of Quality Control Samples

Matrix: **WATER**

Quality Control Sample Type		Count		Rate (%)		Quality Control Specification
Analytical Methods	Method	QC	Regular	Actual	Expected	
Laboratory Duplicates (DUP)						
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	0	12	0.00	10.00	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)						
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	0	12	0.00	5.00	NEPM 2013 B3 & ALS QC Standard

Analysis Holding Time Compliance

If samples are identified below as having been analysed or extracted outside of recommended holding times, this should be taken into consideration when interpreting results.

This report summarizes extraction / preparation and analysis times and compares each with ALS recommended holding times (referencing USEPA SW 846, APHA, AS and NEPM) based on the sample container provided. Dates reported represent first date of extraction or analysis and preclude subsequent dilutions and reruns. A listing of breaches (if any) is provided herein.

Holding time for leachate methods (e.g. TCLP) vary according to the analytes reported. Assessment compares the leach date with the shortest analyte holding time for the equivalent soil method. These are: organics 14 days, mercury 28 days & other metals 180 days. A recorded breach does not guarantee a breach for all non-volatile parameters.

Holding times for **VOC in soils** vary according to analytes of interest. Vinyl Chloride and Styrene holding time is 7 days; others 14 days. A recorded breach does not guarantee a breach for all VOC analytes and should be verified in case the reported breach is a false positive or Vinyl Chloride and Styrene are not key analytes of interest/concern.

Matrix: **WATER**

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231A: Perfluoroalkyl Sulfonic Acids								
HDPE (no PTFE) (EP231X) 0021_QC300_240408, 0021_QC400_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✔	22-Apr-2024	05-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW022_240408, 0021_MW112_240408, 0021_QC101_240408	08-Apr-2024	22-Apr-2024	05-Oct-2024	✔	24-Apr-2024	05-Oct-2024	✔	
HDPE (no PTFE) (EP231X-SUT) 0021_MW129_240409, 0021_MW135_240409, 0021_MW137_240409, 0021_MW139_240409, 0021_QC100_240409	09-Apr-2024	18-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_QC301_240409, 0021_QC401_240409	09-Apr-2024	19-Apr-2024	06-Oct-2024	✔	22-Apr-2024	06-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW114_240409, 0021_MW132_240409, 0021_MW131_240409, 0021_MW133_240409	09-Apr-2024	22-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_QC111_240410, 0021_QC402_240410	10-Apr-2024	19-Apr-2024	07-Oct-2024	✔	22-Apr-2024	07-Oct-2024	✔	
HDPE (no PTFE) (EP231X)								



Matrix: WATER

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231A: Perfluoroalkyl Sulfonic Acids - Continued								
0021_MW030_240410, 0021_MW102_240410, 0021_MW109_240410, 0021_MW111_240410, 0021_MW121_240410, 0021_MW125_240410, 0021_MW128_240410,	0021_MW101_240410, 0021_MW106_240410, 0021_MW110_240410, 0021_MW113_240410, 0021_MW124_240410, 0021_MW126_240410, 0021_QC104_240410	10-Apr-2024	22-Apr-2024	07-Oct-2024	✔	24-Apr-2024	07-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_QC112_240411, 0021_QC403_240411	0021_QC303_240411,	11-Apr-2024	19-Apr-2024	08-Oct-2024	✔	22-Apr-2024	08-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_MW061_240411, 0021_MW103_240411, 0021_MW105_240411, 0021_MW108_240411,	0021_MW062_240411, 0021_MW104_240411, 0021_MW107_240411, 0021_MW115_240411	11-Apr-2024	22-Apr-2024	08-Oct-2024	✔	24-Apr-2024	08-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_QC304_240412,	0021_QC404_240412	12-Apr-2024	19-Apr-2024	09-Oct-2024	✔	22-Apr-2024	09-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_MW025_240412, 0021_MW028_240412, 0021_MW118_240412, 0021_MW120_240412,	0021_MW026_240412, 0021_MW117_240412, 0021_MW119_240412, 0021_MW123_240412	12-Apr-2024	22-Apr-2024	09-Oct-2024	✔	24-Apr-2024	09-Oct-2024	✔



Matrix: WATER

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231B: Perfluoroalkyl Carboxylic Acids								
HDPE (no PTFE) (EP231X) 0021_QC300_240408, 0021_QC400_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✔	22-Apr-2024	05-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW022_240408, 0021_MW112_240408, 0021_QC101_240408	08-Apr-2024	22-Apr-2024	05-Oct-2024	✔	24-Apr-2024	05-Oct-2024	✔	
HDPE (no PTFE) (EP231X-SUT) 0021_MW129_240409, 0021_MW135_240409, 0021_MW137_240409, 0021_MW139_240409, 0021_QC100_240409	09-Apr-2024	18-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_QC301_240409, 0021_QC401_240409	09-Apr-2024	19-Apr-2024	06-Oct-2024	✔	22-Apr-2024	06-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW114_240409, 0021_MW132_240409, 0021_MW133_240409	09-Apr-2024	22-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_QC111_240410, 0021_QC402_240410	10-Apr-2024	19-Apr-2024	07-Oct-2024	✔	22-Apr-2024	07-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW030_240410, 0021_MW102_240410, 0021_MW109_240410, 0021_MW111_240410, 0021_MW121_240410, 0021_MW125_240410, 0021_MW128_240410,	10-Apr-2024	22-Apr-2024	07-Oct-2024	✔	24-Apr-2024	07-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_QC112_240411, 0021_QC403_240411	11-Apr-2024	19-Apr-2024	08-Oct-2024	✔	22-Apr-2024	08-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW061_240411, 0021_MW103_240411, 0021_MW105_240411, 0021_MW108_240411,	11-Apr-2024	22-Apr-2024	08-Oct-2024	✔	24-Apr-2024	08-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_QC304_240412, 0021_QC404_240412	12-Apr-2024	19-Apr-2024	09-Oct-2024	✔	22-Apr-2024	09-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW025_240412, 0021_MW028_240412, 0021_MW118_240412, 0021_MW120_240412,	12-Apr-2024	22-Apr-2024	09-Oct-2024	✔	24-Apr-2024	09-Oct-2024	✔	



Matrix: **WATER**

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date		Extraction / Preparation			Analysis		
Container / Client Sample ID(s)			Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP231C: Perfluoroalkyl Sulfonamides								
HDPE (no PTFE) (EP231X) 0021_QC300_240408,	0021_QC400_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✔	22-Apr-2024	05-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_MW022_240408, 0021_MW112_240408,	0021_MW024_240408, 0021_QC101_240408	08-Apr-2024	22-Apr-2024	05-Oct-2024	✔	24-Apr-2024	05-Oct-2024	✔
HDPE (no PTFE) (EP231X-SUT) 0021_MW129_240409, 0021_MW135_240409, 0021_MW137_240409, 0021_MW139_240409, 0021_QC100_240409	0021_MW130_240409, 0021_MW136_240409, 0021_MW138_240409, 0021_MW140_240409,	09-Apr-2024	18-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_QC301_240409,	0021_QC401_240409	09-Apr-2024	19-Apr-2024	06-Oct-2024	✔	22-Apr-2024	06-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_MW114_240409, 0021_MW132_240409,	0021_MW131_240409, 0021_MW133_240409	09-Apr-2024	22-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_QC111_240410, 0021_QC402_240410	0021_QC302_240410,	10-Apr-2024	19-Apr-2024	07-Oct-2024	✔	22-Apr-2024	07-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_MW030_240410, 0021_MW102_240410, 0021_MW109_240410, 0021_MW111_240410, 0021_MW121_240410, 0021_MW125_240410, 0021_MW128_240410,	0021_MW101_240410, 0021_MW106_240410, 0021_MW110_240410, 0021_MW113_240410, 0021_MW124_240410, 0021_MW126_240410, 0021_QC104_240410	10-Apr-2024	22-Apr-2024	07-Oct-2024	✔	24-Apr-2024	07-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_QC112_240411, 0021_QC403_240411	0021_QC303_240411,	11-Apr-2024	19-Apr-2024	08-Oct-2024	✔	22-Apr-2024	08-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_MW061_240411, 0021_MW103_240411, 0021_MW105_240411, 0021_MW108_240411,	0021_MW062_240411, 0021_MW104_240411, 0021_MW107_240411, 0021_MW115_240411	11-Apr-2024	22-Apr-2024	08-Oct-2024	✔	24-Apr-2024	08-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_QC304_240412,	0021_QC404_240412	12-Apr-2024	19-Apr-2024	09-Oct-2024	✔	22-Apr-2024	09-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_MW025_240412, 0021_MW028_240412, 0021_MW118_240412, 0021_MW120_240412,	0021_MW026_240412, 0021_MW117_240412, 0021_MW119_240412, 0021_MW123_240412	12-Apr-2024	22-Apr-2024	09-Oct-2024	✔	24-Apr-2024	09-Oct-2024	✔



Matrix: WATER

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
HDPE (no PTFE) (EP231X) 0021_QC300_240408,	0021_QC400_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✔	22-Apr-2024	05-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_MW022_240408,	0021_MW024_240408, 0021_QC101_240408	08-Apr-2024	22-Apr-2024	05-Oct-2024	✔	24-Apr-2024	05-Oct-2024	✔
HDPE (no PTFE) (EP231X-SUT) 0021_MW129_240409,	0021_MW130_240409, 0021_MW136_240409,	09-Apr-2024	18-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔
0021_MW135_240409,	0021_MW138_240409,							
0021_MW137_240409,	0021_MW140_240409,							
0021_MW139_240409,								
0021_QC100_240409								
HDPE (no PTFE) (EP231X) 0021_QC301_240409,	0021_QC401_240409	09-Apr-2024	19-Apr-2024	06-Oct-2024	✔	22-Apr-2024	06-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_MW114_240409,	0021_MW131_240409,	09-Apr-2024	22-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔
0021_MW132_240409,	0021_MW133_240409							
HDPE (no PTFE) (EP231X) 0021_QC111_240410,	0021_QC302_240410,	10-Apr-2024	19-Apr-2024	07-Oct-2024	✔	22-Apr-2024	07-Oct-2024	✔
0021_QC402_240410								
HDPE (no PTFE) (EP231X) 0021_MW030_240410,	0021_MW101_240410,	10-Apr-2024	22-Apr-2024	07-Oct-2024	✔	24-Apr-2024	07-Oct-2024	✔
0021_MW102_240410,	0021_MW106_240410,							
0021_MW109_240410,	0021_MW110_240410,							
0021_MW111_240410,	0021_MW113_240410,							
0021_MW121_240410,	0021_MW124_240410,							
0021_MW125_240410,	0021_MW126_240410,							
0021_MW128_240410,	0021_QC104_240410							
HDPE (no PTFE) (EP231X) 0021_QC112_240411,	0021_QC303_240411,	11-Apr-2024	19-Apr-2024	08-Oct-2024	✔	22-Apr-2024	08-Oct-2024	✔
0021_QC403_240411								
HDPE (no PTFE) (EP231X) 0021_MW061_240411,	0021_MW062_240411,	11-Apr-2024	22-Apr-2024	08-Oct-2024	✔	24-Apr-2024	08-Oct-2024	✔
0021_MW103_240411,	0021_MW104_240411,							
0021_MW105_240411,	0021_MW107_240411,							
0021_MW108_240411,	0021_MW115_240411							
HDPE (no PTFE) (EP231X) 0021_QC304_240412,	0021_QC404_240412	12-Apr-2024	19-Apr-2024	09-Oct-2024	✔	22-Apr-2024	09-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_MW025_240412,	0021_MW026_240412,	12-Apr-2024	22-Apr-2024	09-Oct-2024	✔	24-Apr-2024	09-Oct-2024	✔
0021_MW028_240412,	0021_MW117_240412,							
0021_MW118_240412,	0021_MW119_240412,							
0021_MW120_240412,	0021_MW123_240412							



Matrix: WATER

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231P: PFAS Sums								
HDPE (no PTFE) (EP231X) 0021_QC300_240408, 0021_QC400_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✔	22-Apr-2024	05-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW022_240408, 0021_MW112_240408, 0021_QC101_240408	08-Apr-2024	22-Apr-2024	05-Oct-2024	✔	24-Apr-2024	05-Oct-2024	✔	
HDPE (no PTFE) (EP231X-SUT) 0021_MW129_240409, 0021_MW135_240409, 0021_MW137_240409, 0021_MW139_240409, 0021_QC100_240409	09-Apr-2024	18-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_QC301_240409, 0021_QC401_240409	09-Apr-2024	19-Apr-2024	06-Oct-2024	✔	22-Apr-2024	06-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW114_240409, 0021_MW132_240409, 0021_MW131_240409, 0021_MW133_240409	09-Apr-2024	22-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_QC111_240410, 0021_QC402_240410	10-Apr-2024	19-Apr-2024	07-Oct-2024	✔	22-Apr-2024	07-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW030_240410, 0021_MW102_240410, 0021_MW109_240410, 0021_MW111_240410, 0021_MW121_240410, 0021_MW125_240410, 0021_MW128_240410, 0021_MW101_240410, 0021_MW106_240410, 0021_MW110_240410, 0021_MW113_240410, 0021_MW124_240410, 0021_MW126_240410, 0021_QC104_240410	10-Apr-2024	22-Apr-2024	07-Oct-2024	✔	24-Apr-2024	07-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_QC112_240411, 0021_QC403_240411	11-Apr-2024	19-Apr-2024	08-Oct-2024	✔	22-Apr-2024	08-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW061_240411, 0021_MW103_240411, 0021_MW105_240411, 0021_MW108_240411, 0021_MW062_240411, 0021_MW104_240411, 0021_MW107_240411, 0021_MW115_240411	11-Apr-2024	22-Apr-2024	08-Oct-2024	✔	24-Apr-2024	08-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_QC304_240412, 0021_QC404_240412	12-Apr-2024	19-Apr-2024	09-Oct-2024	✔	22-Apr-2024	09-Oct-2024	✔	
HDPE (no PTFE) (EP231X) 0021_MW025_240412, 0021_MW028_240412, 0021_MW118_240412, 0021_MW120_240412, 0021_MW026_240412, 0021_MW117_240412, 0021_MW119_240412, 0021_MW123_240412	12-Apr-2024	22-Apr-2024	09-Oct-2024	✔	24-Apr-2024	09-Oct-2024	✔	



Quality Control Parameter Frequency Compliance

The following report summarises the frequency of laboratory QC samples analysed within the analytical lot(s) in which the submitted sample(s) was(were) processed. Actual rate should be greater than or equal to the expected rate. A listing of breaches is provided in the Summary of Outliers.

Matrix: **WATER**

Evaluation: ✖ = Quality Control frequency not within specification ; ✔ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	Method	QC	Regular	Actual	Expected	Evaluation	
Laboratory Duplicates (DUP)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	6	50	12.00	10.00	✔	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	0	12	0.00	10.00	✖	NEPM 2013 B3 & ALS QC Standard
Laboratory Control Samples (LCS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	3	50	6.00	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	1	12	8.33	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Method Blanks (MB)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	3	50	6.00	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	1	12	8.33	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	3	50	6.00	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	0	12	0.00	5.00	✖	NEPM 2013 B3 & ALS QC Standard



Brief Method Summaries

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the US EPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request. The following report provides brief descriptions of the analytical procedures employed for results reported in the Certificate of Analysis. Sources from which ALS methods have been developed are provided within the Method Descriptions.

Analytical Methods	Method	Matrix	Method Descriptions
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	WATER	In-house: Analysis of fresh and saline waters by Solid Phase Extraction (SPE) followed by LC-Electrospray-MS-MS, Negative Mode using MRM and internal standard quantitation. Isotopically labelled analogues of target analytes used as internal standards and surrogates are added to the sample container. The entire contents are transferred to a solid phase extraction (SPE) cartridge. The sample container is successively rinsed with aliquots of the elution solvent. The eluted extract is combined with an equal volume of reagent water and a portion is filtered for analysis. Method procedures and data quality objectives conform to US DoD QSM 5.4, table B-15 requirements.
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	WATER	In-house: Analysis of fresh and saline waters by Solid Phase Extraction (SPE) followed by LC-Electrospray-MS-MS, Negative Mode using MRM and internal standard quantitation. Isotopically labelled analogues of target analytes used as internal standards and surrogates are added to the sample container. The entire contents are transferred to a solid phase extraction (SPE) cartridge. The sample container is successively rinsed with aliquots of the elution solvent. The eluted extract is concentrated, combined with an equal volume of reagent water and filtered for analysis. Method procedures and data quality objectives conform to US DoD QSM 5.4, table B-15 requirements.
Preparation Methods	Method	Matrix	Method Descriptions
Solid Phase Extraction (SPE) for PFAS in water	ORG72	WATER	In-house: Isotopically labelled analogues of target analytes used as internal standards and surrogates are added to the sample container. The entire contents are transferred to a solid phase extraction (SPE) cartridge. The sample container is successively rinsed with aliquots of the elution solvent. The eluted extract is combined with an equal volume of reagent water and a portion is filtered for analysis. Method procedures conform to US DoD QSM 5.3, table B-15 requirements.



SAMPLE RECEIPT NOTIFICATION (SRN)

Work Order : ES2411994

Amendment : 2

Client : AECOM AUSTRALIA PTY LTD
Contact : [REDACTED]
Address : LEVEL 2 60 MARCUS CLARKE ST
CANBERRA ACT, AUSTRALIA 2600

Laboratory : Environmental Division Sydney
Contact : [REDACTED]
Address : 277-289 Woodpark Road Smithfield
NSW Australia 2164

E-mail : [REDACTED]
Telephone : ----
Facsimile : ----

E-mail : [REDACTED]@ALSGlobal.com
Telephone : +61 2 8784 8555
Facsimile : +61-2-8784 8500

Project : ACT_0021_PFASOMP_24
Order number : 60612562_4.1

Page : 1 of 4
Quote number : ES2021AECOMAU0042 (SY/139/19 v4
60612562_4.1)

C-O-C number : 65535
Site : 0021_PFAS
Sampler : [REDACTED]

QC Level : NEPM 2013 B3 & ALS QC Standard

Dates

Date Samples Received : 12-Apr-2024 17:48
Client Requested Due Date : 23-Apr-2024

Issue Date : 20-May-2024
Scheduled Reporting Date : **23-Apr-2024**

Delivery Details

Mode of Delivery : Carrier
No. of coolers/boxes : 8

Security Seal : Not Available
Temperature : 4.5°C 3.8°C 3.5°C - Ice
present

Receipt Detail : No. of samples received / analysed : 59 / 59

General Comments

- This report contains the following information:
 - Sample Container(s)/Preservation Non-Compliances
 - Summary of Sample(s) and Requested Analysis
 - Proactive Holding Time Report
 - Requested Deliverables
- Extra sample 0021_SD110_240412 has been relocated to work order ES2411995 with the ID updated to 0021_SD017_240412 as per field notes.
- **Please refer to the Proactive Holding Time Report table below which summarises breaches of recommended holding times that have occurred prior to samples/instructions being received at the laboratory. The laboratory will process these samples unless instructions are received from you indicating you do not wish to proceed. The absence of this summary table indicates that all samples have been received within the recommended holding times for the analysis requested.**
- Please direct any queries you have regarding this work order to the above ALS laboratory contact.
- Analytical work for this work order will be conducted at ALS Sydney.
- Sample Disposal - Aqueous (3 weeks), Solid (2 months $\pm$ 1 week) from receipt of samples.
- Please be aware that APHA/NEPM recommends water and soil samples be chilled to less than or equal to 6°C for chemical analysis, and less than or equal to 10°C but unfrozen for Microbiological analysis. Where samples are received above this temperature, it should be taken into consideration when interpreting results. Refer to ALS EnviroMail 85 for ALS recommendations of the best practice for chilling samples after sampling and for maintaining a cool temperature during transit.



Sample Container(s)/Preservation Non-Compliances

All comparisons are made against pretreatment/preservation AS, APHA, USEPA standards.

- No sample container / preservation non-compliance exists.

Summary of Sample(s) and Requested Analysis

Some items described below may be part of a laboratory process necessary for the execution of client requested tasks. Packages may contain additional analyses, such as the determination of moisture content and preparation tasks, that are included in the package.

If no sampling time is provided, the sampling time will default 00:00 on the date of sampling. If no sampling date is provided, the sampling date will be assumed by the laboratory and displayed in brackets without a time component

Matrix: **WATER**

Laboratory sample ID	Sampling date / time	Sample ID	WATER - EP231X PFAS - Full Suite (30 analytes)	WATER - EP231X-SUT PFAS - Super Ultra Trace Waters Long Suite (30)
ES2411994-001	08-Apr-2024 14:40	0021_MW022_240408	✓	
ES2411994-002	08-Apr-2024 14:25	0021_MW024_240408	✓	
ES2411994-003	12-Apr-2024 09:05	0021_MW025_240412	✓	
ES2411994-004	12-Apr-2024 08:50	0021_MW026_240412	✓	
ES2411994-005	12-Apr-2024 09:45	0021_MW028_240412	✓	
ES2411994-006	10-Apr-2024 11:10	0021_MW030_240410	✓	
ES2411994-007	11-Apr-2024 08:40	0021_MW061_240411	✓	
ES2411994-008	11-Apr-2024 09:30	0021_MW062_240411	✓	
ES2411994-009	10-Apr-2024 14:15	0021_MW101_240410	✓	
ES2411994-010	10-Apr-2024 13:56	0021_MW102_240410	✓	
ES2411994-011	11-Apr-2024 08:57	0021_MW103_240411	✓	
ES2411994-012	11-Apr-2024 09:39	0021_MW104_240411	✓	
ES2411994-013	11-Apr-2024 10:11	0021_MW105_240411	✓	
ES2411994-014	10-Apr-2024 14:35	0021_MW106_240410	✓	
ES2411994-015	11-Apr-2024 09:54	0021_MW107_240411	✓	
ES2411994-016	11-Apr-2024 10:40	0021_MW108_240411	✓	
ES2411994-017	10-Apr-2024 13:45	0021_MW109_240410	✓	
ES2411994-018	10-Apr-2024 12:35	0021_MW110_240410	✓	
ES2411994-019	10-Apr-2024 12:40	0021_MW111_240410	✓	
ES2411994-020	08-Apr-2024 14:52	0021_MW112_240408	✓	
ES2411994-021	10-Apr-2024 12:10	0021_MW113_240410	✓	
ES2411994-022	09-Apr-2024 13:03	0021_MW114_240409	✓	
ES2411994-023	11-Apr-2024 12:17	0021_MW115_240411	✓	
ES2411994-024	12-Apr-2024 10:41	0021_MW117_240412	✓	
ES2411994-025	12-Apr-2024 10:32	0021_MW118_240412	✓	
ES2411994-026	12-Apr-2024 10:02	0021_MW119_240412	✓	
ES2411994-027	12-Apr-2024 09:55	0021_MW120_240412	✓	
ES2411994-028	10-Apr-2024 10:40	0021_MW121_240410	✓	
ES2411994-029	12-Apr-2024 09:33	0021_MW123_240412	✓	
ES2411994-030	10-Apr-2024 12:03	0021_MW124_240410	✓	
ES2411994-031	10-Apr-2024 09:34	0021_MW125_240410	✓	
ES2411994-032	10-Apr-2024 09:22	0021_MW126_240410	✓	
ES2411994-033	10-Apr-2024 10:14	0021_MW128_240410	✓	
ES2411994-034	09-Apr-2024 12:43	0021_MW129_240409		✓
ES2411994-035	09-Apr-2024 15:24	0021_MW130_240409		✓



			WATER - EP231X PFAS - Full Suite (30 analytes)	WATER - EP231X-SUT PFAS - Super Ultra Trace Waters Long Suite (30)
ES2411994-036	09-Apr-2024 10:51	0021_MW131_240409	✓	
ES2411994-037	09-Apr-2024 14:50	0021_MW132_240409	✓	
ES2411994-038	09-Apr-2024 11:40	0021_MW133_240409	✓	
ES2411994-039	09-Apr-2024 08:53	0021_MW135_240409		✓
ES2411994-040	09-Apr-2024 09:11	0021_MW136_240409		✓
ES2411994-041	09-Apr-2024 09:01	0021_MW137_240409		✓
ES2411994-042	09-Apr-2024 13:54	0021_MW138_240409		✓
ES2411994-043	09-Apr-2024 13:43	0021_MW139_240409		✓
ES2411994-044	09-Apr-2024 14:04	0021_MW140_240409		✓
ES2411994-045	09-Apr-2024 13:44	0021_QC100_240409		✓
ES2411994-046	08-Apr-2024 14:40	0021_QC101_240408	✓	
ES2411994-047	10-Apr-2024 10:15	0021_QC104_240410	✓	
ES2411994-048	10-Apr-2024 10:40	0021_QC111_240410	✓	
ES2411994-049	11-Apr-2024 09:55	0021_QC112_240411	✓	
ES2411994-050	08-Apr-2024 16:11	0021_QC300_240408	✓	
ES2411994-051	09-Apr-2024 16:52	0021_QC301_240409	✓	
ES2411994-052	10-Apr-2024 15:35	0021_QC302_240410	✓	
ES2411994-053	11-Apr-2024 13:22	0021_QC303_240411	✓	
ES2411994-054	12-Apr-2024 10:54	0021_QC304_240412	✓	
ES2411994-055	08-Apr-2024 16:12	0021_QC400_240408	✓	
ES2411994-056	09-Apr-2024 16:54	0021_QC401_240409	✓	
ES2411994-057	10-Apr-2024 15:36	0021_QC402_240410	✓	
ES2411994-058	11-Apr-2024 13:23	0021_QC403_240411	✓	
ES2411994-059	12-Apr-2024 10:55	0021_QC404_240412	✓	

Proactive Holding Time Report

Sample(s) have been received within the recommended holding times for the requested analysis.



Requested Deliverables

ACCOUNTS PAYABLE

- A4 - AU Tax Invoice (INV)

Email AP_CustomerService.ANZ@aecom.com

- Chain of Custody (CoC) (COC)

Email

DERP ESDAT REPORTS

- EDI Format - ESDAT (ESDAT)

Email derp.labreports@esdat.com.au

- *AU Certificate of Analysis - NATA (COA)
- *AU Interpretive QC Report - DEFAULT (Anon QCI Rep) (QCI)
- *AU QC Report - DEFAULT (Anon QC Rep) - NATA (QC)
- A4 - AU Sample Receipt Notification - Environmental HT (SRN)
- A4 - AU Tax Invoice (INV)
- Chain of Custody (CoC) (COC)
- EDI Format - ESDAT (ESDAT)

Email

Email

Email

Email

Email

Email

Email

- *AU Certificate of Analysis - NATA (COA)
- *AU Interpretive QC Report - DEFAULT (Anon QCI Rep) (QCI)
- *AU QC Report - DEFAULT (Anon QC Rep) - NATA (QC)
- A4 - AU Sample Receipt Notification - Environmental HT (SRN)
- Chain of Custody (CoC) (COC)
- EDI Format - EQUIS V5 AECOM (EQUIS_V5_AECOM)
- EDI Format - ESDAT (ESDAT)
- Electronic SRN for EQUIS (ESRN_EQUIS)

Email

Email

Email

Email

Email

Email

Email

Email



CHAIN OF CUSTODY

COC#: 65535

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

RECEIVED BY:

RELINQUISHED BY:

RECEIVED BY:

DATE TIME:

DATE TIME:

DATE TIME:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFASOMP_24

SITE: 0021_PFAS

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

°C

Other comments:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021ALS0010001
2

SAMPLE DETAILS							ANALYSIS REQUIRED			
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_SuperTrace_Water WATER	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
008	0021_MW062_240411		11/04/2024 09:30 AM	WATER	ALS: 4 Non ALS: 0	No		X		
009	0021_MW101_240410		10/04/2024 02:15 PM	WATER	ALS: 4 Non ALS: 0	No		X		
010	0021_MW102_240410		10/04/2024 01:56 PM	WATER	ALS: 4 Non ALS: 0	No		X		
011	0021_MW103_240411		11/04/2024 08:57 AM	WATER	ALS: 3 Non ALS: 0	No		X		
012	0021_MW104_240411		11/04/2024 09:39 AM	WATER	ALS: 3 Non ALS: 0	No		X		
013	0021_MW105_240411		11/04/2024 10:11 AM	WATER	ALS: 3 Non ALS: 0	No		X		
014	0021_MW106_240410		10/04/2024 02:35 PM	WATER	ALS: 4 Non ALS: 0	No		X		



CHAIN OF CUSTODY

ALS COG#: 65535

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

RECEIVED BY:

RELINQUISHED BY:

RECEIVED BY:

DATE TIME:

DATE TIME:

DATE TIME:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT 0021 PFASOMP 24

SITE: 0021_PFAS

ORDER NO:

PROJECT MANAGER

PRIMARY SAMPLER:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS: 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes	No	N/A

Random Sample Temperature on Receipt:

C

Other comments:

SAMPLE DETAILS							ANALYSIS REQUIRED			
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_SuperTrace_Water WATER	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
015	0021_MW107_240411		11/04/2024 09:54 AM	WATER	ALS: 3 Non ALS: 0	No		X		
016	0021_MW108_240411		11/04/2024 10:40 AM	WATER	ALS: 4 Non ALS: 0	No		X		
017	0021_MW109_240410		10/04/2024 01:45 PM	WATER	ALS: 4 Non ALS: 0	No		X		
018	0021_MW110_240410		10/04/2024 12:35 PM	WATER	ALS: 4 Non ALS: 0	No		X		
019	0021_MW111_240410		10/04/2024 12:40 PM	WATER	ALS: 4 Non ALS: 0	No		X		
020	0021_MW112_240408		08/04/2024 02:52 PM	WATER	ALS: 4 Non ALS: 0	No		X		
021	0021_MW113_240410		10/04/2024 12:10 PM	WATER	ALS: 4 Non ALS: 0	No		X		



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:

Other comments:

EMAIL INVOICES TO:

SAMPLE DETAILS							ANALYSIS REQUIRED			
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_SuperTrace_Water WATER	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
029	0021_MW123_240412		12/04/2024 09:33 AM	WATER	ALS: 3 Non ALS: 0	No		X		
030	0021_MW124_240410		10/04/2024 12:03 PM	WATER	ALS: 4 Non ALS: 0	No		X		
031	0021_MW125_240409		10/04/2024 09:34 AM	WATER	ALS: 4 Non ALS: 0	No		X		
032	0021_MW126_240410		10/04/2024 09:22 AM	WATER	ALS: 4 Non ALS: 0	No		X		
033	0021_MW128_240410		10/04/2024 10:14 AM	WATER	ALS: 4 Non ALS: 0	No		X		
034	0021_MW129_240409		09/04/2024 12:43 PM	WATER	ALS: 2 Non ALS: 0	No	X			
035	0021_MW130_240409		09/04/2024 03:24 PM	WATER	ALS: 2 Non ALS: 0	No	X			



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:

Other comments:

EMAIL INVOICES TO:

SAMPLE DETAILS							ANALYSIS REQUIRED			
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_SuperTrace_Water	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
043	0021_MW139_240409		09/04/2024 01:43 PM	WATER	ALS: 2 Non ALS: 0	No	X			
044	0021_MW140_240409		09/04/2024 02:04 PM	WATER	ALS: 2 Non ALS: 0	No	X			
045	0021_QC100_240408		09/04/2024 01:44 PM	WATER	ALS: 2 Non ALS: 0	No	X			
046	0021_QC101_240408		08/04/2024 02:40 PM	WATER	ALS: 4 Non ALS: 0	No		X		
047	0021_QC104_240410		10/04/2024 10:15 AM	WATER	ALS: 4 Non ALS: 0	No		X		
048	0021_QC111_240410		10/04/2024 10:40 AM	WATER	ALS: 4 Non ALS: 0	No		X		
049	0021_QC112_240411		11/04/2024 09:55 AM	WATER	ALS: 3 Non ALS: 0	No		X		



ALS Laboratory: ES Sydney
Environmental

DATE TIME:

DATE TIME:

DATE TIME:

DATE TIME:

EMAIL INVOICES TO:

Biohazard info:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

·C

Other comments:

SAMPLE DETAILS							ANALYSIS REQUIRED			
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_SuperTrace_Water	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
050	0021_QC300_240408		08/04/2024 04:11 PM	WATER	ALS: 4 Non ALS: 0	No		X		
051	0021_QC301_240409		09/04/2024 04:52 PM	WATER	ALS: 4 Non ALS: 0	No		X		
052	0021_QC302_240410		10/04/2024 03:35 PM	WATER	ALS: 4 Non ALS: 0	No		X		
053	0021_QC303_240411		11/04/2024 01:22 PM	WATER	ALS: 2 Non ALS: 0	No		X		
054	0021_QC304_240412		12/04/2024 10:54 AM	WATER	ALS: 2 Non ALS: 0	No		X		
055	0021_QC400_240408		08/04/2024 04:12 PM	WATER	ALS: 4 Non ALS: 0	No		X		
056	0021_QC401_240409		09/04/2024 04:54 PM	WATER	ALS: 4 Non ALS: 0	No		X		



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:

EMAIL INVOICES TO:

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

C

Other comments:

SAMPLE DETAILS

ANALYSIS REQUIRED

SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_SuperTrace_Water WATER	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
057	0021_QC402_240410		10/04/2024 03:36 PM	WATER	ALS: 4 Non ALS: 0	No		X		
058	0021_QC403_240411		11/04/2024 01:23 PM	WATER	ALS: 2 Non ALS: 0	No		X		
059	0021_QC404_240412		12/04/2024 10:55 AM	WATER	ALS: 2 Non ALS: 0	No		X		

Extra 060 0021-SP110-2404KX



COCC#: 65535

ALS Laboratory: ES Sydney
Environmental

DATE TIME:

DATE TIME:

DATE TIME:

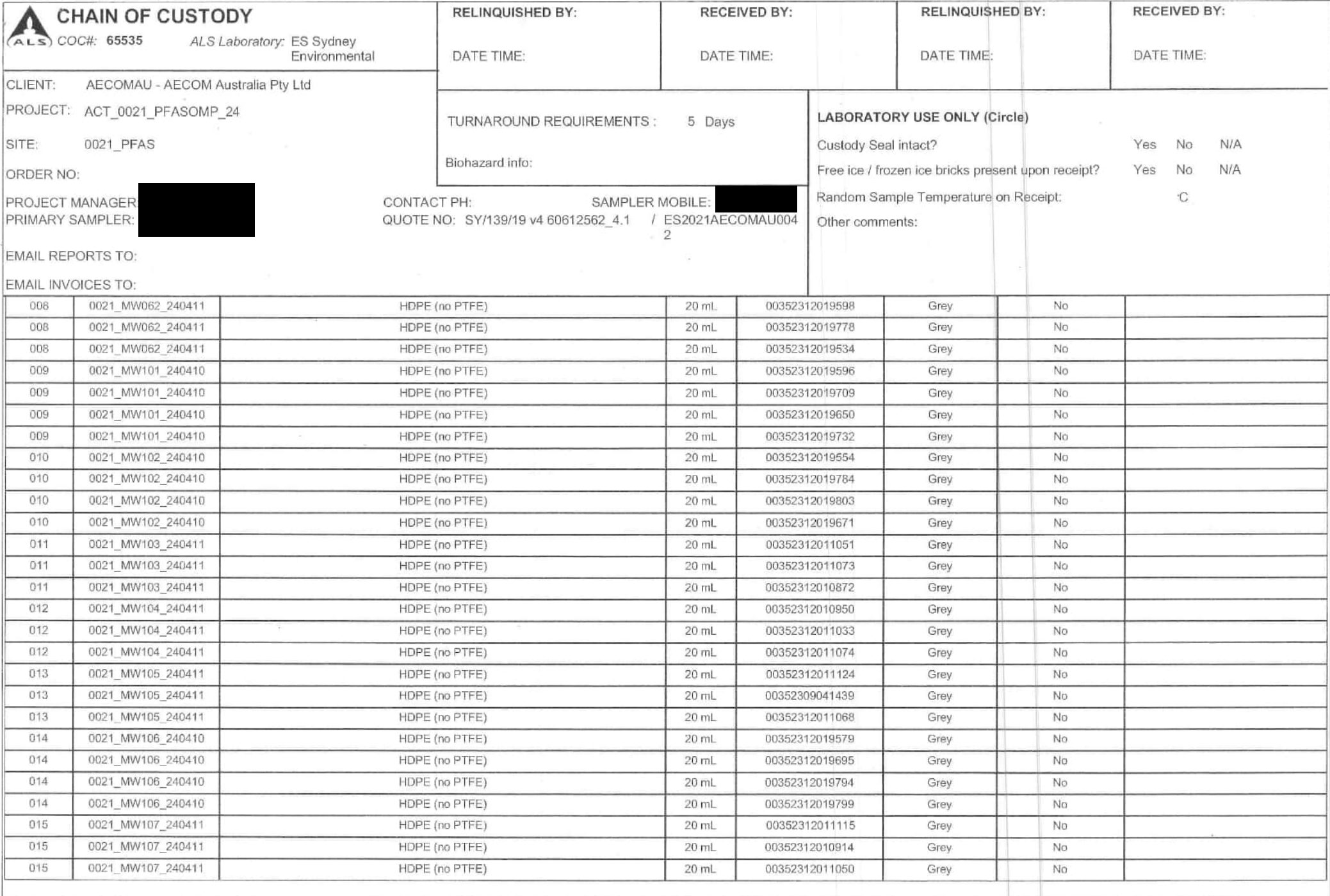
DATE TIME:

EMAIL INVOICES TO:

Biohazard info:

Other comments:

SAMPLE	SAMPLE NAME	BOTTLE NAME	VOLUME	BARCODE	TYPE	FILTERED	REASON
001	0021_MW022_240408	HDPE (no PTFE)	20 mL	00352312019677	Grey	No	
001	0021_MW022_240408	HDPE (no PTFE)	20 mL	00352312019735	Grey	No	
001	0021_MW022_240408	HDPE (no PTFE)	20 mL	00352312019563	Grey	No	
001	0021_MW022_240408	HDPE (no PTFE)	20 mL	00352312019645	Grey	No	
002	0021_MW024_240408	HDPE (no PTFE)	20 mL	00352312019807	Grey	No	
002	0021_MW024_240408	HDPE (no PTFE)	20 mL	00352312019616	Grey	No	
002	0021_MW024_240408	HDPE (no PTFE)	20 mL	00352312019696	Grey	No	
002	0021_MW024_240408	HDPE (no PTFE)	20 mL	00352312019607	Grey	No	
003	0021_MW025_240412	HDPE (no PTFE)	20 mL	00352312010984	Grey	No	
003	0021_MW025_240412	HDPE (no PTFE)	20 mL	00352312011080	Grey	No	
003	0021_MW025_240412	HDPE (no PTFE)	20 mL	00352312011119	Grey	No	
004	0021_MW026_240412	HDPE (no PTFE)	20 mL	00352312011023	Grey	No	
004	0021_MW026_240412	HDPE (no PTFE)	20 mL	00352312010841	Grey	No	
004	0021_MW026_240412	HDPE (no PTFE)	20 mL	00352312010983	Grey	No	
005	0021_MW028_240412	HDPE (no PTFE)	20 mL	00352312019592	Grey	No	
005	0021_MW028_240412	HDPE (no PTFE)	20 mL	00352312010867	Grey	No	
005	0021_MW028_240412	HDPE (no PTFE)	20 mL	00352312011015	Grey	No	
006	0021_MW030_240410	HDPE (no PTFE)	20 mL	00352312019609	Grey	No	
006	0021_MW030_240410	HDPE (no PTFE)	20 mL	00352312019682	Grey	No	
006	0021_MW030_240410	HDPE (no PTFE)	20 mL	00352312019683	Grey	No	
006	0021_MW030_240410	HDPE (no PTFE)	20 mL	00352312019691	Grey	No	
007	0021_MW061_240411	HDPE (no PTFE)	20 mL	00352312019802	Grey	No	
007	0021_MW061_240411	HDPE (no PTFE)	20 mL	00352312019648	Grey	No	
007	0021_MW061_240411	HDPE (no PTFE)	20 mL	00352312019631	Grey	No	
007	0021_MW061_240411	HDPE (no PTFE)	20 mL	00352312019690	Grey	No	
008	0021_MW062_240411	HDPE (no PTFE)	20 mL	00352312019718	Grey	No	





CHAIN OF CUSTODY

COC#: 65535

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFSOMP_24

SITE: 0021_PFS

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS: 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

°C

Other comments:

CONTACT PH:

SAMPLER MOBILE

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

016	0021_MW108_240411	HDPE (no PTFE)	20 mL	00352312019765	Grey	No	
016	0021_MW108_240411	HDPE (no PTFE)	20 mL	00352312019720	Grey	No	
016	0021_MW108_240411	HDPE (no PTFE)	20 mL	00352312019655	Grey	No	
016	0021_MW108_240411	HDPE (no PTFE)	20 mL	00352312019739	Grey	No	
017	0021_MW109_240410	HDPE (no PTFE)	20 mL	00352312019815	Grey	No	
017	0021_MW109_240410	HDPE (no PTFE)	20 mL	00352312019772	Grey	No	
017	0021_MW109_240410	HDPE (no PTFE)	20 mL	00352312019567	Grey	No	
017	0021_MW109_240410	HDPE (no PTFE)	20 mL	00352312019591	Grey	No	
018	0021_MW110_240410	HDPE (no PTFE)	20 mL	00352312019768	Grey	No	
018	0021_MW110_240410	HDPE (no PTFE)	20 mL	00352312019603	Grey	No	
018	0021_MW110_240410	HDPE (no PTFE)	20 mL	00352312019545	Grey	No	
018	0021_MW110_240410	HDPE (no PTFE)	20 mL	00352312019656	Grey	No	
019	0021_MW111_240410	HDPE (no PTFE)	20 mL	00352312019726	Grey	No	
019	0021_MW111_240410	HDPE (no PTFE)	20 mL	00352312019769	Grey	No	
019	0021_MW111_240410	HDPE (no PTFE)	20 mL	00352312019699	Grey	No	
019	0021_MW111_240410	HDPE (no PTFE)	20 mL	00352312019796	Grey	No	
020	0021_MW112_240408	HDPE (no PTFE)	20 mL	00352312019555	Grey	No	
020	0021_MW112_240408	HDPE (no PTFE)	20 mL	00352312019673	Grey	No	
020	0021_MW112_240408	HDPE (no PTFE)	20 mL	00352312019553	Grey	No	
020	0021_MW112_240408	HDPE (no PTFE)	20 mL	00352312019715	Grey	No	
021	0021_MW113_240410	HDPE (no PTFE)	20 mL	00352312019659	Grey	No	
021	0021_MW113_240410	HDPE (no PTFE)	20 mL	00352312019711	Grey	No	
021	0021_MW113_240410	HDPE (no PTFE)	20 mL	00352312019814	Grey	No	
021	0021_MW113_240410	HDPE (no PTFE)	20 mL	00352312019637	Grey	No	
022	0021_MW114_240409	HDPE (no PTFE)	20 mL	00352312010848	Grey	No	
022	0021_MW114_240409	HDPE (no PTFE)	20 mL	00352312011130	Grey	No	
022	0021_MW114_240409	HDPE (no PTFE)	20 mL	00352312010991	Grey	No	



CHAIN OF CUSTODY

COC#: 65535

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

RECEIVED BY:

RELINQUISHED BY:

RECEIVED BY:

DATE TIME:

DATE TIME:

DATE TIME:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFASOMP_24

SITE: 0021_PFAS

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

°C

Other comments:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

022	0021_MW114_240409	HDPE (no PTFE)	20 mL	00352312011042	Grey	No	
023	0021_MW115_240411	HDPE (no PTFE)	20 mL	00352312011128	Grey	No	
023	0021_MW115_240411	HDPE (no PTFE)	20 mL	00352312010883	Grey	No	
023	0021_MW115_240411	HDPE (no PTFE)	20 mL	00352312011116	Grey	No	
024	0021_MW117_240412	HDPE (no PTFE)	20 mL	00352312010968	Grey	No	
024	0021_MW117_240412	HDPE (no PTFE)	20 mL	00352312011021	Grey	No	
025	0021_MW118_240412	HDPE (no PTFE)	20 mL	00352312011058	Grey	No	
025	0021_MW118_240412	HDPE (no PTFE)	20 mL	00352312011034	Grey	No	
026	0021_MW119_240412	HDPE (no PTFE)	20 mL	00352312011043	Grey	No	
026	0021_MW119_240412	HDPE (no PTFE)	20 mL	00352312011125	Grey	No	
026	0021_MW119_240412	HDPE (no PTFE)	20 mL	00352312010908	Grey	No	
027	0021_MW120_240412	HDPE (no PTFE)	20 mL	00352312010897	Grey	No	
027	0021_MW120_240412	HDPE (no PTFE)	20 mL	00352312010876	Grey	No	
028	0021_MW121_240410	HDPE (no PTFE)	20 mL	00352312019610	Grey	No	
028	0021_MW121_240410	HDPE (no PTFE)	20 mL	00352312019712	Grey	No	
028	0021_MW121_240410	HDPE (no PTFE)	20 mL	00352312019647	Grey	No	
028	0021_MW121_240410	HDPE (no PTFE)	20 mL	00352312019574	Grey	No	
029	0021_MW123_240412	HDPE (no PTFE)	20 mL	00352312019536	Grey	No	
029	0021_MW123_240412	HDPE (no PTFE)	20 mL	00352312011045	Grey	No	
029	0021_MW123_240412	HDPE (no PTFE)	20 mL	00352312011090	Grey	No	
030	0021_MW124_240410	HDPE (no PTFE)	20 mL	00352312011044	Grey	No	
030	0021_MW124_240410	HDPE (no PTFE)	20 mL	00352312010871	Grey	No	
030	0021_MW124_240410	HDPE (no PTFE)	20 mL	00352312010882	Grey	No	
030	0021_MW124_240410	HDPE (no PTFE)	20 mL	00352312010973	Grey	No	
031	0021_MW125_240409	HDPE (no PTFE)	20 mL	00352312011122	Grey	No	
031	0021_MW125_240409	HDPE (no PTFE)	20 mL	00352312010864	Grey	No	
031	0021_MW125_240409	HDPE (no PTFE)	20 mL	00352312011105	Grey	No	

**CHAIN OF CUSTODY**

COC#: 65535

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFASOMP_24

SITE: 0021_PFAS

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS: 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

C

Other comments:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

031	0021_MW125_240409	HDPE (no PTFE)	20 mL	00352312011095	Grey	No	
032	0021_MW126_240410	HDPE (no PTFE)	20 mL	00352312011067	Grey	No	
032	0021_MW126_240410	HDPE (no PTFE)	20 mL	00352312011101	Grey	No	
032	0021_MW126_240410	HDPE (no PTFE)	20 mL	00352312011037	Grey	No	
032	0021_MW126_240410	HDPE (no PTFE)	20 mL	00352312010953	Grey	No	
033	0021_MW128_240410	HDPE (no PTFE)	20 mL	00352312011039	Grey	No	
033	0021_MW128_240410	HDPE (no PTFE)	20 mL	00352312010877	Grey	No	
033	0021_MW128_240410	HDPE (no PTFE)	20 mL	00352312010891	Grey	No	
033	0021_MW128_240410	HDPE (no PTFE)	20 mL	00352312011013	Grey	No	
034	0021_MW129_240409	HDPE (no PTFE)	125 mL	00352208100141	Grey	No	
034	0021_MW129_240409	HDPE (no PTFE)	125 mL	00352208100430	Grey	No	
035	0021_MW130_240409	HDPE (no PTFE)	125 mL	00352208100393	Grey	No	
035	0021_MW130_240409	HDPE (no PTFE)	125 mL	00352208100380	Grey	No	
036	0021_MW131_240409	HDPE (no PTFE)	20 mL	00352312019560	Grey	No	
036	0021_MW131_240409	HDPE (no PTFE)	20 mL	00352312019808	Grey	No	
036	0021_MW131_240409	HDPE (no PTFE)	20 mL	00352312019535	Grey	No	
036	0021_MW131_240409	HDPE (no PTFE)	20 mL	00352312019749	Grey	No	
037	0021_MW132_240409	HDPE (no PTFE)	20 mL	00352312019670	Grey	No	
037	0021_MW132_240409	HDPE (no PTFE)	20 mL	00352312019776	Grey	No	
037	0021_MW132_240409	HDPE (no PTFE)	20 mL	00352312019713	Grey	No	
037	0021_MW132_240409	HDPE (no PTFE)	20 mL	00352312019539	Grey	No	
038	0021_MW133_240409	HDPE (no PTFE)	20 mL	00352312019639	Grey	No	
038	0021_MW133_240409	HDPE (no PTFE)	20 mL	00352312019578	Grey	No	
038	0021_MW133_240409	HDPE (no PTFE)	20 mL	00352312019750	Grey	No	
038	0021_MW133_240409	HDPE (no PTFE)	20 mL	00352312019561	Grey	No	
039	0021_MW135_240409	HDPE (no PTFE)	125 mL	00352208100250	Grey	No	
039	0021_MW135_240409	HDPE (no PTFE)	125 mL	00352208100401	Grey	No	

**CHAIN OF CUSTODY**

COC#: 65535

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

RECEIVED BY:

RELINQUISHED BY:

RECEIVED BY:

DATE TIME:

DATE TIME:

DATE TIME:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFASOMP_24

SITE: 0021_PFAS

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

TURNAROUND REQUIREMENTS: 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

C

Other comments:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

040	0021_MW136_240409	HDPE (no PTFE)	125 mL	00352208100235	Grey	No	
040	0021_MW136_240409	HDPE (no PTFE)	125 mL	00352208100406	Grey	No	
041	0021_MW137_240409	HDPE (no PTFE)	125 mL	00352208100426	Grey	No	
041	0021_MW137_240409	HDPE (no PTFE)	125 mL	00352208100142	Grey	No	
042	0021_MW138_240409	HDPE (no PTFE)	125 mL	00352208100429	Grey	No	
042	0021_MW138_240409	HDPE (no PTFE)	125 mL	00352208100158	Grey	No	
043	0021_MW139_240409	HDPE (no PTFE)	125 mL	00352208100287	Grey	No	
043	0021_MW139_240409	HDPE (no PTFE)	125 mL	00352208100388	Grey	No	
044	0021_MW140_240409	HDPE (no PTFE)	125 mL	00352208100222	Grey	No	
044	0021_MW140_240409	HDPE (no PTFE)	125 mL	00352208100404	Grey	No	
045	0021_QC100_240408	HDPE (no PTFE)	125 mL	00352208100257	Grey	No	
045	0021_QC100_240408	HDPE (no PTFE)	125 mL	00352208100457	Grey	No	
046	0021_QC101_240408	HDPE (no PTFE)	20 mL	00352312019785	Grey	No	
046	0021_QC101_240408	HDPE (no PTFE)	20 mL	00352312019625	Grey	No	
046	0021_QC101_240408	HDPE (no PTFE)	20 mL	00352312019757	Grey	No	
046	0021_QC101_240408	HDPE (no PTFE)	20 mL	00352312019822	Grey	No	
047	0021_QC104_240410	HDPE (no PTFE)	20 mL	00352312010886	Grey	No	
047	0021_QC104_240410	HDPE (no PTFE)	20 mL	00352312011098	Grey	No	
047	0021_QC104_240410	HDPE (no PTFE)	20 mL	00352312011057	Grey	No	
047	0021_QC104_240410	HDPE (no PTFE)	20 mL	00352312010902	Grey	No	
048	0021_QC111_240410	HDPE (no PTFE)	20 mL	00352312019724	Grey	No	
048	0021_QC111_240410	HDPE (no PTFE)	20 mL	00352312019531	Grey	No	
048	0021_QC111_240410	HDPE (no PTFE)	20 mL	00352312019756	Grey	No	
048	0021_QC111_240410	HDPE (no PTFE)	20 mL	00352312019623	Grey	No	
049	0021_QC112_240411	HDPE (no PTFE)	20 mL	00352312010917	Grey	No	
049	0021_QC112_240411	HDPE (no PTFE)	20 mL	00352312010904	Grey	No	
049	0021_QC112_240411	HDPE (no PTFE)	20 mL	00352312010994	Grey	No	



ALS Laboratory: ES Sydney
Environmental

DATE TIME:

Other comments:

EMAIL INVOICES TO:

050	0021_QC300_240408	HDPE (no PTFE)	20 mL	00352312010979	Grey	No
050	0021_QC300_240408	HDPE (no PTFE)	20 mL	00352312011026	Grey	No
050	0021_QC300_240408	HDPE (no PTFE)	20 mL	00352312010901	Grey	No
050	0021_QC300_240408	HDPE (no PTFE)	20 mL	00352312011032	Grey	No
051	0021_QC301_240409	HDPE (no PTFE)	20 mL	00352312011132	Grey	No
051	0021_QC301_240409	HDPE (no PTFE)	20 mL	00352312011029	Grey	No
051	0021_QC301_240409	HDPE (no PTFE)	20 mL	00352312010936	Grey	No
051	0021_QC301_240409	HDPE (no PTFE)	20 mL	00352312011055	Grey	No
052	0021_QC302_240410	HDPE (no PTFE)	20 mL	00352312011048	Grey	No
052	0021_QC302_240410	HDPE (no PTFE)	20 mL	00352312010874	Grey	No
052	0021_QC302_240410	HDPE (no PTFE)	20 mL	00352312010969	Grey	No
052	0021_QC302_240410	HDPE (no PTFE)	20 mL	00352312010889	Grey	No
053	0021_QC303_240411	HDPE (no PTFE)	125 mL	00352208100408	Grey	No
053	0021_QC303_240411	HDPE (no PTFE)	125 mL	00352208100435	Grey	No
054	0021_QC304_240412	HDPE (no PTFE)	20 mL	00352312011114	Grey	No
054	0021_QC304_240412	HDPE (no PTFE)	20 mL	00352312010940	Grey	No
055	0021_QC400_240408	HDPE (no PTFE)	20 mL	00352312010981	Grey	No
055	0021_QC400_240408	HDPE (no PTFE)	20 mL	00352312010997	Grey	No
055	0021_QC400_240408	HDPE (no PTFE)	20 mL	00352312010903	Grey	No
055	0021_QC400_240408	HDPE (no PTFE)	20 mL	00352312010865	Grey	No
056	0021_QC401_240409	HDPE (no PTFE)	20 mL	00352312010853	Grey	No
056	0021_QC401_240409	HDPE (no PTFE)	20 mL	00352312010963	Grey	No
056	0021_QC401_240409	HDPE (no PTFE)	20 mL	00352312011017	Grey	No
056	0021_QC401_240409	HDPE (no PTFE)	20 mL	00352312010855	Grey	No
057	0021_QC402_240410	HDPE (no PTFE)	20 mL	00352312010947	Grey	No
057	0021_QC402_240410	HDPE (no PTFE)	20 mL	00352312010934	Grey	No
057	0021_QC402_240410	HDPE (no PTFE)	20 mL	00352312010925	Grey	No



CHAIN OF CUSTODY

COC#: 65535

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFASOMP_24

SITE: 0021_PFAS

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS: 5 Days

Biohazard info:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

°C

Other comments:

057	0021_QC402_240410	HDPE (no PTFE)	20 mL	00352312010986	Grey	No
058	0021_QC403_240411	HDPE (no PTFE)	125 mL	00352208100382	Grey	No
058	0021_QC403_240411	HDPE (no PTFE)	125 mL	00352208100411	Grey	No
059	0021_QC404_240412	HDPE (no PTFE)	125 mL	00352208100181	Grey	No
059	0021_QC404_240412	HDPE (no PTFE)	125 mL	00352208100191	Grey	No

Total Bottle Count: ALS: 193, Non ALS: 0



CERTIFICATE OF ANALYSIS

Work Order : **ES2411995**

Amendment : **2**

Client : **AECOM AUSTRALIA PTY LTD**

Contact : [REDACTED]

Address : **LEVEL 21 420 GEORGE STREET
SYDNEY NSW, AUSTRALIA 2000**

Telephone : ----

Project : **ACT_0021_PFASOMP_24**

Order number : **60612562_4.1**

C-O-C number : **66273**

Sampler : [REDACTED] [REDACTED]

Site : **0021 SD**

Quote number : **SY/139/19 v4 60612562_4.1**

No. of samples received : **51**

No. of samples analysed : **51**

Page : 1 of 25

Laboratory : **Environmental Division Sydney**

Contact : [REDACTED]

Address : **277-289 Woodpark Road Smithfield NSW Australia 2164**

Telephone : **+61 2 8784 8555**

Date Samples Received : **15-Apr-2024 14:00**

Date Analysis Commenced : **16-Apr-2024**

Issue Date : **20-May-2024 18:13**



Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted, unless the sampling was conducted by ALS. This document shall not be reproduced, except in full.

This Certificate of Analysis contains the following information:

- General Comments
- Analytical Results
- Surrogate Control Limits

Additional information pertinent to this report will be found in the following separate attachments: Quality Control Report, QA/QC Compliance Assessment to assist with Quality Review and Sample Receipt Notification.

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	Position	Accreditation Category
[REDACTED]	LCMS Coordinator	Sydney Inorganics, Smithfield, NSW
	LCMS Coordinator	Sydney Organics, Smithfield, NSW



General Comments

The analytical procedures used by ALS have been developed from established internationally recognised procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are fully validated and are often at the client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis.

Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

When sampling time information is not provided by the client, sampling dates are shown without a time component. In these instances, the time component has been assumed by the laboratory for processing purposes.

Where a result is required to meet compliance limits the associated uncertainty must be considered. Refer to the ALS Contract for details.

Key : CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.

LOR = Limit of reporting

^ = This result is computed from individual analyte detections at or above the level of reporting

ø = ALS is not NATA accredited for these tests.

~ = Indicates an estimated value.

- EP231X: LOR's raised for particular samples due to high moisture content.
- Amendment (02/05/2024): This report has been amended and re-released to allow sample 0021_SD017_240412 add to this work order and will be analyse for PFAS. All analysis results are as per the previous report.
- Amendment (20/05/2024): This report has been amended as a result of a request to change sample identification numbers (IDs) and sampling times for samples 007, 0014, 042 & 050. All analysis results are as per the previous report.
- EP231: Stable isotope enriched internal standards are added to samples prior to extraction. Target compounds have a direct analogous internal standard with the exception of PFPeS, PFHpA, PFDS, PFTrDA and 10:2 FTS. These compounds use an internal standard that is chemically related and has a retention time close to that of the target compound. The DQO for internal standard response is 50-150% of that established at initial calibration or as per USEPA 1633 limits where LISTED. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. These practices are in line with recommendations in the National Environmental Management Plan for PFAS and also conform to QSM 5.4 (US DoD) requirements.



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD001_240410	0021_SD002_240411	0021_SD003_240411	0021_SD004_240412	0021_SD005_240412
Sampling date / time				10-Apr-2024 14:00	11-Apr-2024 09:04	11-Apr-2024 09:39	12-Apr-2024 08:25	12-Apr-2024 08:05
Compound	CAS Number	LOR	Unit	ES2411995-001	ES2411995-002	ES2411995-003	ES2411995-004	ES2411995-005
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	27.2	28.9	38.3	31.7	37.3
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	0.0004	<0.0002	<0.0002	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	0.0007	<0.0002	<0.0002	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0015	0.0118	0.0010	<0.0002	<0.0002
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	0.0018	<0.0002	<0.0002	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0178	0.105	0.0078	0.0018	0.0005
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	0.0004	0.0003	0.0002	<0.0002	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.0003	<0.0002	<0.0002	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	0.0010	<0.0002	<0.0002	<0.0002
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	0.0009	<0.0002	<0.0002	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	0.0002	<0.0002	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD001_240410	0021_SD002_240411	0021_SD003_240411	0021_SD004_240412	0021_SD005_240412
Sampling date / time				10-Apr-2024 14:00	11-Apr-2024 09:04	11-Apr-2024 09:39	12-Apr-2024 08:25	12-Apr-2024 08:05
Compound	CAS Number	LOR	Unit	ES2411995-001	ES2411995-002	ES2411995-003	ES2411995-004	ES2411995-005
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	0.0197	0.122	0.0090	0.0018	0.0005
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	0.0193	0.117	0.0088	0.0018	0.0005
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	0.0193	0.119	0.0088	0.0018	0.0005
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	85.2	90.7	89.6	92.4	96.4
13C8-PFOA	----	0.0002	%	100	90.5	89.4	94.1	97.6



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD006_240410	0021_SD007_240410	0021_SD009_240410	0021_SD012_240412	0021_SD013_240412
Sampling date / time				10-Apr-2024 12:20	10-Apr-2024 11:58	10-Apr-2024 11:47	12-Apr-2024 08:05	12-Apr-2024 07:58
Compound	CAS Number	LOR	Unit	ES2411995-006	ES2411995-007	ES2411995-008	ES2411995-009	ES2411995-010
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	89.8	68.5	52.2	22.7	13.0
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	0.0003	<0.0002	<0.0002	<0.0002	0.0004
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	0.0006	<0.0002	<0.0002	<0.0002	0.0004
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0173	0.0009	0.0030	<0.0002	0.0063
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	0.0006	0.0008	<0.0002	<0.0002	0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.131	0.0074	0.0182	<0.0002	0.0124
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	0.0082	<0.0002	0.0002	<0.0002	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	0.003	0.003	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	0.0014	<0.0002	<0.0002	<0.0002	0.0003
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	0.0018	<0.0002	<0.0002	<0.0002	0.0006
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	0.0004	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	0.0004	<0.0002	<0.0002	<0.0002	0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	0.0004	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTriDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0006	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	0.0013	<0.0002	<0.0002	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD006_240410	0021_SD007_240410	0021_SD009_240410	0021_SD012_240412	0021_SD013_240412
Sampling date / time				10-Apr-2024 12:20	10-Apr-2024 11:58	10-Apr-2024 11:47	12-Apr-2024 08:05	12-Apr-2024 07:58
Compound	CAS Number	LOR	Unit	ES2411995-006	ES2411995-007	ES2411995-008	ES2411995-009	ES2411995-010
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0006	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0006	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0006	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0006	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	0.167	0.0121	0.0214	<0.0002	0.0208
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	0.148	0.0083	0.0212	<0.0002	0.0187
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	0.156	0.0113	0.0212	<0.0002	0.0202
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	90.2	96.2	86.0	91.8	91.4
13C8-PFOA	----	0.0002	%	101	80.7	93.8	103	98.3



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD015_240411	0021_SD016_240412	0021_SD018_240410	0021_SD020_240410	0021_SD021_240410
Sampling date / time				11-Apr-2024 10:41	12-Apr-2024 09:14	10-Apr-2024 08:40	10-Apr-2024 09:12	10-Apr-2024 10:00
Compound	CAS Number	LOR	Unit	ES2411995-011	ES2411995-012	ES2411995-013	ES2411995-014	ES2411995-015
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	0.1	%	23.2	19.9	63.4	70.5	29.2
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.0003	<0.0002	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.0004	<0.0002	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0021	0.0027	0.0082	0.0013	0.0010
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	0.0002	<0.0002	0.0004	<0.0002	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0201	0.0159	0.0534	0.0022	0.0048
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.0005	<0.0002	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	0.0003	<0.0002	<0.0002	<0.0002
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.0002	<0.0002	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD015_240411	0021_SD016_240412	0021_SD018_240410	0021_SD020_240410	0021_SD021_240410
Sampling date / time				11-Apr-2024 10:41	12-Apr-2024 09:14	10-Apr-2024 08:40	10-Apr-2024 09:12	10-Apr-2024 10:00
Compound	CAS Number	LOR	Unit	ES2411995-011	ES2411995-012	ES2411995-013	ES2411995-014	ES2411995-015
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	0.0224	0.0189	0.0634	0.0035	0.0058
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	0.0222	0.0186	0.0616	0.0035	0.0058
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	0.0222	0.0189	0.0621	0.0035	0.0058
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	91.6	94.8	101	104	97.9
13C8-PFOA	----	0.0002	%	104	105	93.0	105	101



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD023_240410	0021_SD028_240409	0021_SD029_240410	0021_SD030_240409	0021_SD031_240409
Sampling date / time				10-Apr-2024 10:57	09-Apr-2024 09:40	10-Apr-2024 08:15	09-Apr-2024 14:21	09-Apr-2024 15:03
Compound	CAS Number	LOR	Unit	ES2411995-016	ES2411995-017	ES2411995-018	ES2411995-019	ES2411995-020
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	56.6	50.3	46.6	24.1	22.6
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0026	<0.0002	<0.0002	0.0003	<0.0002
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0290	0.0002	<0.0002	0.0024	<0.0002
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	0.0003	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	0.0009	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	0.0010	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	0.0010	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD023_240410	0021_SD028_240409	0021_SD029_240410	0021_SD030_240409	0021_SD031_240409
Sampling date / time				10-Apr-2024 10:57	09-Apr-2024 09:40	10-Apr-2024 08:15	09-Apr-2024 14:21	09-Apr-2024 15:03
Compound	CAS Number	LOR	Unit	ES2411995-016	ES2411995-017	ES2411995-018	ES2411995-019	ES2411995-020
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	0.0020	<0.0005	0.0012	<0.0005	0.0014
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	0.0370	0.0002	0.0012	0.0027	0.0014
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	0.0316	0.0002	<0.0002	0.0027	<0.0002
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	0.0319	0.0002	<0.0002	0.0027	<0.0002
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	86.2	100	89.8	96.7	95.2
13C8-PFOA	----	0.0002	%	101	115	91.6	90.4	84.3



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD035_240409	0021_SD036_240409	0021_SD037_240409	0021_SD040_240410	0021_SD044_240409
Sampling date / time				09-Apr-2024 14:35	09-Apr-2024 12:40	09-Apr-2024 12:20	10-Apr-2024 08:41	09-Apr-2024 11:20
Compound	CAS Number	LOR	Unit	ES2411995-021	ES2411995-022	ES2411995-023	ES2411995-024	ES2411995-025
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	43.7	44.5	22.0	60.2	21.8
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	0.0003	<0.0002	<0.0002	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	0.0003	<0.0002	<0.0002	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0044	0.0153	<0.0002	0.0008	<0.0002
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	0.0005	0.0040	<0.0002	<0.0002	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0322	0.446	<0.0002	0.0106	0.0002
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	0.0011	0.0109	<0.0002	0.0004	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.0009	<0.0002	<0.0002	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	0.0020	<0.0002	<0.0002	<0.0002
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	0.0012	<0.0002	<0.0002	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	0.0003	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	0.0004	0.0020	<0.0002	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD035_240409	0021_SD036_240409	0021_SD037_240409	0021_SD040_240410	0021_SD044_240409
Sampling date / time				09-Apr-2024 14:35	09-Apr-2024 12:40	09-Apr-2024 12:20	10-Apr-2024 08:41	09-Apr-2024 11:20
Compound	CAS Number	LOR	Unit	ES2411995-021	ES2411995-022	ES2411995-023	ES2411995-024	ES2411995-025
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	0.0386	0.484	<0.0002	0.0120	0.0002
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	0.0366	0.461	<0.0002	0.0114	0.0002
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	0.0366	0.467	<0.0002	0.0114	0.0002
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	96.8	99.2	98.0	102	98.3
13C8-PFOA	----	0.0002	%	104	104	103	104	106



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD046_240409	0021_SD047_240409	0021_SD048_240409	0021_SD049_240410	0021_SD050_240410
Sampling date / time				09-Apr-2024 11:00	09-Apr-2024 15:10	09-Apr-2024 15:45	10-Apr-2024 13:30	10-Apr-2024 10:47
Compound	CAS Number	LOR	Unit	ES2411995-026	ES2411995-027	ES2411995-028	ES2411995-029	ES2411995-030
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	20.4	18.0	41.4	45.7	43.9
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.0003	0.0005	0.0005	<0.0002
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD046_240409	0021_SD047_240409	0021_SD048_240409	0021_SD049_240410	0021_SD050_240410
Sampling date / time				09-Apr-2024 11:00	09-Apr-2024 15:10	09-Apr-2024 15:45	10-Apr-2024 13:30	10-Apr-2024 10:47
Compound	CAS Number	LOR	Unit	ES2411995-026	ES2411995-027	ES2411995-028	ES2411995-029	ES2411995-030
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	<0.0002	0.0003	0.0005	0.0005	<0.0002
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	<0.0002	0.0003	0.0005	0.0005	<0.0002
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	<0.0002	0.0003	0.0005	0.0005	<0.0002
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	96.8	102	111	111	105
13C8-PFOA	----	0.0002	%	108	105	104	112	107



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD052_240408	0021_SD054_240408	0021_SD058_240410	0021_SD059_240410	0021_SD066_240410
Sampling date / time				08-Apr-2024 14:53	08-Apr-2024 14:29	10-Apr-2024 11:03	10-Apr-2024 11:18	10-Apr-2024 09:00
Compound	CAS Number	LOR	Unit	ES2411995-031	ES2411995-032	ES2411995-033	ES2411995-034	ES2411995-035
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	18.8	88.7	74.5	19.3	74.1
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	0.0003	<0.0002	<0.0002	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	0.0003	<0.0002	<0.0002	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.0082	0.0012	<0.0002	0.0028
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.0003	<0.0002	<0.0002	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	0.0004	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0006	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD052_240408	0021_SD054_240408	0021_SD058_240410	0021_SD059_240410	0021_SD066_240410
Sampling date / time				08-Apr-2024 14:53	08-Apr-2024 14:29	10-Apr-2024 11:03	10-Apr-2024 11:18	10-Apr-2024 09:00
Compound	CAS Number	LOR	Unit	ES2411995-031	ES2411995-032	ES2411995-033	ES2411995-034	ES2411995-035
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	0.0008	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0006	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0006	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0006	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	<0.0002	0.0103	0.0012	<0.0002	0.0028
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	<0.0002	0.0082	0.0012	<0.0002	0.0028
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	<0.0002	0.0085	0.0012	<0.0002	0.0028
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	102	97.0	98.4	106	99.6
13C8-PFOA	----	0.0002	%	106	108	99.8	111	107



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD067_240410	0021_SD068_240410	0021_SD069_240410	0021_SD070_240410	0021_SD073_240409
Sampling date / time				10-Apr-2024 09:15	10-Apr-2024 09:30	10-Apr-2024 09:45	10-Apr-2024 10:00	09-Apr-2024 15:53
Compound	CAS Number	LOR	Unit	ES2411995-036	ES2411995-037	ES2411995-038	ES2411995-039	ES2411995-040
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	49.3	37.7	79.2	64.8	34.8
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	0.0003	0.0044	0.0010	<0.0002
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0004	0.0049	0.0404	0.0039	<0.0002
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.0009	<0.0002	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD067_240410	0021_SD068_240410	0021_SD069_240410	0021_SD070_240410	0021_SD073_240409
Sampling date / time				10-Apr-2024 09:15	10-Apr-2024 09:30	10-Apr-2024 09:45	10-Apr-2024 10:00	09-Apr-2024 15:53
Compound	CAS Number	LOR	Unit	ES2411995-036	ES2411995-037	ES2411995-038	ES2411995-039	ES2411995-040
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	0.0004	0.0052	0.0457	0.0049	<0.0002
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	0.0004	0.0052	0.0448	0.0049	<0.0002
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	0.0004	0.0052	0.0448	0.0049	<0.0002
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	107	101	95.6	101	104
13C8-PFOA	----	0.0002	%	106	107	99.7	104	107



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD075_240409	0021_SD080_240409	0021_SD093_240409	0021_SD110_240412	0021_SD111_240409
Sampling date / time				09-Apr-2024 10:30	09-Apr-2024 09:25	09-Apr-2024 14:48	12-Apr-2024 08:16	09-Apr-2024 12:00
Compound	CAS Number	LOR	Unit	ES2411995-041	ES2411995-042	ES2411995-043	ES2411995-044	ES2411995-045
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	20.7	27.8	32.1	24.7	27.0
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	0.0005
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	0.0002	0.0010
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	0.0046	0.0181
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	0.0002	0.0020
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	0.0005	0.170
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	0.0021
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	0.0009
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	0.0005	0.0005
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	0.0003



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_SD075_240409	0021_SD080_240409	0021_SD093_240409	0021_SD110_240412	0021_SD111_240409
Sampling date / time				09-Apr-2024 10:30	09-Apr-2024 09:25	09-Apr-2024 14:48	12-Apr-2024 08:16	09-Apr-2024 12:00
Compound	CAS Number	LOR	Unit	ES2411995-041	ES2411995-042	ES2411995-043	ES2411995-044	ES2411995-045
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	0.0060	0.196
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	0.0051	0.188
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	0.0056	0.190
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	103	97.6	88.8	96.6	90.7
13C8-PFOA	----	0.0002	%	109	101	95.4	106	108



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_QC102_240409	0021_QC108_240410	0021_QC113_240412	0021_QC107_240410	0021_QC115_240412
Sampling date / time				09-Apr-2024 15:06	10-Apr-2024 13:32	12-Apr-2024 07:59	10-Apr-2024 09:45	12-Apr-2024 08:10
Compound	CAS Number	LOR	Unit	ES2411995-046	ES2411995-047	ES2411995-048	ES2411995-049	ES2411995-050
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	-----	0.1	%	23.3	52.2	13.9	83.0	38.6
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.0004	<0.0002	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.0008	<0.0002	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	0.0083	0.0052	0.0002
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.0005	<0.0002	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.0003	0.0233	0.0460	0.0013
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	<0.001	<0.001	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.0003	<0.0002	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.0009	<0.0002	<0.0002
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.0004	<0.0002	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotridecanoic acid (PFTriDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0006	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

				0021_QC102_240409	0021_QC108_240410	0021_QC113_240412	0021_QC107_240410	0021_QC115_240412
Sampling date / time				09-Apr-2024 15:06	10-Apr-2024 13:32	12-Apr-2024 07:59	10-Apr-2024 09:45	12-Apr-2024 08:10
Compound	CAS Number	LOR	Unit	ES2411995-046	ES2411995-047	ES2411995-048	ES2411995-049	ES2411995-050
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0006	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0006	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0006	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0006	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005
EP231P: PFAS Sums								
Sum of PFAS	----	0.0002	mg/kg	<0.0002	0.0003	0.0349	0.0512	0.0015
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	<0.0002	0.0003	0.0316	0.0512	0.0015
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	<0.0002	0.0003	0.0336	0.0512	0.0015
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.0002	%	102	104	100	114	108
13C8-PFOA	----	0.0002	%	106	108	108	102	108



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

0021_SD017_240412

Sampling date / time

12-Apr-2024 09:20

Compound

CAS Number

LOR

Unit

ES2411995-051

Result

EA055: Moisture Content (Dried @ 105-110°C)

Moisture Content

0.1

%

9.4

EP231A: Perfluoroalkyl Sulfonic Acids

Perfluorobutane sulfonic acid
(PFBS)

375-73-5

0.0002

mg/kg

<0.0002

Perfluoropentane sulfonic acid
(PFPeS)

2706-91-4

0.0002

mg/kg

<0.0002

Perfluorohexane sulfonic acid
(PFHxS)

355-46-4

0.0002

mg/kg

0.0034

Perfluoroheptane sulfonic acid
(PFHpS)

375-92-8

0.0002

mg/kg

<0.0002

Perfluorooctane sulfonic acid
(PFOS)

1763-23-1

0.0002

mg/kg

0.0004

Perfluorodecane sulfonic acid
(PFDS)

335-77-3

0.0002

mg/kg

<0.0002

EP231B: Perfluoroalkyl Carboxylic Acids

Perfluorobutanoic acid (PFBA)

375-22-4

0.001

mg/kg

<0.001

Perfluoropentanoic acid (PFPeA)

2706-90-3

0.0002

mg/kg

<0.0002

Perfluorohexanoic acid (PFHxA)

307-24-4

0.0002

mg/kg

<0.0002

Perfluoroheptanoic acid (PFHpA)

375-85-9

0.0002

mg/kg

<0.0002

Perfluorooctanoic acid (PFOA)

335-67-1

0.0002

mg/kg

0.0004

Perfluorononanoic acid (PFNA)

375-95-1

0.0002

mg/kg

<0.0002

Perfluorodecanoic acid (PFDA)

335-76-2

0.0002

mg/kg

<0.0002

Perfluoroundecanoic acid
(PFUnDA)

2058-94-8

0.0002

mg/kg

<0.0002

Perfluorododecanoic acid
(PFDoDA)

307-55-1

0.0002

mg/kg

<0.0002

Perfluorotridecanoic acid
(PFTrDA)

72629-94-8

0.0002

mg/kg

<0.0002

Perfluorotetradecanoic acid
(PFTeDA)

376-06-7

0.0005

mg/kg

<0.0005

EP231C: Perfluoroalkyl Sulfonamides

Perfluorooctane sulfonamide
(FOSA)

754-91-6

0.0002

mg/kg

<0.0002



Analytical Results

Sub-Matrix: SEDIMENT
 (Matrix: SOIL)

Sample ID

0021_SD017_240412

Sampling date / time

12-Apr-2024 09:20

Compound

CAS Number

LOR

Unit

ES2411995-051

Result

EP231C: Perfluoroalkyl Sulfonamides - Continued

N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	----	----	----	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	----	----	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	----	----	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	----	----	----	----

EP231D: (n:2) Fluorotelomer Sulfonic Acids

4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	----	----	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	----	----	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	----	----	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	----	----	----	----

EP231P: PFAS Sums

Sum of PFAS	----	0.0002	mg/kg	0.0042	----	----	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg	0.0038	----	----	----	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg	0.0042	----	----	----	----

EP231S: PFAS Surrogate

13C4-PFOS	----	0.0002	%	100	----	----	----	----
13C8-PFOA	----	0.0002	%	117	----	----	----	----



Surrogate Control Limits

Sub-Matrix: SEDIMENT		Recovery Limits (%)	
Compound	CAS Number	Low	High
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120



QUALITY CONTROL REPORT

Work Order : **ES2411995**

Page : 1 of 18

Amendment : **2**

Client : **AECOM AUSTRALIA PTY LTD**
Contact : **[REDACTED]**
Address : **LEVEL 21 420 GEORGE STREET
SYDNEY NSW, AUSTRALIA 2000**

Laboratory : **Environmental Division Sydney**
Contact : **[REDACTED]**
Address : **277-289 Woodpark Road Smithfield NSW Australia 2164**

Telephone : **----**
Project : **ACT_0021_PFASOMP_24**
Order number : **60612562_4.1**
C-O-C number : **66273**
Sampler : **[REDACTED]**
Site : **0021 SD**
Quote number : **SY/139/19 v4 60612562_4.1**
No. of samples received : **51**
No. of samples analysed : **51**

Telephone : **+61 2 8784 8555**
Date Samples Received : **15-Apr-2024**
Date Analysis Commenced : **16-Apr-2024**
Issue Date : **20-May-2024**



Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted, unless the sampling was conducted by ALS. This document shall not be reproduced, except in full.

This Quality Control Report contains the following information:

- Laboratory Duplicate (DUP) Report; Relative Percentage Difference (RPD) and Acceptance Limits
- Method Blank (MB) and Laboratory Control Spike (LCS) Report; Recovery and Acceptance Limits
- Matrix Spike (MS) Report; Recovery and Acceptance Limits

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	Position	Accreditation Category
[REDACTED]	LCMS Coordinator	Sydney Inorganics, Smithfield, NSW
[REDACTED]	LCMS Coordinator	Sydney Organics, Smithfield, NSW



General Comments

The analytical procedures used by ALS have been developed from established internationally recognised procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are fully validated and are often at the client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis. Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

Key : Anonymous = Refers to samples which are not specifically part of this work order but formed part of the QC process lot

CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.

LOR = Limit of reporting

RPD = Relative Percentage Difference

= Indicates failed QC

* = The final LOR has been raised due to dilution or other sample specific cause; adjusted LOR is shown in brackets. The duplicate ranges for Acceptable RPD% are applied to the final LOR where applicable.

Laboratory Duplicate (DUP) Report

The quality control term Laboratory Duplicate refers to a randomly selected intralaboratory split. Laboratory duplicates provide information regarding method precision and sample heterogeneity. The permitted ranges for the Relative Percent Deviation (RPD) of Laboratory Duplicates are specified in ALS Method QWI-EN/38 and are dependent on the magnitude of results in comparison to the level of reporting: Result < 10 times LOR: No Limit; Result between 10 and 20 times LOR: 0% - 50%; Result > 20 times LOR: 0% - 20%.

Sub-Matrix: SOIL				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 5727819)									
ES2411995-003	0021_SD003_240411	EA055: Moisture Content	----	0.1	%	38.3	40.8	6.3	0% - 20%
ES2411995-014	0021_SD020_240410	EA055: Moisture Content	----	0.1	%	70.5	76.9	8.7	0% - 20%
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 5727820)									
ES2411995-023	0021_SD037_240409	EA055: Moisture Content	----	0.1	%	22.0	21.2	3.3	0% - 20%
ES2411995-034	0021_SD059_240410	EA055: Moisture Content	----	0.1	%	19.3	19.1	1.3	0% - 20%
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 5734854)									
ES2411995-043	0021_SD093_240409	EA055: Moisture Content	----	0.1	%	32.1	28.9	10.4	0% - 20%
ES2412179-001	Anonymous	EA055: Moisture Content	----	0.1	%	3.4	2.8	18.9	0% - 20%
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 5739379)									
ES2412112-001	Anonymous	EA055: Moisture Content	----	0.1	%	31.8	35.8	12.0	0% - 20%
ES2412685-004	Anonymous	EA055: Moisture Content	----	0.1	%	18.1	17.0	6.0	0% - 20%
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 5772779)									
ES2413418-010	Anonymous	EA055: Moisture Content	----	0.1 (1.0)*	%	26.2	26.7	1.8	0% - 20%
ME2400744-002	Anonymous	EA055: Moisture Content	----	0.1	%	13.5	15.2	11.9	0% - 20%
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5728718)									
ES2411995-001	0021_SD001_240410	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0015	0.0019	23.8	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0178	0.0211	17.3	0% - 20%



Sub-Matrix: SOIL				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5728718) - continued									
ES2411995-001	0021_SD001_240410	EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	0.0004	0.0005	0.0	No Limit
ES2411995-011	0021_SD015_240411	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0021	0.0014	41.8	0% - 50%
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0201	0.0175	14.1	0% - 20%
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5728723)									
ES2411995-021	0021_SD035_240409	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0044	0.0046	4.0	0% - 20%
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	0.0005	0.0006	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0322	0.0356	9.9	0% - 20%
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	0.0011	0.0012	12.2	No Limit
ES2411995-031	0021_SD052_240408	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5728732)									
ES2411995-041	0021_SD075_240409	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5769456)									
ES2411995-051	0021_SD017_240412	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0034	0.0036	6.2	0% - 50%
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0004	0.0005	24.9	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5728718)									
ES2411995-001	0021_SD001_240410	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit



Sub-Matrix: SOIL				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5728718) - continued									
ES2411995-001	0021_SD001_240410	EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.0	No Limit
ES2411995-011	0021_SD015_240411	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5728723)									
ES2411995-021	0021_SD035_240409	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	0.0002	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.0	No Limit
ES2411995-031	0021_SD052_240408	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit



Sub-Matrix: SOIL				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5728723) - continued									
ES2411995-031	0021_SD052_240408	EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5728732)									
ES2411995-041	0021_SD075_240409	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5769456)									
ES2411995-051	0021_SD017_240412	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	0.0004	0.0005	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5728718)									
ES2411995-001	0021_SD001_240410	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit



Sub-Matrix: SOIL				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5728718) - continued									
ES2411995-001	0021_SD001_240410	EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
ES2411995-011	0021_SD015_240411	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5728723)									
ES2411995-021	0021_SD035_240409	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	0.0004	0.0004	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
ES2411995-031	0021_SD052_240408	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit



Sub-Matrix: SOIL				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5728723) - continued									
ES2411995-031	0021_SD052_240408	EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5728732)									
ES2411995-041	0021_SD075_240409	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5769456)									
ES2411995-051	0021_SD017_240412	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5728718)									
ES2411995-001	0021_SD001_240410	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit



Sub-Matrix: SOIL				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5728718) - continued									
ES2411995-001	0021_SD001_240410	EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
ES2411995-011	0021_SD015_240411	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5728723)									
ES2411995-021	0021_SD035_240409	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
ES2411995-031	0021_SD052_240408	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5728732)									
ES2411995-041	0021_SD075_240409	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5769456)									
ES2411995-051	0021_SD017_240412	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit



Sub-Matrix: SOIL				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5769456) - continued									
ES2411995-051	0021_SD017_240412	EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.0	No Limit



Method Blank (MB) and Laboratory Control Sample (LCS) Report

The quality control term Method / Laboratory Blank refers to an analyte free matrix to which all reagents are added in the same volumes or proportions as used in standard sample preparation. The purpose of this QC parameter is to monitor potential laboratory contamination. The quality control term Laboratory Control Sample (LCS) refers to a certified reference material, or a known interference free matrix spiked with target analytes. The purpose of this QC parameter is to monitor method precision and accuracy independent of sample matrix. Dynamic Recovery Limits are based on statistical evaluation of processed LCS.

Sub-Matrix: **SOIL**

Sub-Matrix: SOIL				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%) Low High	
Method: Compound	CAS Number	LOR	Unit	Result				
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5728718)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	0.00125 mg/kg	88.2	72.0	128
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	93.8	73.0	123
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	92.7	67.0	130
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	96.1	70.0	132
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	87.3	68.0	136
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	101	59.0	134
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5728723)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	0.00125 mg/kg	88.8	72.0	128
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	92.0	73.0	123
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	89.6	67.0	130
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	89.7	70.0	132
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	89.3	68.0	136
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	91.4	59.0	134
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5728732)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	0.00125 mg/kg	82.2	72.0	128
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	93.3	73.0	123
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	78.7	67.0	130
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	94.8	70.0	132
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	87.4	68.0	136
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	90.3	59.0	134
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5769456)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	0.00125 mg/kg	85.5	72.0	128
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	91.1	73.0	123
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	78.5	67.0	130
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	101	70.0	132
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	93.2	68.0	136
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	102	59.0	134
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5728718)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	0.00625 mg/kg	87.5	71.0	135
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	87.7	69.0	132

Sub-Matrix: SOIL				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%) Low High	
Method: Compound	CAS Number	LOR	Unit	Result				
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5728718) - continued								
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	88.4	70.0	132
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	99.7	71.0	131
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	98.1	69.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	89.2	72.0	129
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	0.00125 mg/kg	95.5	69.0	133
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	96.8	64.0	136
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	102	69.0	135
EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	93.5	66.0	139
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	116	69.0	133
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5728723)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	0.00625 mg/kg	96.2	71.0	135
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	97.7	69.0	132
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	87.4	70.0	132
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	94.6	71.0	131
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	95.1	69.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	98.8	72.0	129
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	0.00125 mg/kg	94.4	69.0	133
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	99.6	64.0	136
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	102	69.0	135
EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	98.6	66.0	139
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	98.1	69.0	133
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5728732)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	0.00625 mg/kg	90.8	71.0	135
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	95.4	69.0	132
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	72.9	70.0	132
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	93.8	71.0	131
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	92.0	69.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	91.2	72.0	129
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	0.00125 mg/kg	93.1	69.0	133
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	104	64.0	136
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	117	69.0	135
EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	104	66.0	139
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	108	69.0	133
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5769456)								

Sub-Matrix: SOIL				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%)	Acceptable Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result		LCS	Low	High
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5769456) - continued								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	0.00625 mg/kg	82.3	71.0	135
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	94.5	69.0	132
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	84.4	70.0	132
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	85.3	71.0	131
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	98.8	69.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	101	72.0	129
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	0.00125 mg/kg	92.6	69.0	133
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	106	64.0	136
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	119	69.0	135
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	119	66.0	139
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	98.1	69.0	133
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5728718)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	94.9	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	0.00312 mg/kg	101	71.6	129
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	125	69.8	131
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	93.8	68.7	130
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	95.4	65.1	134
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	108	63.0	144
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	82.1	61.0	139
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5728723)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	94.6	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	0.00312 mg/kg	106	71.6	129
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	95.5	69.8	131
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	109	68.7	130
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	98.7	65.1	134
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	103	63.0	144
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	96.9	61.0	139
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5728732)								



Sub-Matrix: **SOIL**

Sub-Matrix: SOIL				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%) Low High	
Method: Compound	CAS Number	LOR	Unit	Result				
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5728732) - continued								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	90.2	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	0.00312 mg/kg	90.2	71.6	129
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	114	69.8	131
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	76.7	68.7	130
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	98.6	65.1	134
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	114	63.0	144
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	107	61.0	139
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5769456)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	99.5	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	0.00312 mg/kg	108	71.6	129
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	100	69.8	131
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	96.3	68.7	130
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	98.3	65.1	134
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	86.9	63.0	144
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	98.7	61.0	139
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5728718)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	107	62.0	145
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	0.00125 mg/kg	98.4	64.0	140
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	90.5	65.0	137
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	0.00125 mg/kg	98.4	69.2	143
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5728723)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	75.7	62.0	145
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	0.00125 mg/kg	83.8	64.0	140
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	115	65.0	137
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	0.00125 mg/kg	92.2	69.2	143
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5728732)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	102	62.0	145
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	0.00125 mg/kg	86.9	64.0	140



Sub-Matrix: **SOIL**

Sub-Matrix: SOIL				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%) Low High	
Method: Compound	CAS Number	LOR	Unit	Result				
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5728732) - continued								
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	82.5	65.0	137
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	0.00125 mg/kg	80.3	69.2	143
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5769456)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	76.9	62.0	145
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	0.00125 mg/kg	107	64.0	140
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	80.2	65.0	137
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	0.00125 mg/kg	93.4	69.2	143

Matrix Spike (MS) Report

The quality control term Matrix Spike (MS) refers to an intralaboratory split sample spiked with a representative set of target analytes. The purpose of this QC parameter is to monitor potential matrix effects on analyte recoveries. Static Recovery Limits as per laboratory Data Quality Objectives (DQOs). Ideal recovery ranges stated may be waived in the event of sample matrix interference.

Sub-Matrix: **SOIL**

Sub-Matrix: SOIL				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5728718)							
ES2411995-001	0021_SD001_240410	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.00125 mg/kg	92.4	72.0	128
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.00125 mg/kg	99.9	73.0	123
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.00125 mg/kg	119	67.0	130
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.00125 mg/kg	113	70.0	132
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.00125 mg/kg	# Not Determined	68.0	136
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.00125 mg/kg	93.7	59.0	134
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5728723)							
ES2411995-021	0021_SD035_240409	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.00125 mg/kg	89.9	72.0	128
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.00125 mg/kg	87.4	73.0	123
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.00125 mg/kg	84.3	67.0	130
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.00125 mg/kg	85.7	70.0	132
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.00125 mg/kg	# Not Determined	68.0	136
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.00125 mg/kg	89.4	59.0	134
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5728732)							
ES2411995-041	0021_SD075_240409	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.00125 mg/kg	83.1	72.0	128
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.00125 mg/kg	107	73.0	123
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.00125 mg/kg	84.1	67.0	130
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.00125 mg/kg	104	70.0	132
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.00125 mg/kg	91.4	68.0	136



Sub-Matrix: **SOIL**

Sub-Matrix: SOIL				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5728732) - continued							
ES2411995-041	0021_SD075_240409	EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.00125 mg/kg	109	59.0	134
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5769456)							
ES2411995-051	0021_SD017_240412	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.00125 mg/kg	90.8	72.0	128
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.00125 mg/kg	91.2	73.0	123
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.00125 mg/kg	101	67.0	130
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.00125 mg/kg	111	70.0	132
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.00125 mg/kg	104	68.0	136
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.00125 mg/kg	84.1	59.0	134
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5728718)							
ES2411995-001	0021_SD001_240410	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.00625 mg/kg	92.4	71.0	135
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.00125 mg/kg	92.4	69.0	132
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.00125 mg/kg	107	70.0	132
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.00125 mg/kg	102	71.0	131
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.00125 mg/kg	109	69.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.00125 mg/kg	98.0	72.0	129
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.00125 mg/kg	100	69.0	133
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.00125 mg/kg	106	64.0	136
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.00125 mg/kg	110	69.0	135
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.00125 mg/kg	111	66.0	139
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.00312 mg/kg	118	69.0	133
		EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5728723)					
ES2411995-021	0021_SD035_240409	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.00625 mg/kg	104	71.0	135
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.00125 mg/kg	99.8	69.0	132
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.00125 mg/kg	98.6	70.0	132
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.00125 mg/kg	99.1	71.0	131
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.00125 mg/kg	96.2	69.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.00125 mg/kg	100	72.0	129
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.00125 mg/kg	96.3	69.0	133
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.00125 mg/kg	100	64.0	136
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.00125 mg/kg	104	69.0	135
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.00125 mg/kg	111	66.0	139
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.00312 mg/kg	101	69.0	133
		EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5728732)					
ES2411995-041	0021_SD075_240409	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.00625 mg/kg	94.8	71.0	135
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.00125 mg/kg	90.1	69.0	132
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.00125 mg/kg	88.4	70.0	132
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.00125 mg/kg	96.8	71.0	131
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.00125 mg/kg	95.1	69.0	133



Sub-Matrix: **SOIL**

Sub-Matrix: SOIL				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5728732) - continued							
ES2411995-041	0021_SD075_240409	EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.00125 mg/kg	95.1	72.0	129
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.00125 mg/kg	107	69.0	133
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.00125 mg/kg	102	64.0	136
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.00125 mg/kg	107	69.0	135
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.00125 mg/kg	122	66.0	139
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.00312 mg/kg	103	69.0	133
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5769456)							
ES2411995-051	0021_SD017_240412	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.00625 mg/kg	83.7	71.0	135
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.00125 mg/kg	97.3	69.0	132
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.00125 mg/kg	86.9	70.0	132
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.00125 mg/kg	97.1	71.0	131
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.00125 mg/kg	104	69.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.00125 mg/kg	102	72.0	129
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.00125 mg/kg	96.9	69.0	133
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.00125 mg/kg	95.2	64.0	136
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.00125 mg/kg	120	69.0	135
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.00125 mg/kg	120	66.0	139
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.00312 mg/kg	96.2	69.0	133
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5728718)							
ES2411995-001	0021_SD001_240410	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.00125 mg/kg	105	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.00312 mg/kg	106	71.6	129
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.00312 mg/kg	119	69.8	131
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.00312 mg/kg	114	68.7	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.00312 mg/kg	111	65.1	134
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.00125 mg/kg	103	63.0	144
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.00125 mg/kg	87.7	61.0	139
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5728723)							
ES2411995-021	0021_SD035_240409	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.00125 mg/kg	92.4	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.00312 mg/kg	98.0	71.6	129
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.00312 mg/kg	105	69.8	131
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.00312 mg/kg	105	68.7	130



Sub-Matrix: SOIL				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5728723) - continued							
ES2411995-021	0021_SD035_240409	EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.00312 mg/kg	123	65.1	134
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.00125 mg/kg	89.5	63.0	144
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.00125 mg/kg	106	61.0	139
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5728732)							
ES2411995-041	0021_SD075_240409	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.00125 mg/kg	111	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.00312 mg/kg	85.8	71.6	129
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.00312 mg/kg	97.0	69.8	131
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.00312 mg/kg	91.2	68.7	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.00312 mg/kg	86.6	65.1	134
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.00125 mg/kg	90.6	63.0	144
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.00125 mg/kg	75.0	61.0	139
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5769456)							
ES2411995-051	0021_SD017_240412	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.00125 mg/kg	99.9	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.00312 mg/kg	109	71.6	129
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.00312 mg/kg	89.8	69.8	131
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.00312 mg/kg	88.4	68.7	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.00312 mg/kg	90.4	65.1	134
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.00125 mg/kg	91.4	63.0	144
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.00125 mg/kg	94.4	61.0	139
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5728718)							
ES2411995-001	0021_SD001_240410	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.00125 mg/kg	86.4	62.0	145
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.00125 mg/kg	108	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.00125 mg/kg	109	65.0	137
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.00125 mg/kg	111	69.2	143
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5728723)							
ES2411995-021	0021_SD035_240409	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.00125 mg/kg	75.6	62.0	145

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 Work Order : ES2411995 Amendment 2
 Client : AECOM AUSTRALIA PTY LTD
 Project : ACT_0021_PFASOMP_24



Sub-Matrix: SOIL				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5728723) - continued							
ES2411995-021	0021_SD035_240409	EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.00125 mg/kg	98.1	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.00125 mg/kg	95.7	65.0	137
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.00125 mg/kg	93.5	69.2	143
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5728732)							
ES2411995-041	0021_SD075_240409	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.00125 mg/kg	105	62.0	145
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.00125 mg/kg	85.4	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.00125 mg/kg	80.1	65.0	137
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.00125 mg/kg	95.7	69.2	143
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5769456)							
ES2411995-051	0021_SD017_240412	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.00125 mg/kg	81.6	62.0	145
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.00125 mg/kg	123	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.00125 mg/kg	81.2	65.0	137
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.00125 mg/kg	112	69.2	143



QA/QC Compliance Assessment to assist with Quality Review

Work Order : ES2411995

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Amendment : 2

Client : AECOM AUSTRALIA PTY LTD

Laboratory : Environmental Division Sydney

Contact : [REDACTED]

Telephone : +61 2 8784 8555

Project : ACT_0021_PFASOMP_24

Date Samples Received : 15-Apr-2024

Site : 0021 SD

Issue Date : 20-May-2024

Sampler : [REDACTED] [REDACTED]

No. of samples received : 51

Order number : 60612562_4.1

No. of samples analysed : 51

This report is automatically generated by the ALS LIMS through interpretation of the ALS Quality Control Report and several Quality Assurance parameters measured by ALS. This automated reporting highlights any non-conformances, facilitates faster and more accurate data validation and is designed to assist internal expert and external Auditor review. Many components of this report contribute to the overall DQO assessment and reporting for guideline compliance.

Brief method summaries and references are also provided to assist in traceability.

Summary of Outliers

Outliers : Quality Control Samples

This report highlights outliers flagged in the Quality Control (QC) Report.

- **NO** Method Blank value outliers occur.
- **NO** Duplicate outliers occur.
- **NO** Laboratory Control outliers occur.
- Matrix Spike outliers exist - please see following pages for full details.
- For all regular sample matrices, where applicable to the methodology, **NO** surrogate recovery outliers occur.

Outliers : Analysis Holding Time Compliance

- Analysis Holding Time Outliers exist - please see following pages for full details.

Outliers : Frequency of Quality Control Samples

- **NO** Quality Control Sample Frequency Outliers exist.



Outliers : Quality Control Samples

Duplicates, Method Blanks, Laboratory Control Samples and Matrix Spikes

Matrix: **SOIL**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Matrix Spike (MS) Recoveries							
EP231A: Perfluoroalkyl Sulfonic Acids	ES2411995--001	0021_SD001_240410	Perfluorooctane sulfonic acid (PFOS)	1763-23-1	Not Determined	----	MS recovery not determined, background level greater than or equal to 4x spike level.
EP231A: Perfluoroalkyl Sulfonic Acids	ES2411995--021	0021_SD035_240409	Perfluorooctane sulfonic acid (PFOS)	1763-23-1	Not Determined	----	MS recovery not determined, background level greater than or equal to 4x spike level.

Outliers : Analysis Holding Time Compliance

Matrix: **SOIL**

Method	Extraction / Preparation			Analysis		
Container / Client Sample ID(s)	Date extracted	Due for extraction	Days overdue	Date analysed	Due for analysis	Days overdue
EA055: Moisture Content (Dried @ 105-110°C)						
HDPE Soil Jar 0021_SD017_240412	----	----	----	07-May-2024	26-Apr-2024	11

Analysis Holding Time Compliance

If samples are identified below as having been analysed or extracted outside of recommended holding times, this should be taken into consideration when interpreting results.

This report summarizes extraction / preparation and analysis times and compares each with ALS recommended holding times (referencing USEPA SW 846, APHA, AS and NEPM) based on the sample container provided. Dates reported represent first date of extraction or analysis and preclude subsequent dilutions and reruns. A listing of breaches (if any) is provided herein.

Holding time for leachate methods (e.g. TCLP) vary according to the analytes reported. Assessment compares the leach date with the shortest analyte holding time for the equivalent soil method. These are: organics 14 days, mercury 28 days & other metals 180 days. A recorded breach does not guarantee a breach for all non-volatile parameters.

Holding times for **VOC in soils** vary according to analytes of interest. Vinyl Chloride and Styrene holding time is 7 days; others 14 days. A recorded breach does not guarantee a breach for all VOC analytes and should be verified in case the reported breach is a false positive or Vinyl Chloride and Styrene are not key analytes of interest/concern.

Matrix: **SOIL**

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis		
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EA055: Moisture Content (Dried @ 105-110°C)							
HDPE Soil Jar (EA055) 0021_SD052_240408,	0021_SD054_240408	08-Apr-2024	----	----	16-Apr-2024	22-Apr-2024	✔
HDPE Soil Jar (EA055) 0021_SD028_240409, 0021_SD031_240409, 0021_SD036_240409, 0021_SD044_240409, 0021_SD047_240409, 0021_SD073_240409	0021_SD030_240409, 0021_SD035_240409, 0021_SD037_240409, 0021_SD046_240409, 0021_SD048_240409,	09-Apr-2024	----	----	16-Apr-2024	23-Apr-2024	✔
HDPE Soil Jar (EA055) 0021_SD080_240409, 0021_SD111_240409,	0021_SD093_240409, 0021_QC102_240409	09-Apr-2024	----	----	18-Apr-2024	23-Apr-2024	✔



Matrix: **SOIL**

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EA055: Moisture Content (Dried @ 105-110°C) - Continued								
HDPE Soil Jar (EA055) 0021_SD075_240409	09-Apr-2024	----	----	----	20-Apr-2024	23-Apr-2024	✓	
HDPE Soil Jar (EA055) 0021_SD001_240410, 0021_SD007_240410, 0021_SD018_240410, 0021_SD021_240410, 0021_SD029_240410, 0021_SD049_240410, 0021_SD058_240410, 0021_SD066_240410, 0021_SD068_240410, 0021_SD070_240410,	0021_SD006_240410, 0021_SD009_240410, 0021_SD020_240410, 0021_SD023_240410, 0021_SD040_240410, 0021_SD050_240410, 0021_SD059_240410, 0021_SD067_240410, 0021_SD069_240410,	10-Apr-2024	----	----	----	16-Apr-2024	24-Apr-2024	✓
HDPE Soil Jar (EA055) 0021_QC108_240410,	0021_QC107_240410	10-Apr-2024	----	----	----	18-Apr-2024	24-Apr-2024	✓
HDPE Soil Jar (EA055) 0021_SD002_240411, 0021_SD015_240411	0021_SD003_240411,	11-Apr-2024	----	----	----	16-Apr-2024	25-Apr-2024	✓
HDPE Soil Jar (EA055) 0021_SD004_240412, 0021_SD012_240412, 0021_SD016_240412	0021_SD005_240412, 0021_SD013_240412,	12-Apr-2024	----	----	----	16-Apr-2024	26-Apr-2024	✓
HDPE Soil Jar (EA055) 0021_SD110_240412, 0021_QC115_240412	0021_QC113_240412,	12-Apr-2024	----	----	----	18-Apr-2024	26-Apr-2024	✓
HDPE Soil Jar (EA055) 0021_SD017_240412		12-Apr-2024	----	----	----	07-May-2024	26-Apr-2024	✗



Matrix: **SOIL**

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231A: Perfluoroalkyl Sulfonic Acids								
HDPE Soil Jar (EP231X) 0021_SD052_240408,	0021_SD054_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✓	23-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD075_240409, 0021_SD093_240409, 0021_QC102_240409	0021_SD080_240409, 0021_SD111_240409,	09-Apr-2024	18-Apr-2024	06-Oct-2024	✓	23-Apr-2024	28-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD028_240409, 0021_SD031_240409	0021_SD030_240409,	09-Apr-2024	19-Apr-2024	06-Oct-2024	✓	22-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD035_240409, 0021_SD037_240409, 0021_SD046_240409, 0021_SD048_240409,	0021_SD036_240409, 0021_SD044_240409, 0021_SD047_240409, 0021_SD073_240409	09-Apr-2024	19-Apr-2024	06-Oct-2024	✓	23-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_QC108_240410,	0021_QC107_240410	10-Apr-2024	18-Apr-2024	07-Oct-2024	✓	23-Apr-2024	28-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD001_240410, 0021_SD007_240410, 0021_SD018_240410, 0021_SD021_240410, 0021_SD029_240410	0021_SD006_240410, 0021_SD009_240410, 0021_SD020_240410, 0021_SD023_240410,	10-Apr-2024	19-Apr-2024	07-Oct-2024	✓	22-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD040_240410, 0021_SD050_240410, 0021_SD059_240410, 0021_SD067_240410, 0021_SD069_240410,	0021_SD049_240410, 0021_SD058_240410, 0021_SD066_240410, 0021_SD068_240410, 0021_SD070_240410	10-Apr-2024	19-Apr-2024	07-Oct-2024	✓	23-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD002_240411, 0021_SD015_240411	0021_SD003_240411,	11-Apr-2024	19-Apr-2024	08-Oct-2024	✓	22-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD017_240412		12-Apr-2024	06-May-2024	09-Oct-2024	✓	07-May-2024	15-Jun-2024	✓
HDPE Soil Jar (EP231X) 0021_SD110_240412, 0021_QC115_240412	0021_QC113_240412,	12-Apr-2024	18-Apr-2024	09-Oct-2024	✓	23-Apr-2024	28-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD004_240412, 0021_SD012_240412, 0021_SD016_240412	0021_SD005_240412, 0021_SD013_240412,	12-Apr-2024	19-Apr-2024	09-Oct-2024	✓	22-Apr-2024	29-May-2024	✓



Matrix: SOIL

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231B: Perfluoroalkyl Carboxylic Acids								
HDPE Soil Jar (EP231X) 0021_SD052_240408,	0021_SD054_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✓	23-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD075_240409, 0021_SD093_240409, 0021_QC102_240409	0021_SD080_240409, 0021_SD111_240409,	09-Apr-2024	18-Apr-2024	06-Oct-2024	✓	23-Apr-2024	28-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD028_240409, 0021_SD031_240409	0021_SD030_240409,	09-Apr-2024	19-Apr-2024	06-Oct-2024	✓	22-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD035_240409, 0021_SD037_240409, 0021_SD046_240409, 0021_SD048_240409,	0021_SD036_240409, 0021_SD044_240409, 0021_SD047_240409, 0021_SD073_240409	09-Apr-2024	19-Apr-2024	06-Oct-2024	✓	23-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_QC108_240410,	0021_QC107_240410	10-Apr-2024	18-Apr-2024	07-Oct-2024	✓	23-Apr-2024	28-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD001_240410, 0021_SD007_240410, 0021_SD018_240410, 0021_SD021_240410, 0021_SD029_240410	0021_SD006_240410, 0021_SD009_240410, 0021_SD020_240410, 0021_SD023_240410,	10-Apr-2024	19-Apr-2024	07-Oct-2024	✓	22-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD040_240410, 0021_SD050_240410, 0021_SD059_240410, 0021_SD067_240410, 0021_SD069_240410,	0021_SD049_240410, 0021_SD058_240410, 0021_SD066_240410, 0021_SD068_240410, 0021_SD070_240410	10-Apr-2024	19-Apr-2024	07-Oct-2024	✓	23-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD002_240411, 0021_SD015_240411	0021_SD003_240411,	11-Apr-2024	19-Apr-2024	08-Oct-2024	✓	22-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD017_240412		12-Apr-2024	06-May-2024	09-Oct-2024	✓	07-May-2024	15-Jun-2024	✓
HDPE Soil Jar (EP231X) 0021_SD110_240412, 0021_QC115_240412	0021_QC113_240412,	12-Apr-2024	18-Apr-2024	09-Oct-2024	✓	23-Apr-2024	28-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD004_240412, 0021_SD012_240412, 0021_SD016_240412	0021_SD005_240412, 0021_SD013_240412,	12-Apr-2024	19-Apr-2024	09-Oct-2024	✓	22-Apr-2024	29-May-2024	✓



Matrix: SOIL

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231C: Perfluoroalkyl Sulfonamides								
HDPE Soil Jar (EP231X) 0021_SD052_240408, 0021_SD054_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✓	23-Apr-2024	29-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD075_240409, 0021_SD093_240409, 0021_QC102_240409	09-Apr-2024	18-Apr-2024	06-Oct-2024	✓	23-Apr-2024	28-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD028_240409, 0021_SD031_240409	09-Apr-2024	19-Apr-2024	06-Oct-2024	✓	22-Apr-2024	29-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD035_240409, 0021_SD037_240409, 0021_SD046_240409, 0021_SD048_240409,	09-Apr-2024	19-Apr-2024	06-Oct-2024	✓	23-Apr-2024	29-May-2024	✓	
0021_SD036_240409, 0021_SD044_240409, 0021_SD047_240409, 0021_SD073_240409								
HDPE Soil Jar (EP231X) 0021_QC108_240410,	10-Apr-2024	18-Apr-2024	07-Oct-2024	✓	23-Apr-2024	28-May-2024	✓	
0021_QC107_240410								
HDPE Soil Jar (EP231X) 0021_SD001_240410, 0021_SD007_240410, 0021_SD018_240410, 0021_SD021_240410, 0021_SD029_240410	10-Apr-2024	19-Apr-2024	07-Oct-2024	✓	22-Apr-2024	29-May-2024	✓	
0021_SD006_240410, 0021_SD009_240410, 0021_SD020_240410, 0021_SD023_240410,								
HDPE Soil Jar (EP231X) 0021_SD040_240410, 0021_SD050_240410, 0021_SD059_240410, 0021_SD067_240410, 0021_SD069_240410,	10-Apr-2024	19-Apr-2024	07-Oct-2024	✓	23-Apr-2024	29-May-2024	✓	
0021_SD049_240410, 0021_SD058_240410, 0021_SD066_240410, 0021_SD068_240410, 0021_SD070_240410								
HDPE Soil Jar (EP231X) 0021_SD002_240411, 0021_SD015_240411	11-Apr-2024	19-Apr-2024	08-Oct-2024	✓	22-Apr-2024	29-May-2024	✓	
0021_SD003_240411,								
HDPE Soil Jar (EP231X) 0021_SD017_240412	12-Apr-2024	06-May-2024	09-Oct-2024	✓	07-May-2024	15-Jun-2024	✓	
0021_QC113_240412,	12-Apr-2024	18-Apr-2024	09-Oct-2024	✓	23-Apr-2024	28-May-2024	✓	
0021_QC115_240412								
HDPE Soil Jar (EP231X) 0021_SD004_240412, 0021_SD012_240412, 0021_SD016_240412	12-Apr-2024	19-Apr-2024	09-Oct-2024	✓	22-Apr-2024	29-May-2024	✓	
0021_SD005_240412, 0021_SD013_240412,								



Matrix: SOIL

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
HDPE Soil Jar (EP231X) 0021_SD052_240408,	0021_SD054_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✓	23-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD075_240409, 0021_SD093_240409, 0021_QC102_240409	0021_SD080_240409, 0021_SD111_240409,	09-Apr-2024	18-Apr-2024	06-Oct-2024	✓	23-Apr-2024	28-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD028_240409, 0021_SD031_240409	0021_SD030_240409,	09-Apr-2024	19-Apr-2024	06-Oct-2024	✓	22-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD035_240409, 0021_SD037_240409, 0021_SD046_240409, 0021_SD048_240409,	0021_SD036_240409, 0021_SD044_240409, 0021_SD047_240409, 0021_SD073_240409	09-Apr-2024	19-Apr-2024	06-Oct-2024	✓	23-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_QC108_240410,	0021_QC107_240410	10-Apr-2024	18-Apr-2024	07-Oct-2024	✓	23-Apr-2024	28-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD001_240410, 0021_SD007_240410, 0021_SD018_240410, 0021_SD021_240410, 0021_SD029_240410	0021_SD006_240410, 0021_SD009_240410, 0021_SD020_240410, 0021_SD023_240410,	10-Apr-2024	19-Apr-2024	07-Oct-2024	✓	22-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD040_240410, 0021_SD050_240410, 0021_SD059_240410, 0021_SD067_240410, 0021_SD069_240410,	0021_SD049_240410, 0021_SD058_240410, 0021_SD066_240410, 0021_SD068_240410, 0021_SD070_240410	10-Apr-2024	19-Apr-2024	07-Oct-2024	✓	23-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD002_240411, 0021_SD015_240411	0021_SD003_240411,	11-Apr-2024	19-Apr-2024	08-Oct-2024	✓	22-Apr-2024	29-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD017_240412		12-Apr-2024	06-May-2024	09-Oct-2024	✓	07-May-2024	15-Jun-2024	✓
HDPE Soil Jar (EP231X) 0021_SD110_240412, 0021_QC115_240412	0021_QC113_240412,	12-Apr-2024	18-Apr-2024	09-Oct-2024	✓	23-Apr-2024	28-May-2024	✓
HDPE Soil Jar (EP231X) 0021_SD004_240412, 0021_SD012_240412, 0021_SD016_240412	0021_SD005_240412, 0021_SD013_240412,	12-Apr-2024	19-Apr-2024	09-Oct-2024	✓	22-Apr-2024	29-May-2024	✓



Matrix: SOIL

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231P: PFAS Sums								
HDPE Soil Jar (EP231X) 0021_SD052_240408, 0021_SD054_240408	08-Apr-2024	19-Apr-2024	05-Oct-2024	✓	23-Apr-2024	29-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD075_240409, 0021_SD093_240409, 0021_QC102_240409	09-Apr-2024	18-Apr-2024	06-Oct-2024	✓	23-Apr-2024	28-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD028_240409, 0021_SD031_240409	09-Apr-2024	19-Apr-2024	06-Oct-2024	✓	22-Apr-2024	29-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD035_240409, 0021_SD037_240409, 0021_SD046_240409, 0021_SD048_240409,	09-Apr-2024	19-Apr-2024	06-Oct-2024	✓	23-Apr-2024	29-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_QC108_240410,	10-Apr-2024	18-Apr-2024	07-Oct-2024	✓	23-Apr-2024	28-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD001_240410, 0021_SD007_240410, 0021_SD018_240410, 0021_SD021_240410, 0021_SD029_240410	10-Apr-2024	19-Apr-2024	07-Oct-2024	✓	22-Apr-2024	29-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD040_240410, 0021_SD050_240410, 0021_SD059_240410, 0021_SD067_240410, 0021_SD069_240410,	10-Apr-2024	19-Apr-2024	07-Oct-2024	✓	23-Apr-2024	29-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD002_240411, 0021_SD015_240411	11-Apr-2024	19-Apr-2024	08-Oct-2024	✓	22-Apr-2024	29-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD017_240412	12-Apr-2024	06-May-2024	09-Oct-2024	✓	07-May-2024	15-Jun-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD110_240412, 0021_QC115_240412	12-Apr-2024	18-Apr-2024	09-Oct-2024	✓	23-Apr-2024	28-May-2024	✓	
HDPE Soil Jar (EP231X) 0021_SD004_240412, 0021_SD012_240412, 0021_SD016_240412	12-Apr-2024	19-Apr-2024	09-Oct-2024	✓	22-Apr-2024	29-May-2024	✓	



Quality Control Parameter Frequency Compliance

The following report summarises the frequency of laboratory QC samples analysed within the analytical lot(s) in which the submitted sample(s) was(were) processed. Actual rate should be greater than or equal to the expected rate. A listing of breaches is provided in the Summary of Outliers.

Matrix: **SOIL** Evaluation: ✖ = Quality Control frequency not within specification ; ✔ = Quality Control frequency within specification .

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	Method	QC	Regular	Actual	Expected	Evaluation	
Laboratory Duplicates (DUP)							
Moisture Content	EA055	10	92	10.87	10.00	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	6	54	11.11	10.00	✓	NEPM 2013 B3 & ALS QC Standard
Laboratory Control Samples (LCS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	4	54	7.41	5.00	✓	NEPM 2013 B3 & ALS QC Standard
Method Blanks (MB)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	4	54	7.41	5.00	✓	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	4	54	7.41	5.00	✓	NEPM 2013 B3 & ALS QC Standard



Brief Method Summaries

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the US EPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request. The following report provides brief descriptions of the analytical procedures employed for results reported in the Certificate of Analysis. Sources from which ALS methods have been developed are provided within the Method Descriptions.

Analytical Methods	Method	Matrix	Method Descriptions
Moisture Content	EA055	SOIL	In house: A gravimetric procedure based on weight loss over a 12 hour drying period at 105-110 degrees C. This method is compliant with NEPM Schedule B(3).
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	SOIL	In-house: Analysis of soils by solvent extraction followed by LC-Electrospray-MS-MS, Negative Mode using MRM using internal standard quantitation. Isotopically labelled analogues of target analytes used as internal standards and surrogates are added to a portion of soil which is then extracted with MTBE and an ion pairing reagent. A portion of extract is exchanged into the analytical solvent mixture, combined with an equal volume reagent water and filtered for analysis. Method procedures and data quality objectives conform to US DoD QSM 5.4, table B-15 requirements.
Preparation Methods	Method	Matrix	Method Descriptions
QuEChERS Extraction of Solids	ORG71	SOIL	In house: Sequential extractions with Acetonitrile/Methanol by shaking. Extraction efficiency aided by the addition of salts under acidic conditions. Where relevant, interferences from co-extracted organics are removed with dispersive clean-up media (dSPE). The extract is either diluted or concentrated and exchanged into the analytical solvent.



SAMPLE RECEIPT NOTIFICATION (SRN)

Work Order : ES2411995

Amendment : 2

Client : AECOM AUSTRALIA PTY LTD
Contact : [REDACTED]
Address : LEVEL 21 420 GEORGE STREET
SYDNEY NSW, AUSTRALIA 2000

E-mail : [REDACTED]
Telephone : ----
Facsimile : ----

Project : ACT_0021_PFASOMP_24
Order number : 60612562_4.1

C-O-C number : 66273
Site : 0021 SD
Sampler : [REDACTED]

Laboratory : Environmental Division Sydney
Contact : [REDACTED]
Address : 277-289 Woodpark Road Smithfield
NSW Australia 2164

E-mail : [REDACTED]@ALSGlobal.com
Telephone : +61 2 8784 8555
Facsimile : +61-2-8784 8500

Page : 1 of 4
Quote number : ES2021AECOMAU0042 (SY/139/19 v4
60612562_4.1)
QC Level : NEPM 2013 B3 & ALS QC Standard

Dates

Date Samples Received : 15-Apr-2024 14:00
Client Requested Due : 22-Apr-2024
Date

Issue Date : 20-May-2024
Scheduled Reporting Date : 09-May-2024

Delivery Details

Mode of Delivery : Undefined
No. of coolers/boxes : 8
Receipt Detail :

Security Seal : Not Available
Temperature : 4.5, 3.8, 3.56 - Ice present
No. of samples received / analysed : 51 / 51

General Comments

- This report contains the following information:
 - Sample Container(s)/Preservation Non-Compliances
 - Summary of Sample(s) and Requested Analysis
 - Proactive Holding Time Report
 - Requested Deliverables
- **Please refer to the Proactive Holding Time Report table below which summarises breaches of recommended holding times that have occurred prior to samples/instructions being received at the laboratory. The laboratory will process these samples unless instructions are received from you indicating you do not wish to proceed. The absence of this summary table indicates that all samples have been received within the recommended holding times for the analysis requested.**
- Please direct any queries you have regarding this work order to the above ALS laboratory contact.
- Analytical work for this work order will be conducted at ALS Sydney.
- Sample Disposal - Aqueous (3 weeks), Solid (2 months $\pm$ 1 week) from receipt of samples.
- Please be aware that APHA/NEPM recommends water and soil samples be chilled to less than or equal to 6°C for chemical analysis, and less than or equal to 10°C but unfrozen for Microbiological analysis. Where samples are received above this temperature, it should be taken into consideration when interpreting results. Refer to ALS EnviroMail 85 for ALS recommendations of the best practice for chilling samples after sampling and for maintaining a cool temperature during transit.



Sample Container(s)/Preservation Non-Compliances

All comparisons are made against pretreatment/preservation AS, APHA, USEPA standards.

- No sample container / preservation non-compliance exists.

Summary of Sample(s) and Requested Analysis

Some items described below may be part of a laboratory process necessary for the execution of client requested tasks. Packages may contain additional analyses, such as the determination of moisture content and preparation tasks, that are included in the package.

If no sampling time is provided, the sampling time will default 00:00 on the date of sampling. If no sampling date is provided, the sampling date will be assumed by the laboratory and displayed in brackets without a time component

Matrix: SOIL

Laboratory sample ID	Sampling date / time	Sample ID	SOIL - EA055-103 Moisture Content	SOIL - EP231X (solids) PFAS - Full Suite (30 analytes)
ES2411995-001	10-Apr-2024 14:00	0021_SD001_240410	✓	✓
ES2411995-002	11-Apr-2024 09:04	0021_SD002_240411	✓	✓
ES2411995-003	11-Apr-2024 09:39	0021_SD003_240411	✓	✓
ES2411995-004	12-Apr-2024 08:25	0021_SD004_240412	✓	✓
ES2411995-005	12-Apr-2024 08:05	0021_SD005_240412	✓	✓
ES2411995-006	10-Apr-2024 12:20	0021_SD006_240410	✓	✓
ES2411995-007	10-Apr-2024 11:58	0021_SD007_240410	✓	✓
ES2411995-008	10-Apr-2024 11:47	0021_SD009_240410	✓	✓
ES2411995-009	12-Apr-2024 08:05	0021_SD012_240412	✓	✓
ES2411995-010	12-Apr-2024 07:58	0021_SD013_240412	✓	✓
ES2411995-011	11-Apr-2024 10:41	0021_SD015_240411	✓	✓
ES2411995-012	12-Apr-2024 09:14	0021_SD016_240412	✓	✓
ES2411995-013	10-Apr-2024 08:40	0021_SD018_240410	✓	✓
ES2411995-014	10-Apr-2024 09:12	0021_SD020_240410	✓	✓
ES2411995-015	10-Apr-2024 10:00	0021_SD021_240410	✓	✓
ES2411995-016	10-Apr-2024 10:57	0021_SD023_240410	✓	✓
ES2411995-017	09-Apr-2024 09:40	0021_SD028_240409	✓	✓
ES2411995-018	10-Apr-2024 08:15	0021_SD029_240410	✓	✓
ES2411995-019	09-Apr-2024 14:21	0021_SD030_240409	✓	✓
ES2411995-020	09-Apr-2024 15:03	0021_SD031_240409	✓	✓
ES2411995-021	09-Apr-2024 14:35	0021_SD035_240409	✓	✓
ES2411995-022	09-Apr-2024 12:40	0021_SD036_240409	✓	✓
ES2411995-023	09-Apr-2024 12:20	0021_SD037_240409	✓	✓
ES2411995-024	10-Apr-2024 08:41	0021_SD040_240410	✓	✓
ES2411995-025	09-Apr-2024 11:20	0021_SD044_240409	✓	✓
ES2411995-026	09-Apr-2024 11:00	0021_SD046_240409	✓	✓
ES2411995-027	09-Apr-2024 15:10	0021_SD047_240409	✓	✓
ES2411995-028	09-Apr-2024 15:45	0021_SD048_240409	✓	✓
ES2411995-029	10-Apr-2024 13:30	0021_SD049_240410	✓	✓
ES2411995-030	10-Apr-2024 10:47	0021_SD050_240410	✓	✓
ES2411995-031	08-Apr-2024 14:53	0021_SD052_240408	✓	✓
ES2411995-032	08-Apr-2024 14:29	0021_SD054_240408	✓	✓
ES2411995-033	10-Apr-2024 11:03	0021_SD058_240410	✓	✓
ES2411995-034	10-Apr-2024 11:18	0021_SD059_240410	✓	✓
ES2411995-035	10-Apr-2024 09:00	0021_SD066_240410	✓	✓



			SOIL - EA055-103 Moisture Content	SOIL - EP231X (solids) PFAS - Full Suite (30 analytes)
ES2411995-036	10-Apr-2024 09:15	0021_SD067_240410	✓	✓
ES2411995-037	10-Apr-2024 09:30	0021_SD068_240410	✓	✓
ES2411995-038	10-Apr-2024 09:45	0021_SD069_240410	✓	✓
ES2411995-039	10-Apr-2024 10:00	0021_SD070_240410	✓	✓
ES2411995-040	09-Apr-2024 15:53	0021_SD073_240409	✓	✓
ES2411995-041	09-Apr-2024 10:30	0021_SD075_240409	✓	✓
ES2411995-042	09-Apr-2024 09:25	0021_SD080_240409	✓	✓
ES2411995-043	09-Apr-2024 14:48	0021_SD093_240409	✓	✓
ES2411995-044	12-Apr-2024 08:16	0021_SD110_240412	✓	✓
ES2411995-045	09-Apr-2024 12:00	0021_SD111_240409	✓	✓
ES2411995-046	09-Apr-2024 15:06	0021_QC102_240409	✓	✓
ES2411995-047	10-Apr-2024 13:32	0021_QC108_240410	✓	✓
ES2411995-048	12-Apr-2024 07:59	0021_QC113_240412	✓	✓
ES2411995-049	10-Apr-2024 09:45	0021_QC107_240410	✓	✓
ES2411995-050	12-Apr-2024 08:10	0021_QC115_240412	✓	✓
ES2411995-051	12-Apr-2024 09:20	0021_SD017_240412	✓	✓

Proactive Holding Time Report

Sample(s) have been received within the recommended holding times for the requested analysis.

Requested Deliverables

ACCOUNTS PAYABLE

- A4 - AU Tax Invoice (INV)

Email

AP_CustomerService.ANZ@aecom.com

DERP ESDAT REPORTS

- EDI Format - ESDAT (ESDAT)

Email

derp.labreports@esdat.com.au

- *AU Certificate of Analysis - NATA (COA)
- *AU Interpretive QC Report - DEFAULT (Anon QCI Rep) (QCI)
- *AU QC Report - DEFAULT (Anon QC Rep) - NATA (QC)
- A4 - AU Sample Receipt Notification - Environmental HT (SRN)
- A4 - AU Tax Invoice (INV)
- Chain of Custody (CoC) (COC)
- EDI Format - ESDAT (ESDAT)

Email

Email

Email

Email

Email

Email

Email

- *AU Certificate of Analysis - NATA (COA)
- *AU Interpretive QC Report - DEFAULT (Anon QCI Rep) (QCI)
- *AU QC Report - DEFAULT (Anon QC Rep) - NATA (QC)
- A4 - AU Sample Receipt Notification - Environmental HT (SRN)
- Chain of Custody (CoC) (COC)
- EDI Format - EQUIS V5 AECOM (EQUIS_V5_AECOM)
- EDI Format - ESDAT (ESDAT)
- Electronic SRN for EQUIS (ESRN_EQUIS)

Email

Email

Email

Email

Email

Email

Email

Email

Email

Issue Date : 20-May-2024
Page : 4 of 4
Work Order : ES2411995 Amendment 2
Client : AECOM AUSTRALIA PTY LTD



CHAIN OF CUSTODY

COC#: 66273

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT 0021 PFASOMP 24

SITE: 0021 SD

ORDER NO:

PROJECT MANAGER

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

CONTACT PH:

SAMPLER MOBILE

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

C

Other comments:

SAMPLE DETAILS							ANALYSIS REQUIRED		
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
001	0021_SD001_240410		10/04/2024 02:00 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
002	0021_SD002_240411		11/04/2024 09:04 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
003	0021_SD003_240411		11/04/2024 09:39 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
004	0021_SD004_240412		12/04/2024 08:25 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
005	0021_SD005_240412		12/04/2024 08:05 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
006	0021_SD006_240410		10/04/2024 12:20 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
007	0021_SD007_240407		10/04/2024 11:58 AM	SOIL	ALS: 1 Non ALS: 0	No	X		

Environmental Division
Sydney

Work Order Reference

Work Order Reference
ES2411995



Telephone : + 61-2-8784 8555

**CHAIN OF CUSTODY**

COC#: 66273

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFSOMP_24

SITE: 0021 SD

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

°C

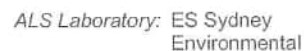
Other comments:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2**SAMPLE DETAILS****ANALYSIS REQUIRED**

SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
008	0021_SD009_240410		10/04/2024 11:47 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
009	0021_SD012_240412		12/04/2024 08:05 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
010	0021_SD013_240412		12/04/2024 07:58 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
011	0021_SD015_240411		11/04/2024 10:41 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
012	0021_SD016_240412		12/04/2024 09:14 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
013	0021_SD018_240410		10/04/2024 08:40 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
014	0021_SD020_240410		10/04/2024 08:45 AM	SOIL	ALS: 1 Non ALS: 0	No	X		



RECEIVED BY:

DATE TIME:

EMAIL INVOICES TO:

Biohazard info:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

C

Other comments:

ANALYSIS REQUIRED

SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
015	0021_SD021_240410		10/04/2024 10:00 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
016	0021_SD023_240410		10/04/2024 10:57 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
017	0021_SD028_240409		09/04/2024 09:40 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
018	0021_SD029_240410		10/04/2024 08:15 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
019	0021_SD030_240409		09/04/2024 02:21 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
020	0021_SD031_240409		09/04/2024 03:03 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
021	0021_SD035_240409		09/04/2024 02:35 PM	SOIL	ALS: 1 Non ALS: 0	No	X		

 CHAIN OF CUSTODY COC#: 66273 ALS Laboratory: ES Sydney Environmental		RELINQUISHED BY: DATE TIME:	RECEIVED BY: DATE TIME:	RELINQUISHED BY: DATE TIME:	RECEIVED BY: DATE TIME:
CLIENT: AECOMAU - AECOM Australia Pty Ltd PROJECT: ACT_0021_PFASOMP_24 SITE: 0021 SD ORDER NO: PROJECT MANAGER: [REDACTED] PRIMARY SAMPLER: [REDACTED] EMAIL REPORTS TO: EMAIL INVOICES TO:		TURNAROUND REQUIREMENTS : 5 Days Biohazard info:		LABORATORY USE ONLY (Circle) Custody Seal intact? Yes No N/A Free ice / frozen ice bricks present upon receipt? Yes No N/A Random Sample Temperature on Receipt: °C Other comments:	
		CONTACT PH: SAMPLER MOBILE: [REDACTED] QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU0042			

SAMPLE DETAILS							ANALYSIS REQUIRED		
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
022	0021_SD036_240409		09/04/2024 12:40 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
023	0021_SD037_240409		09/04/2024 12:20 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
024	0021_SD040_240410		10/04/2024 08:41 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
025	0021_SD044_240409		09/04/2024 11:20 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
026	0021_SD046_240409		09/04/2024 11:00 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
027	0021_SD047_240409		09/04/2024 03:10 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
028	0021_SD048_240409		09/04/2024 03:45 PM	SOIL	ALS: 1 Non ALS: 0	No	X		



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:

SAMPLE DETAILS							ANALYSIS REQUIRED		
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
029	0021_SD049_240410		10/04/2024 01:30 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
030	0021_SD050_240410		10/04/2024 10:47 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
031	0021_SD052_240408		08/04/2024 02:53 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
032	0021_SD054_240408		08/04/2024 02:29 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
033	0021_SD058_240410		10/04/2024 11:03 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
034	0021_SD059_240410		10/04/2024 11:18 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
035	0021_SD066_240410		10/04/2024 09:00 AM	SOIL	ALS: 1 Non ALS: 0	No	X		



RECEIVED BY:

DATE TIME:

EMAIL INVOICES TO:

Biohazard info:

C

Other comments:

ANALYSIS REQUIRED

SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
036	0021_SD067_240410		10/04/2024 09:15 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
037	0021_SD068_240410		10/04/2024 09:30 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
038	0021_SD069_240410		10/04/2024 09:45 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
039	0021_SD070_240410		10/04/2024 10:00 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
040	0021_SD073_240409		09/04/2024 03:53 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
041	0021_SD075_240409		09/04/2024 10:30 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
042	0021_SD080_240408		09/04/2024 09:25 AM	SOIL	ALS: 1 Non ALS: 0	No	X		



CHAIN OF CUSTODY

COC#: 66273

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFSOMP_24

SITE: 0021 SD

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

°C

Other comments:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

SAMPLE DETAILS

ANALYSIS REQUIRED

SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
043	0021_SD093_240409		09/04/2024 02:48 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
044	0021_SD110_240412		12/04/2024 08:16 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
045	0021_SD111_240409		09/04/2024 12:00 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
046	0021_QC102_240409		09/04/2024 03:06 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
047	0021_QC108_240410		10/04/2024 01:32 PM	SOIL	ALS: 1 Non ALS: 0	No	X		
048	0021_QC113_240412		12/04/2024 07:59 AM	SOIL	ALS: 1 Non ALS: 0	No	X		
049	0021_QC107_240410		10/04/2024 09:45 AM	SOIL	ALS: 1 Non ALS: 0	No	X		



CHAIN OF CUSTODY

COC#: 66273

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFASOMP_24

SITE: 0021 SD

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS: 5 Days

Biohazard info:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

LABORATORY USE ONLY (Circle)

Custody Seal intact? Yes No N/A

Free ice / frozen ice bricks present upon receipt? Yes No N/A

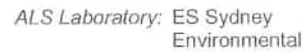
Random Sample Temperature on Receipt: C

Other comments:

SAMPLE DETAILS

ANALYSIS REQUIRED

SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_Soil SOIL	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
050	0021_QC115_240412		12/04/2024 09:23 AM	SOIL	ALS: 1 Non ALS: 0	No	X		



RECEIVED BY:

DATE TIME:

9 of 9



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:

Other comments:

Total Bottle Count: ALS: 50, Non ALS: 0

SAMPLES RECEIVED WITHOUT COC

CLIENT: decom	CARRIER: [REDACTED]
PROJECT / QUOTE:	CONNOTE #:
CONTACT NAME:	AWB #:
CONTACT NUMBER:	# OF ESKIES: 7(L) + 1(S) SECURITY SEAL: Y (N) N/A
SAMPLER NAME:	TYPE OF ESKIES:
SAMPLER NUMBER:	ESKY NUMBERS:
SAMPLES RECEIVED BY: [REDACTED]	# OF SAMPLES:
DATE/TIME RECEIVED: 12/4/24 CLIENT SERVICES NOTIFIED BY:	TEMPERATURE: 4.5°C, 3.8°C, 3.5°C

LAB ID	SAMPLE DETAILS			NUMBER OF CONTAINERS	ADDITIONAL INFORMATION / COMMENTS:
	SAMPLE ID	DATE	MATRIX		OTHER INFORMATION:
1					☐ MICRO ☐ BIOSECURITY ☐ BROKEN CONTAINERS ☐ COC EMAILED ☒ ALS COMPASS
2					
3					
4					
5					
TOTAL					

CORRESPONDENCE (DATE, INITIALS - DETAILS OF CORRESPONDENCE):

Compass : # 66076
65532

[REDACTED]

From:

Sent:

Thursday, 2 May 2024 1:46 PM

To:

Cc:

Subject:

RE: [EXTERNAL] - RE: - ACT_0021_PFASOMP_24/ES2411995 missing sample query

Hi [REDACTED]

Can you please amend the below?

Regards

Environmental Division
Sydney

Work Order Reference

ES2411995



Telephone : +61-2-8784 8555

[REDACTED]

Subject: FW: [EXTERNAL] - RE: - ACT_0021_PFASOMP_24/ES2411995 missing sample query

Hi Team,

Can I get someone to assist with this work order update?

We need to move sample ES2411994_60 to work order ES2411995 as a new sample and rename it as 0021_SD017_240412 and Sampled Date/Time is 12/04/2024 9:20:00 AM.

The sample then needs analysis for EP231X on standard TAT.

[redacted] - can I get you to add an additional admin fee for thee updates into work order ES2411995?

Thanks.

Kind regards,



[redacted]

Client Services Manager, Environmental
Sydney, NSW

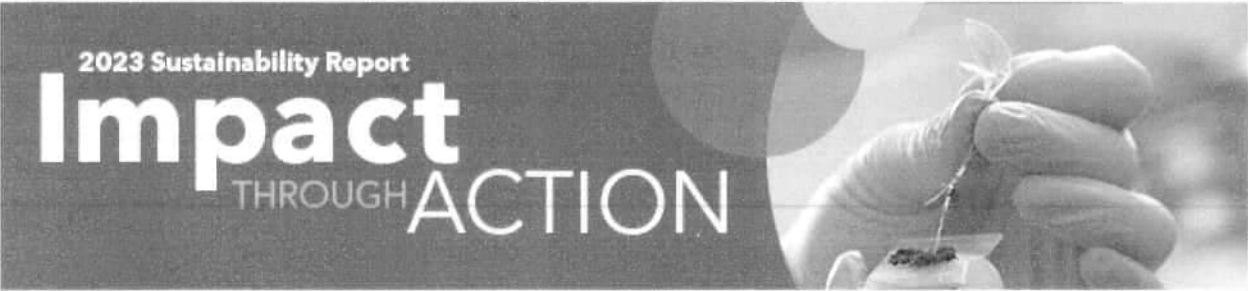
[redacted]

277-289 Woodpark Road
Smithfield NSW 2164 AUSTRALIA

alsglobal.com



Monday	Tuesday	Wednesday	Thursday	Friday
Office	Office	Office	Office	Office





CERTIFICATE OF ANALYSIS

Work Order	: ES2412012	Page	: 1 of 33
Amendment	: 1		
Client	: AECOM AUSTRALIA PTY LTD	Laboratory	: Environmental Division Sydney
Contact	: [REDACTED]	Contact	: [REDACTED]
Address	: LEVEL 2 60 MARCUS CLARKE ST CANBERRA ACT, AUSTRALIA 2600	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: ----	Telephone	: +61 2 8784 8555
Project	: ACT_0021_PFASOMP_24	Date Samples Received	: 12-Apr-2024 17:48
Order number	: 60612562_4.1	Date Analysis Commenced	: 17-Apr-2024
C-O-C number	: 66217	Issue Date	: 20-May-2024 18:18
Sampler	: [REDACTED] [REDACTED]		
Site	: 0021 SW		
Quote number	: SY/139/19 v4 60612562_4.1		
No. of samples received	: 63		
No. of samples analysed	: 62		



Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted, unless the sampling was conducted by ALS. This document shall not be reproduced, except in full.

This Certificate of Analysis contains the following information:

- General Comments
- Analytical Results
- Surrogate Control Limits

Additional information pertinent to this report will be found in the following separate attachments: Quality Control Report, QA/QC Compliance Assessment to assist with Quality Review and Sample Receipt Notification.

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	Position	Accreditation Category
[REDACTED]	LCMS Coordinator	Sydney Organics, Smithfield, NSW



General Comments

The analytical procedures used by ALS have been developed from established internationally recognised procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are fully validated and are often at the client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis.

Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

When sampling time information is not provided by the client, sampling dates are shown without a time component. In these instances, the time component has been assumed by the laboratory for processing purposes.

Where a result is required to meet compliance limits the associated uncertainty must be considered. Refer to the ALS Contract for details.

Key : CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.

LOR = Limit of reporting

^ = This result is computed from individual analyte detections at or above the level of reporting

ø = ALS is not NATA accredited for these tests.

~ = Indicates an estimated value.

- EP231X - Per- and Polyfluoroalkyl Substances (PFAS): Samples received in 20mL or 125mL bottles have been tested in accordance with the QSM5.4 compliant, NATA accredited method. 60mL or 250mL bottles have been tested to the legacy QSM 5.1 aligned, NATA accredited method.
- Amendment (20/05/2024): This report has been amended as a result of a request to change sample identification numbers (IDs) for samples 010, 046, 058, 060, 061 & 063 . All analysis results are as per the previous report.
- EP231: Stable isotope enriched internal standards are added to samples prior to extraction. Target compounds have a direct analogous internal standard with the exception of PFPeS, PFHpA, PFDS, PFTrDA and 10:2 FTS. These compounds use an internal standard that is chemically related and has a retention time close to that of the target compound. The DQO for internal standard response is 50-150% of that established at initial calibration or as per tables in USEPA 1633 where listed. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. These practices are in line with recommendations in the National Environmental Management Plan for PFAS and also conform to QSM 5.4 (US DoD) requirements.
- EP231: Stable isotope enriched internal standards are added to samples prior to extraction. Target compounds have a direct analogous internal standard with the exception of PFPeS, PFHpA, PFDS, PFTrDA and 10:2 FTS. These compounds use an internal standard that is chemically related and has a retention time close to that of the target compound. The DQO for internal standard response is 50-150% of that established at initial calibration. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. These practices are in line with recommendations in the National Environmental Management Plan for PFAS (Australian HEPA) and also conform to QSM 5.3 (US DoD) requirements.



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_QC106_240410	0021_QC103_240409	0021_QC105_240410	0021_QC109_240410	----
Sampling date / time				10-Apr-2024 11:49	09-Apr-2024 12:00	10-Apr-2024 09:00	10-Apr-2024 10:00	----
Compound	CAS Number	LOR	Unit	ES2412012-051	ES2412012-054	ES2412012-055	ES2412012-056	-----
				Result	Result	Result	Result	----
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.04	<0.02	<0.02	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.06	<0.02	<0.02	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.18	1.08	<0.01	<0.01	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.06	<0.02	<0.02	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.13	1.73	<0.01	<0.01	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.04	<0.02	<0.02	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.04	<0.01	<0.01	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----



Analytical Results

Sub-Matrix: GROUNDWATER
 (Matrix: WATER)

Sample ID

				0021_QC106_240410	0021_QC103_240409	0021_QC105_240410	0021_QC109_240410	----
Sampling date / time				10-Apr-2024 11:49	09-Apr-2024 12:00	10-Apr-2024 09:00	10-Apr-2024 10:00	----
Compound	CAS Number	LOR	Unit	ES2412012-051	ES2412012-054	ES2412012-055	ES2412012-056	-----
				Result	Result	Result	Result	----
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	0.31	3.05	<0.01	<0.01	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.31	2.81	<0.01	<0.01	----
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.31	2.93	<0.01	<0.01	----
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	97.0	96.2	93.5	101	----
13C8-PFOA	----	0.02	%	104	103	103	105	----



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW001_240410	0021_SW002_240411	0021_SW003_240411	0021_SW004_240412	0021_SW005_240412
Sampling date / time				10-Apr-2024 13:59	11-Apr-2024 09:05	11-Apr-2024 09:38	12-Apr-2024 08:25	12-Apr-2024 08:21
Compound	CAS Number	LOR	Unit	ES2412012-001	ES2412012-002	ES2412012-003	ES2412012-004	ES2412012-005
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.10	0.06	<0.02	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.16	0.09	<0.02	<0.02	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	1.96	1.04	0.03	<0.01	0.04
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.07	0.04	<0.02	<0.02	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	2.84	1.58	0.05	<0.01	0.03
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	0.05	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.39	0.13	<0.02	<0.02	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	0.06	<0.02	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.08	0.03	<0.01	<0.01	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW001_240410	0021_SW002_240411	0021_SW003_240411	0021_SW004_240412	0021_SW005_240412
Sampling date / time				10-Apr-2024 13:59	11-Apr-2024 09:05	11-Apr-2024 09:38	12-Apr-2024 08:25	12-Apr-2024 08:21
Compound	CAS Number	LOR	Unit	ES2412012-001	ES2412012-002	ES2412012-003	ES2412012-004	ES2412012-005
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	5.77	2.97	0.08	<0.01	0.07
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	4.80	2.62	0.08	<0.01	0.07
Sum of PFAS (WA DER List)	----	0.01	µg/L	5.48	2.84	0.08	<0.01	0.07
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	97.7	93.5	99.6	99.9	99.5
13C8-PFOA	----	0.02	%	103	102	103	102	103



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW006_240412	0021_SW010_240410	0021_SW011_240410	0021_SW013_240410	0021_SW019_240411
Sampling date / time				12-Apr-2024 08:12	10-Apr-2024 12:20	10-Apr-2024 11:58	10-Apr-2024 11:48	11-Apr-2024 10:40
Compound	CAS Number	LOR	Unit	ES2412012-006	ES2412012-007	ES2412012-008	ES2412012-009	ES2412012-010
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	0.15
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	0.19
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.20	<0.01	0.18	1.78
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	0.05
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.21	<0.01	0.13	1.38
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	0.08
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	0.32
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	0.05
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	0.06
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW006_240412	0021_SW010_240410	0021_SW011_240410	0021_SW013_240410	0021_SW019_240411
Sampling date / time				12-Apr-2024 08:12	10-Apr-2024 12:20	10-Apr-2024 11:58	10-Apr-2024 11:48	11-Apr-2024 10:40
Compound	CAS Number	LOR	Unit	ES2412012-006	ES2412012-007	ES2412012-008	ES2412012-009	ES2412012-010
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	<0.01	0.41	<0.01	0.31	4.11
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	<0.01	0.41	<0.01	0.31	3.16
Sum of PFAS (WA DER List)	----	0.01	µg/L	<0.01	0.41	<0.01	0.31	3.82
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	93.0	99.2	95.7	99.2	96.5
13C8-PFOA	----	0.02	%	104	102	102	106	101



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW020_240412	0021_SW021_240412	0021_SW022_240410	0021_SW024_240410	0021_SW025_240410
Sampling date / time				12-Apr-2024 09:15	12-Apr-2024 09:20	10-Apr-2024 08:40	10-Apr-2024 08:45	10-Apr-2024 10:00
Compound	CAS Number	LOR	Unit	ES2412012-011	ES2412012-012	ES2412012-013	ES2412012-014	ES2412012-015
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.04	0.08	0.05	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.04	0.10	0.08	<0.02	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.38	1.02	0.98	0.05	0.10
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.02	0.02	<0.02	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.25	0.61	0.39	0.02	0.07
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.03	0.14	0.05	<0.02	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.03	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.03	0.02	<0.01	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW020_240412	0021_SW021_240412	0021_SW022_240410	0021_SW024_240410	0021_SW025_240410
Sampling date / time				12-Apr-2024 09:15	12-Apr-2024 09:20	10-Apr-2024 08:40	10-Apr-2024 08:45	10-Apr-2024 10:00
Compound	CAS Number	LOR	Unit	ES2412012-011	ES2412012-012	ES2412012-013	ES2412012-014	ES2412012-015
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	0.74	2.08	1.59	0.07	0.17
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.63	1.63	1.37	0.07	0.17
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.70	1.93	1.49	0.07	0.17
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	95.7	95.4	98.1	95.0	95.1
13C8-PFOA	----	0.02	%	104	105	103	103	99.2



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW027_240410	0021_SW032_240409	0021_SW034_240409	0021_SW035_240410	0021_SW036_240409
Sampling date / time				10-Apr-2024 10:56	09-Apr-2024 09:24	09-Apr-2024 09:41	10-Apr-2024 08:15	09-Apr-2024 14:21
Compound	CAS Number	LOR	Unit	ES2412012-016	ES2412012-017	ES2412012-018	ES2412012-019	ES2412012-020
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0005	µg/L	----	----	----	----	<0.0005
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0005	µg/L	----	----	----	----	<0.0005
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0005	µg/L	----	----	----	----	<0.0005
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.09	<0.01	<0.01	<0.01	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0005	µg/L	----	----	----	----	<0.0005
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	µg/L	----	----	----	----	0.0008
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0005	µg/L	----	----	----	----	<0.0005
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.13	<0.01	<0.01	<0.01	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW027_240410	0021_SW032_240409	0021_SW034_240409	0021_SW035_240410	0021_SW036_240409
Sampling date / time				10-Apr-2024 10:56	09-Apr-2024 09:24	09-Apr-2024 09:41	10-Apr-2024 08:15	09-Apr-2024 14:21
Compound	CAS Number	LOR	Unit	ES2412012-016	ES2412012-017	ES2412012-018	ES2412012-019	ES2412012-020
				Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued								
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
Perfluorobutanoic acid (PFBA)	375-22-4	0.0020	µg/L	----	----	----	----	<0.0020
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0005	µg/L	----	----	----	----	<0.0005
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0005	µg/L	----	----	----	----	<0.0005
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0005	µg/L	----	----	----	----	<0.0005
Perfluorooctanoic acid (PFOA)	335-67-1	0.0005	µg/L	----	----	----	----	<0.0005
Perfluorononanoic acid (PFNA)	375-95-1	0.0005	µg/L	----	----	----	----	<0.0005
Perfluorodecanoic acid (PFDA)	335-76-2	0.0005	µg/L	----	----	----	----	<0.0005
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0005	µg/L	----	----	----	----	<0.0005
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0005	µg/L	----	----	----	----	<0.0005
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0005	µg/L	----	----	----	----	<0.0005
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	µg/L	----	----	----	----	<0.0005
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW027_240410	0021_SW032_240409	0021_SW034_240409	0021_SW035_240410	0021_SW036_240409
Sampling date / time				10-Apr-2024 10:56	09-Apr-2024 09:24	09-Apr-2024 09:41	10-Apr-2024 08:15	09-Apr-2024 14:21
Compound	CAS Number	LOR	Unit	ES2412012-016	ES2412012-017	ES2412012-018	ES2412012-019	ES2412012-020
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	----
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0005	µg/L	----	----	----	----	<0.0005
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.001	µg/L	----	----	----	----	<0.001
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.001	µg/L	----	----	----	----	<0.001
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.001	µg/L	----	----	----	----	<0.001
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.001	µg/L	----	----	----	----	<0.001
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0005	µg/L	----	----	----	----	<0.0005
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0005	µg/L	----	----	----	----	<0.0005
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	----
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.001	µg/L	----	----	----	----	<0.001



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW027_240410	0021_SW032_240409	0021_SW034_240409	0021_SW035_240410	0021_SW036_240409
Sampling date / time				10-Apr-2024 10:56	09-Apr-2024 09:24	09-Apr-2024 09:41	10-Apr-2024 08:15	09-Apr-2024 14:21
Compound	CAS Number	LOR	Unit	ES2412012-016	ES2412012-017	ES2412012-018	ES2412012-019	ES2412012-020
				Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued								
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.001	µg/L	----	----	----	----	<0.001
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.001	µg/L	----	----	----	----	<0.001
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.001	µg/L	----	----	----	----	<0.001
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	0.22	<0.01	<0.01	<0.01	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.22	<0.01	<0.01	<0.01	----
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.22	<0.01	<0.01	<0.01	----
^ Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	µg/L	----	----	----	----	0.0008
^ Sum of PFAS (WA DER List)	----	0.0002	µg/L	----	----	----	----	0.0008
^ Sum of PFAS	----	0.0002	µg/L	----	----	----	----	0.0008
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	101	96.1	98.3	99.8	----
13C8-PFOA	----	0.02	%	103	105	107	104	----
13C4-PFOS	----	0.0005	%	----	----	----	----	95.2
13C8-PFOA	----	0.0005	%	----	----	----	----	101



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW037_240409	0021_SW040_240409	0021_SW043_240409	0021_SW044_240409	0021_SW045_240409
Sampling date / time				09-Apr-2024 15:04	09-Apr-2024 14:47	09-Apr-2024 14:35	09-Apr-2024 12:40	09-Apr-2024 12:20
Compound	CAS Number	LOR	Unit	ES2412012-021	ES2412012-022	ES2412012-023	ES2412012-024	ES2412012-025
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0005	µg/L	<0.0005	----	----	----	----
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	----	<0.02	0.02	0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0005	µg/L	<0.0005	----	----	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	----	<0.02	0.03	0.04	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0005	µg/L	0.0044	----	----	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	----	<0.01	0.57	0.67	0.03
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0005	µg/L	<0.0005	----	----	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	----	<0.02	0.03	0.04	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	µg/L	0.0020	----	----	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0005	µg/L	<0.0005	----	----	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	----	<0.01	0.80	1.23	0.02
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	----	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	----	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	----	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	----	<0.02	0.03	0.03	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	----	<0.02	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	----	<0.01	0.02	0.02	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	----	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	----	<0.02	<0.02	<0.02	<0.02



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: SURFACE WATER (Matrix: WATER)				Sample ID	0021_SW037_240409	0021_SW040_240409	0021_SW043_240409	0021_SW044_240409	0021_SW045_240409
Sampling date / time					09-Apr-2024 15:04	09-Apr-2024 14:47	09-Apr-2024 14:35	09-Apr-2024 12:40	09-Apr-2024 12:20
Compound	CAS Number	LOR	Unit	ES2412012-021	ES2412012-022	ES2412012-023	ES2412012-024	ES2412012-025	
				Result	Result	Result	Result	Result	
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	----	<0.02	<0.02	<0.02	<0.02	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	----	<0.02	<0.02	<0.02	<0.02	
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	----	<0.02	<0.02	<0.02	<0.02	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	----	<0.05	<0.05	<0.05	<0.05	
Perfluorobutanoic acid (PFBA)	375-22-4	0.0020	µg/L	<0.0020	----	----	----	----	
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0005	µg/L	<0.0005	----	----	----	----	
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0005	µg/L	<0.0005	----	----	----	----	
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0005	µg/L	0.0010	----	----	----	----	
Perfluorooctanoic acid (PFOA)	335-67-1	0.0005	µg/L	0.0009	----	----	----	----	
Perfluorononanoic acid (PFNA)	375-95-1	0.0005	µg/L	<0.0005	----	----	----	----	
Perfluorodecanoic acid (PFDA)	335-76-2	0.0005	µg/L	<0.0005	----	----	----	----	
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0005	µg/L	<0.0005	----	----	----	----	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0005	µg/L	<0.0005	----	----	----	----	
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0005	µg/L	<0.0005	----	----	----	----	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	µg/L	<0.0005	----	----	----	----	
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	----	<0.02	<0.02	<0.02	<0.02	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	----	<0.05	<0.05	<0.05	<0.05	
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	----	<0.05	<0.05	<0.05	<0.05	
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	----	<0.05	<0.05	<0.05	<0.05	



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW037_240409	0021_SW040_240409	0021_SW043_240409	0021_SW044_240409	0021_SW045_240409
Sampling date / time				09-Apr-2024 15:04	09-Apr-2024 14:47	09-Apr-2024 14:35	09-Apr-2024 12:40	09-Apr-2024 12:20
Compound	CAS Number	LOR	Unit	ES2412012-021	ES2412012-022	ES2412012-023	ES2412012-024	ES2412012-025
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	----	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	----	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	----	<0.02	<0.02	<0.02	<0.02
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0005	µg/L	<0.0005	----	----	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.001	µg/L	<0.001	----	----	----	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.001	µg/L	<0.001	----	----	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.001	µg/L	<0.001	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.001	µg/L	<0.001	----	----	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0005	µg/L	<0.0005	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0005	µg/L	<0.0005	----	----	----	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	----	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	----	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	----	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	----	<0.05	<0.05	<0.05	<0.05
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.001	µg/L	<0.001	----	----	----	----



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW037_240409	0021_SW040_240409	0021_SW043_240409	0021_SW044_240409	0021_SW045_240409
Sampling date / time				09-Apr-2024 15:04	09-Apr-2024 14:47	09-Apr-2024 14:35	09-Apr-2024 12:40	09-Apr-2024 12:20
Compound	CAS Number	LOR	Unit	ES2412012-021	ES2412012-022	ES2412012-023	ES2412012-024	ES2412012-025
				Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued								
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.001	µg/L	<0.001	----	----	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.001	µg/L	<0.001	----	----	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.001	µg/L	<0.001	----	----	----	----
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	----	<0.01	1.50	2.05	0.05
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	----	<0.01	1.37	1.90	0.05
Sum of PFAS (WA DER List)	----	0.01	µg/L	----	<0.01	1.44	1.97	0.05
^ Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	µg/L	0.0064	----	----	----	----
^ Sum of PFAS (WA DER List)	----	0.0002	µg/L	0.0083	----	----	----	----
^ Sum of PFAS	----	0.0002	µg/L	0.0083	----	----	----	----
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	----	96.7	94.7	100	93.8
13C8-PFOA	----	0.02	%	----	103	104	104	105
13C4-PFOS	----	0.0005	%	92.3	----	----	----	----
13C8-PFOA	----	0.0005	%	98.6	----	----	----	----



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW048_240410	0021_SW052_240409	0021_SW053_240409	0021_SW056_240409	0021_SW057_240409
Sampling date / time				10-Apr-2024 08:40	09-Apr-2024 11:20	09-Apr-2024 12:00	09-Apr-2024 11:00	09-Apr-2024 15:10
Compound	CAS Number	LOR	Unit	ES2412012-026	ES2412012-027	ES2412012-028	ES2412012-029	ES2412012-030
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.03	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.05	<0.02	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.06	0.35	0.96	<0.01	<0.01
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.03	0.06	<0.02	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.03	<0.01	1.66	<0.01	<0.01
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.05	<0.02	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.01	0.04	<0.01	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW048_240410	0021_SW052_240409	0021_SW053_240409	0021_SW056_240409	0021_SW057_240409
Sampling date / time				10-Apr-2024 08:40	09-Apr-2024 11:20	09-Apr-2024 12:00	09-Apr-2024 11:00	09-Apr-2024 15:10
Compound	CAS Number	LOR	Unit	ES2412012-026	ES2412012-027	ES2412012-028	ES2412012-029	ES2412012-030
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	0.09	0.39	2.85	<0.01	<0.01
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.09	0.35	2.62	<0.01	<0.01
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.09	0.36	2.74	<0.01	<0.01
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	99.3	96.4	96.7	102	101
13C8-PFOA	----	0.02	%	106	106	106	105	106



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: SURFACE WATER (Matrix: WATER)			Sample ID	0021_SW058_240409	0021_SW059_240410	0021_SW060_240410	0021_SW062_240408	0021_SW064_240408
Sampling date / time				09-Apr-2024 15:45	10-Apr-2024 13:31	10-Apr-2024 10:48	08-Apr-2024 14:54	08-Apr-2024 14:29
Compound	CAS Number	LOR	Unit	ES2412012-031	ES2412012-032	ES2412012-033	ES2412012-034	ES2412012-035
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW058_240409	0021_SW059_240410	0021_SW060_240410	0021_SW062_240408	0021_SW064_240408
Sampling date / time				09-Apr-2024 15:45	10-Apr-2024 13:31	10-Apr-2024 10:48	08-Apr-2024 14:54	08-Apr-2024 14:29
Compound	CAS Number	LOR	Unit	ES2412012-031	ES2412012-032	ES2412012-033	ES2412012-034	ES2412012-035
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Sum of PFAS (WA DER List)	----	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	96.6	99.5	100	99.2	100
13C8-PFOA	----	0.02	%	107	106	107	105	106



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW068_240410	0021_SW069_240410	0021_SW076_240410	0021_SW077_240410	0021_SW078_240410
Sampling date / time				10-Apr-2024 11:03	10-Apr-2024 11:19	10-Apr-2024 09:00	10-Apr-2024 09:15	10-Apr-2024 09:30
Compound	CAS Number	LOR	Unit	ES2412012-036	ES2412012-037	ES2412012-038	ES2412012-039	ES2412012-040
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	0.02
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	0.02
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW068_240410	0021_SW069_240410	0021_SW076_240410	0021_SW077_240410	0021_SW078_240410
Sampling date / time				10-Apr-2024 11:03	10-Apr-2024 11:19	10-Apr-2024 09:00	10-Apr-2024 09:15	10-Apr-2024 09:30
Compound	CAS Number	LOR	Unit	ES2412012-036	ES2412012-037	ES2412012-038	ES2412012-039	ES2412012-040
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	0.04
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	0.04
Sum of PFAS (WA DER List)	----	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	0.04
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	101	98.8	99.5	100	116
13C8-PFOA	----	0.02	%	106	105	104	108	118



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: SURFACE WATER (Matrix: WATER)				Sample ID	0021_SW079_240410	0021_SW080_240410	0021_SW083_240409	0021_SW085_240409	0021_SW110_240410
Sampling date / time				10-Apr-2024 09:45	10-Apr-2024 10:00	09-Apr-2024 15:53	09-Apr-2024 10:30	10-Apr-2024 14:14	
Compound	CAS Number	LOR	Unit	ES2412012-041	ES2412012-042	ES2412012-043	ES2412012-044	ES2412012-045	
				Result	Result	Result	Result	Result	
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	0.03	
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	0.04	
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.06	<0.01	<0.01	<0.01	0.46	
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.05	<0.01	<0.01	<0.01	0.70	
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1	
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	0.08	
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	<0.01	<0.01	0.02	
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW079_240410	0021_SW080_240410	0021_SW083_240409	0021_SW085_240409	0021_SW110_240410
Sampling date / time				10-Apr-2024 09:45	10-Apr-2024 10:00	09-Apr-2024 15:53	09-Apr-2024 10:30	10-Apr-2024 14:14
Compound	CAS Number	LOR	Unit	ES2412012-041	ES2412012-042	ES2412012-043	ES2412012-044	ES2412012-045
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	0.11	<0.01	<0.01	<0.01	1.33
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.11	<0.01	<0.01	<0.01	1.16
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.11	<0.01	<0.01	<0.01	1.29
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	99.6	98.0	100	96.5	95.0
13C8-PFOA	----	0.02	%	104	106	104	107	104



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW112_240410	0021_SW126_240411	0021_SW127_240410	0021_SW130_240411	0021_SW153_240410
Sampling date / time				10-Apr-2024 14:25	11-Apr-2024 10:29	10-Apr-2024 12:50	11-Apr-2024 08:50	10-Apr-2024 12:46
Compound	CAS Number	LOR	Unit	ES2412012-046	ES2412012-047	ES2412012-048	ES2412012-049	ES2412012-050
				Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.28	0.13	0.04	0.12
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.30	0.19	0.06	0.19
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.12	1.36	2.64	0.81	2.62
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.10	0.03	0.10
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.36	0.23	3.26	0.89	3.62
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.18	0.04	<0.02	0.04
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.72	0.32	0.11	0.30
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.07	0.04	<0.02	0.04
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.03	0.09	0.03	0.08
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_SW112_240410	0021_SW126_240411	0021_SW127_240410	0021_SW130_240411	0021_SW153_240410
Sampling date / time				10-Apr-2024 14:25	11-Apr-2024 10:29	10-Apr-2024 12:50	11-Apr-2024 08:50	10-Apr-2024 12:46
Compound	CAS Number	LOR	Unit	ES2412012-046	ES2412012-047	ES2412012-048	ES2412012-049	ES2412012-050
				Result	Result	Result	Result	Result
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	0.48	3.27	6.85	1.97	7.15
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	0.48	1.59	5.90	1.70	6.24
Sum of PFAS (WA DER List)	----	0.01	µg/L	0.48	2.87	6.52	1.88	6.82
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	98.4	97.0	101	98.7	97.2
13C8-PFOA	----	0.02	%	105	105	104	106	106



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: SURFACE WATER (Matrix: WATER)				Sample ID	0021_QC110_240410	0021_QC114_240411	0021_OTH006_240411 1	0021_OTH005_240411 0	0021_OTH004_240411 1
Sampling date / time					10-Apr-2024 14:17	11-Apr-2024 10:30	11-Apr-2024 10:10	10-Apr-2024 14:26	11-Apr-2024 09:45
Compound	CAS Number	LOR	Unit	ES2412012-052	ES2412012-053	ES2412012-058	ES2412012-059	ES2412012-060	
				Result	Result	Result	Result	Result	
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.03	0.29	<0.02	<0.02	0.10	
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.04	0.29	<0.02	<0.02	0.15	
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.46	1.33	<0.01	0.04	2.11	
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	0.14	
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.72	0.17	<0.01	0.18	3.66	
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1	
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.19	<0.02	<0.02	0.14	
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.10	0.71	0.02	<0.02	1.01	
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.07	<0.02	<0.02	0.06	
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.02	0.03	<0.01	<0.01	0.15	
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

Sub-Matrix: SURFACE WATER (Matrix: WATER)				Sample ID	0021_QC110_240410	0021_QC114_240411	0021_OTH006_240411 1	0021_OTH005_240411 0	0021_OTH004_240411 1
Sampling date / time					10-Apr-2024 14:17	11-Apr-2024 10:30	11-Apr-2024 10:10	10-Apr-2024 14:26	11-Apr-2024 09:45
Compound	CAS Number	LOR	Unit	ES2412012-052	ES2412012-053	ES2412012-058	ES2412012-059	ES2412012-060	
				Result	Result	Result	Result	Result	
EP231C: Perfluoroalkyl Sulfonamides - Continued									
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02	
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05	
EP231P: PFAS Sums									
Sum of PFAS	----	0.01	µg/L	1.37	3.18	0.02	0.22	7.55	
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	1.18	1.50	<0.01	0.22	5.77	
Sum of PFAS (WA DER List)	----	0.01	µg/L	1.33	2.79	0.02	0.22	7.23	
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.02	%	98.9	101	97.2	99.9	100	
13C8-PFOA	----	0.02	%	105	105	107	105	109	



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_OTH003_24041 1	0021_OTH002_24041 0	0021_OTH001_24041 1	----	----
Sampling date / time				11-Apr-2024 10:30	10-Apr-2024 14:05	11-Apr-2024 09:45	----	----
Compound	CAS Number	LOR	Unit	ES2412012-061	ES2412012-062	ES2412012-063	-----	-----
				Result	Result	Result	----	----
EP231A: Perfluoroalkyl Sulfonic Acids								
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.08	0.02	<0.02	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.14	0.03	<0.02	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	1.87	0.27	<0.01	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.19	<0.02	<0.02	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	7.18	0.60	0.01	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	<0.02	----	----
EP231B: Perfluoroalkyl Carboxylic Acids								
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	<0.1	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	0.06	0.03	<0.02	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.30	0.19	<0.02	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	0.05	0.02	<0.02	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.13	0.06	<0.01	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	<0.02	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	<0.05	----	----
EP231C: Perfluoroalkyl Sulfonamides								
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	<0.02	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	<0.05	----	----



Analytical Results

Sub-Matrix: SURFACE WATER
 (Matrix: WATER)

Sample ID

				0021_OTH003_24041 1	0021_OTH002_24041 0	0021_OTH001_24041 1	----	----
Sampling date / time				11-Apr-2024 10:30	10-Apr-2024 14:05	11-Apr-2024 09:45	----	----
Compound	CAS Number	LOR	Unit	ES2412012-061	ES2412012-062	ES2412012-063	-----	-----
				Result	Result	Result	----	----
EP231C: Perfluoroalkyl Sulfonamides - Continued								
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	<0.05	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	<0.05	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	<0.05	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	<0.02	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	<0.02	----	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	<0.05	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	<0.05	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	<0.05	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	<0.05	----	----
EP231P: PFAS Sums								
Sum of PFAS	----	0.01	µg/L	10.1	1.22	0.01	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L	9.05	0.87	0.01	----	----
Sum of PFAS (WA DER List)	----	0.01	µg/L	9.67	1.19	0.01	----	----
EP231S: PFAS Surrogate								
13C4-PFOS	----	0.02	%	97.0	101	101	----	----
13C8-PFOA	----	0.02	%	108	114	112	----	----



Surrogate Control Limits

Sub-Matrix: GROUNDWATER		Recovery Limits (%)	
Compound	CAS Number	Low	High
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

Sub-Matrix: SURFACE WATER		Recovery Limits (%)	
Compound	CAS Number	Low	High
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120



QUALITY CONTROL REPORT

Work Order : **ES2412012**

Page : 1 of 20

Amendment : **1**

Client : **AECOM AUSTRALIA PTY LTD**

Laboratory : Environmental Division Sydney

Contact : [REDACTED]

Contact : [REDACTED]

Address : LEVEL 2 60 MARCUS CLARKE ST
CANBERRA ACT, AUSTRALIA 2600

Address : 277-289 Woodpark Road Smithfield NSW Australia 2164

Telephone : ----

Telephone : +61 2 8784 8555

Project : ACT_0021_PFASOMP_24

Date Samples Received : 12-Apr-2024

Order number : 60612562_4.1

Date Analysis Commenced : 17-Apr-2024

C-O-C number : 66217

Issue Date : 20-May-2024

Sampler : [REDACTED]

Site : 0021 SW

Quote number : SY/139/19 v4 60612562_4.1

No. of samples received : 63

No. of samples analysed : 62



Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted, unless the sampling was conducted by ALS. This document shall not be reproduced, except in full.

This Quality Control Report contains the following information:

- Laboratory Duplicate (DUP) Report; Relative Percentage Difference (RPD) and Acceptance Limits
- Method Blank (MB) and Laboratory Control Spike (LCS) Report; Recovery and Acceptance Limits
- Matrix Spike (MS) Report; Recovery and Acceptance Limits

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories

Position

Accreditation Category

[REDACTED]

LCMS Coordinator

Sydney Organics, Smithfield, NSW



General Comments

The analytical procedures used by ALS have been developed from established internationally recognised procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are fully validated and are often at the client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis. Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

Key :
 Anonymous = Refers to samples which are not specifically part of this work order but formed part of the QC process lot
 CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
 LOR = Limit of reporting
 RPD = Relative Percentage Difference
 # = Indicates failed QC

Laboratory Duplicate (DUP) Report

The quality control term Laboratory Duplicate refers to a randomly selected intralaboratory split. Laboratory duplicates provide information regarding method precision and sample heterogeneity. The permitted ranges for the Relative Percent Deviation (RPD) of Laboratory Duplicates are specified in ALS Method QWI-EN/38 and are dependent on the magnitude of results in comparison to the level of reporting: Result < 10 times LOR: No Limit; Result between 10 and 20 times LOR: 0% - 50%; Result > 20 times LOR: 0% - 20%.

Sub-Matrix: **WATER**

Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5738215)									
ES2412012-001	0021_SW001_240410	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	1.96	2.19	10.9	0% - 20%
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	2.84	3.41	18.3	0% - 20%
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.10	0.11	13.4	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.16	0.18	10.1	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.07	0.08	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
ES2412012-013	0021_SW022_240410	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.98	0.91	7.8	0% - 20%
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.39	0.34	12.3	0% - 20%
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	0.05	0.04	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	0.08	0.08	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	0.02	0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5738216)									
ES2412012-022	0021_SW040_240409	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
ES2412012-032	0021_SW059_240410	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5738216) - continued									
ES2412012-032	0021_SW059_240410	EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5738217)									
ES2412012-041	0021_SW079_240410	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.06	0.06	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.05	0.06	19.5	No Limit
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
ES2412012-051	0021_QC106_240410	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.18	0.18	0.0	0% - 50%
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.13	0.14	13.2	0% - 50%
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 5743845)									
ES2412694-002	Anonymous	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
ES2413024-001	Anonymous	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	0.01	0.01	0.0	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.08	0.07	16.5	No Limit
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5738215)									
ES2412012-001	0021_SW001_240410	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.08	0.08	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	0.05	0.06	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.39	0.45	13.4	0% - 20%
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	0.06	0.06	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5738215) - continued									
ES2412012-001	0021_SW001_240410	EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
ES2412012-013	0021_SW022_240410	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	0.02	0.02	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	0.05	0.05	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
		EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5738216)							
ES2412012-022	0021_SW040_240409	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
		ES2412012-032	0021_SW059_240410	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3			0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4			0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9			0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231X: Perfluorononanoic acid (PFNA)	375-95-1			0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2			0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8			0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1			0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8			0.02	µg/L	<0.02	<0.02	0.0	No Limit
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7			0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4			0.1	µg/L	<0.1	<0.1	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5738217)									
ES2412012-041	0021_SW079_240410	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
ES2412012-051	0021_QC106_240410	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5743845)									
ES2412694-002	Anonymous	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.0	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
ES2413024-001	Anonymous	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	1.14	1.11	2.1	0% - 20%
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	0.20	0.20	0.0	0% - 50%
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	1.09	1.05	3.3	0% - 20%



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 5743845) - continued									
ES2413024-001	Anonymous	EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	0.98	0.94	4.0	0% - 20%
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	0.13	0.15	16.0	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	0.13	0.14	11.0	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.02	0.0	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5738215)									
ES2412012-001	0021_SW001_240410	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2412012-013	0021_SW022_240410	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5738216)									
ES2412012-022	0021_SW040_240409	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5738216) - continued									
ES2412012-022	0021_SW040_240409	EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2412012-032	0021_SW059_240410	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5738217)							
ES2412012-041	0021_SW079_240410	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2412012-051	0021_QC106_240410	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5738217) - continued									
ES2412012-051	0021_QC106_240410	EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 5743845)									
ES2412694-002	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2413024-001	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5738215)									
ES2412012-001	0021_SW001_240410	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5738215) - continued									
ES2412012-001	0021_SW001_240410	EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2412012-013	0021_SW022_240410	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5738216)									
ES2412012-022	0021_SW040_240409	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2412012-032	0021_SW059_240410	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5738217)									
ES2412012-041	0021_SW079_240410	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit



Sub-Matrix: WATER				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	LOR	Unit	Original Result	Duplicate Result	RPD (%)	Acceptable RPD (%)
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5738217) - continued									
ES2412012-051	0021_QC106_240410	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 5743845)									
ES2412694-002	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
ES2413024-001	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.0	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	18.1	18.0	0.4	0% - 20%
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	0.35	0.43	20.4	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.0	No Limit
EP231P: PFAS Sums (QC Lot: 5738215)									
ES2412012-001	0021_SW001_240410	EP231X: Sum of PFAS	----	0.01	µg/L	5.77	6.68	14.6	0% - 20%
ES2412012-013	0021_SW022_240410	EP231X: Sum of PFAS	----	0.01	µg/L	1.59	1.46	8.5	0% - 20%
EP231P: PFAS Sums (QC Lot: 5738216)									
ES2412012-022	0021_SW040_240409	EP231X: Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	0.0	No Limit
ES2412012-032	0021_SW059_240410	EP231X: Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	0.0	No Limit
EP231P: PFAS Sums (QC Lot: 5738217)									
ES2412012-041	0021_SW079_240410	EP231X: Sum of PFAS	----	0.01	µg/L	0.11	0.12	8.7	0% - 50%
ES2412012-051	0021_QC106_240410	EP231X: Sum of PFAS	----	0.01	µg/L	0.31	0.32	3.2	0% - 20%
EP231P: PFAS Sums (QC Lot: 5743845)									
ES2412694-002	Anonymous	EP231X: Sum of PFAS	----	0.01	µg/L	<0.01	<0.01	0.0	No Limit
ES2413024-001	Anonymous	EP231X: Sum of PFAS	----	0.01	µg/L	22.2	22.1	0.4	0% - 20%



Method Blank (MB) and Laboratory Control Sample (LCS) Report

The quality control term Method / Laboratory Blank refers to an analyte free matrix to which all reagents are added in the same volumes or proportions as used in standard sample preparation. The purpose of this QC parameter is to monitor potential laboratory contamination. The quality control term Laboratory Control Sample (LCS) refers to a certified reference material, or a known interference free matrix spiked with target analytes. The purpose of this QC parameter is to monitor method precision and accuracy independent of sample matrix. Dynamic Recovery Limits are based on statistical evaluation of processed LCS.

Sub-Matrix: **WATER**

Sub-Matrix: WATER				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%) Low High	
Method: Compound	CAS Number	LOR	Unit	Result				
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5733430)								
EP231X-SUT: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0005	µg/L	<0.0005	0.004 µg/L	90.3	72.0	130
EP231X-SUT: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0005	µg/L	<0.0005	0.004 µg/L	102	71.0	127
EP231X-SUT: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0005	µg/L	<0.0005	0.004 µg/L	94.8	68.0	131
EP231X-SUT: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0005	µg/L	<0.0005	0.004 µg/L	99.5	69.0	134
EP231X-SUT: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	µg/L	<0.0002	0.004 µg/L	98.3	65.0	140
EP231X-SUT: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0005	µg/L	<0.0005	0.004 µg/L	91.9	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5738215)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.25 µg/L	88.9	72.0	130
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.25 µg/L	105	71.0	127
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.25 µg/L	97.0	68.0	131
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.25 µg/L	92.9	69.0	134
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.25 µg/L	93.0	65.0	140
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	0.25 µg/L	97.4	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5738216)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.25 µg/L	100	72.0	130
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.25 µg/L	108	71.0	127
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.25 µg/L	110	68.0	131
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.25 µg/L	105	69.0	134
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.25 µg/L	99.7	65.0	140
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	0.25 µg/L	102	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5738217)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.25 µg/L	102	72.0	130
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.25 µg/L	116	71.0	127
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.25 µg/L	116	68.0	131
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.25 µg/L	118	69.0	134
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.25 µg/L	109	65.0	140
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	0.25 µg/L	105	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5743845)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.25 µg/L	79.4	72.0	130
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.25 µg/L	93.8	71.0	127



Sub-Matrix: **WATER**

				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result			Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5743845) - continued								
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.01	µg/L	<0.01	0.25 µg/L	83.2	68.0	131
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.25 µg/L	99.1	69.0	134
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.25 µg/L	91.2	65.0	140
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	0.25 µg/L	88.1	53.0	142
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5733430)								
EP231X-SUT: Perfluorobutanoic acid (PFBA)	375-22-4	0.002	µg/L	<0.0020	0.02 µg/L	103	73.0	129
EP231X-SUT: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0005	µg/L	<0.0005	0.004 µg/L	104	72.0	129
EP231X-SUT: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0005	µg/L	<0.0005	0.004 µg/L	88.5	72.0	129
EP231X-SUT: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0005	µg/L	<0.0005	0.004 µg/L	105	72.0	130
EP231X-SUT: Perfluorooctanoic acid (PFOA)	335-67-1	0.0005	µg/L	<0.0005	0.004 µg/L	98.8	71.0	133
EP231X-SUT: Perfluorononanoic acid (PFNA)	375-95-1	0.0005	µg/L	<0.0005	0.004 µg/L	87.7	69.0	130
EP231X-SUT: Perfluorodecanoic acid (PFDA)	335-76-2	0.0005	µg/L	<0.0005	0.004 µg/L	101	71.0	129
EP231X-SUT: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0005	µg/L	<0.0005	0.004 µg/L	108	69.0	133
EP231X-SUT: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0005	µg/L	<0.0005	0.004 µg/L	107	72.0	134
EP231X-SUT: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0005	µg/L	<0.0005	0.004 µg/L	91.9	65.0	144
EP231X-SUT: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	µg/L	<0.0005	0.01 µg/L	102	71.0	132
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5738215)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	1.25 µg/L	104	73.0	129
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.25 µg/L	97.1	72.0	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.25 µg/L	97.6	72.0	129
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.25 µg/L	108	72.0	130
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.25 µg/L	100	71.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	0.25 µg/L	110	69.0	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	0.25 µg/L	100	71.0	129
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	0.25 µg/L	112	69.0	133
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.25 µg/L	105	72.0	134
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	0.25 µg/L	101	65.0	144
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	0.625 µg/L	105	71.0	132
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5738216)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	1.25 µg/L	106	73.0	129
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.25 µg/L	115	72.0	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.25 µg/L	106	72.0	129
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.25 µg/L	112	72.0	130
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.25 µg/L	101	71.0	133



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%) Low High	
Method: Compound	CAS Number	LOR	Unit	Result				
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5738216) - continued								
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	0.25 µg/L	113	69.0	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	0.25 µg/L	103	71.0	129
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	0.25 µg/L	113	69.0	133
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.25 µg/L	106	72.0	134
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	0.25 µg/L	105	65.0	144
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	0.625 µg/L	117	71.0	132
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5738217)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	1.25 µg/L	112	73.0	129
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.25 µg/L	109	72.0	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.25 µg/L	106	72.0	129
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.25 µg/L	118	72.0	130
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.25 µg/L	107	71.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	0.25 µg/L	121	69.0	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	0.25 µg/L	105	71.0	129
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	0.25 µg/L	116	69.0	133
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.25 µg/L	116	72.0	134
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	0.25 µg/L	120	65.0	144
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	0.625 µg/L	128	71.0	132
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5743845)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	1.25 µg/L	79.2	73.0	129
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.25 µg/L	97.4	72.0	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.25 µg/L	79.2	72.0	129
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.25 µg/L	98.3	72.0	130
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.25 µg/L	95.9	71.0	133
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	0.25 µg/L	97.4	69.0	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	0.25 µg/L	94.4	71.0	129
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	0.25 µg/L	103	69.0	133
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.25 µg/L	112	72.0	134
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	0.25 µg/L	98.8	65.0	144
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	0.625 µg/L	97.7	71.0	132
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5733430)								
EP231X-SUT: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0005	µg/L	<0.0005	0.004 µg/L	102	67.0	137
EP231X-SUT: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.001	µg/L	<0.001	0.01 µg/L	116	68.0	141



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%) Low High	
Method: Compound	CAS Number	LOR	Unit	Result				
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5733430) - continued								
EP231X-SUT: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.001	µg/L	<0.001	0.01 µg/L	107	56.6	136
EP231X-SUT: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.001	µg/L	<0.001	0.01 µg/L	105	61.9	129
EP231X-SUT: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.001	µg/L	<0.001	0.01 µg/L	121	52.8	135
EP231X-SUT: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0005	µg/L	<0.0005	0.004 µg/L	114	65.0	136
EP231X-SUT: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0005	µg/L	<0.0005	0.004 µg/L	106	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5738215)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	0.25 µg/L	104	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	0.625 µg/L	118	68.0	141
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	0.625 µg/L	103	62.6	147
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	0.625 µg/L	99.5	66.0	145
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	0.625 µg/L	103	57.6	145
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	0.25 µg/L	112	65.0	136
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	0.25 µg/L	103	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5738216)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	0.25 µg/L	102	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	0.625 µg/L	131	68.0	141
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	0.625 µg/L	101	62.6	147
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	0.625 µg/L	102	66.0	145
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	0.625 µg/L	100	57.6	145
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	0.25 µg/L	114	65.0	136
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	0.25 µg/L	124	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5738217)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	0.25 µg/L	107	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	0.625 µg/L	121	68.0	141
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	0.625 µg/L	115	62.6	147

Sub-Matrix: WATER				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%) Low High	
Method: Compound	CAS Number	LOR	Unit	Result				
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5738217) - continued								
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	0.625 µg/L	117	66.0	145
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	0.625 µg/L	106	57.6	145
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	0.25 µg/L	129	65.0	136
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	0.25 µg/L	113	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5743845)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	0.25 µg/L	95.3	67.0	137
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	0.625 µg/L	105	68.0	141
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	0.625 µg/L	92.9	62.6	147
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	0.625 µg/L	110	66.0	145
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	0.625 µg/L	105	57.6	145
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	0.25 µg/L	89.3	65.0	136
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	0.25 µg/L	79.0	61.0	135
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5733430)								
EP231X-SUT: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.001	µg/L	<0.001	0.004 µg/L	105	63.0	143
EP231X-SUT: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.001	µg/L	<0.001	0.004 µg/L	88.9	64.0	140
EP231X-SUT: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.001	µg/L	<0.001	0.004 µg/L	97.6	67.0	138
EP231X-SUT: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.001	µg/L	<0.001	0.004 µg/L	88.3	60.9	136
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5738215)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	0.25 µg/L	101	63.0	143
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	0.25 µg/L	115	64.0	140
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	0.25 µg/L	122	67.0	138
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	0.25 µg/L	122	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5738216)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	0.25 µg/L	98.7	63.0	143
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	0.25 µg/L	114	64.0	140
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	0.25 µg/L	118	67.0	138
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	0.25 µg/L	122	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5738217)								



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike Concentration	Spike Recovery (%) LCS	Acceptable Limits (%) Low High	
Method: Compound	CAS Number	LOR	Unit	Result				
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5738217) - continued								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	0.25 µg/L	100	63.0	143
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	0.25 µg/L	119	64.0	140
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	0.25 µg/L	99.9	67.0	138
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	0.25 µg/L	104	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5743845)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	0.25 µg/L	94.7	63.0	143
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	0.25 µg/L	100	64.0	140
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	0.25 µg/L	81.4	67.0	138
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	0.25 µg/L	76.4	71.4	144
EP231P: PFAS Sums (QCLot: 5733430)								
EP231X-SUT: Sum of PFHxS and PFOS	355-46-4/17 63-23-1	0.0002	µg/L	<0.0002	----	----	----	----
EP231X-SUT: Sum of PFAS (WA DER List)	----	0.0002	µg/L	<0.0002	----	----	----	----
EP231X-SUT: Sum of PFAS	----	0.0002	µg/L	<0.0002	----	----	----	----

Matrix Spike (MS) Report

The quality control term Matrix Spike (MS) refers to an intralaboratory split sample spiked with a representative set of target analytes. The purpose of this QC parameter is to monitor potential matrix effects on analyte recoveries. Static Recovery Limits as per laboratory Data Quality Objectives (DQOs). Ideal recovery ranges stated may be waived in the event of sample matrix interference.

Sub-Matrix: **WATER**

Sub-Matrix: WATER				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5738215)							
ES2412012-004	0021_SW004_240412	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.25 µg/L	99.8	72.0	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.25 µg/L	108	71.0	127
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.25 µg/L	103	68.0	131
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.25 µg/L	100	69.0	134
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.25 µg/L	101	65.0	140
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.25 µg/L	96.2	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5738216)							
ES2412012-023	0021_SW043_240409	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.25 µg/L	102	72.0	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.25 µg/L	120	71.0	127
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.25 µg/L	126	68.0	131
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.25 µg/L	112	69.0	134
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.25 µg/L	116	65.0	140
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.25 µg/L	107	53.0	142

Matrix Spike (MS) Report

				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5738217)							
ES2412012-042	0021_SW080_240410	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.25 µg/L	102	72.0	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.25 µg/L	110	71.0	127
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.25 µg/L	115	68.0	131
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.25 µg/L	114	69.0	134
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.25 µg/L	111	65.0	140
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.25 µg/L	99.3	53.0	142
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 5743845)							
ES2412694-002	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.25 µg/L	77.8	72.0	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.25 µg/L	87.2	71.0	127
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.25 µg/L	84.5	68.0	131
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.25 µg/L	107	69.0	134
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.25 µg/L	106	65.0	140
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.25 µg/L	78.5	53.0	142
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5738215)							
ES2412012-004	0021_SW004_240412	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	1.25 µg/L	109	73.0	129
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.25 µg/L	101	72.0	129
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.25 µg/L	104	72.0	129
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.25 µg/L	116	72.0	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.25 µg/L	105	71.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.25 µg/L	113	69.0	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.25 µg/L	107	71.0	129
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.25 µg/L	114	69.0	133
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.25 µg/L	106	72.0	134
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.25 µg/L	106	65.0	144
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.625 µg/L	111	71.0	132		
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5738216)							
ES2412012-023	0021_SW043_240409	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	1.25 µg/L	116	73.0	129
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.25 µg/L	123	72.0	129
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.25 µg/L	114	72.0	129
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.25 µg/L	122	72.0	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.25 µg/L	109	71.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.25 µg/L	122	69.0	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.25 µg/L	105	71.0	129
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.25 µg/L	115	69.0	133
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.25 µg/L	110	72.0	134
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.25 µg/L	109	65.0	144
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.625 µg/L	121	71.0	132
		EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5738217)					



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5738217) - continued							
ES2412012-042	0021_SW080_240410	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	1.25 µg/L	111	73.0	129
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.25 µg/L	110	72.0	129
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.25 µg/L	112	72.0	129
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.25 µg/L	116	72.0	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.25 µg/L	108	71.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.25 µg/L	116	69.0	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.25 µg/L	103	71.0	129
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.25 µg/L	115	69.0	133
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.25 µg/L	113	72.0	134
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.25 µg/L	108	65.0	144
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.625 µg/L	127	71.0	132
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 5743845)							
ES2412694-002	Anonymous	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	1.25 µg/L	81.9	73.0	129
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.25 µg/L	101	72.0	129
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.25 µg/L	81.6	72.0	129
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.25 µg/L	101	72.0	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.25 µg/L	97.9	71.0	133
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.25 µg/L	93.5	69.0	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.25 µg/L	96.2	71.0	129
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.25 µg/L	101	69.0	133
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.25 µg/L	115	72.0	134
		EP231X: Perfluorotridecanoic acid (PFTTrDA)	72629-94-8	0.25 µg/L	123	65.0	144
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.625 µg/L	95.2	71.0	132
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5738215)							
ES2412012-004	0021_SW004_240412	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.25 µg/L	109	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.625 µg/L	111	68.0	141
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.625 µg/L	109	62.6	147
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.625 µg/L	105	66.0	145
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.625 µg/L	105	57.6	145
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.25 µg/L	119	65.0	136
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.25 µg/L	118	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5738216)							
ES2412012-023	0021_SW043_240409	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.25 µg/L	103	67.0	137



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5738216) - continued							
ES2412012-023	0021_SW043_240409	EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.625 µg/L	129	68.0	141
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.625 µg/L	114	62.6	147
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.625 µg/L	98.8	66.0	145
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.625 µg/L	102	57.6	145
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.25 µg/L	109	65.0	136
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.25 µg/L	124	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5738217)							
ES2412012-042	0021_SW080_240410	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.25 µg/L	104	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.625 µg/L	126	68.0	141
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.625 µg/L	104	62.6	147
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.625 µg/L	116	66.0	145
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.625 µg/L	102	57.6	145
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.25 µg/L	128	65.0	136
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.25 µg/L	120	61.0	135
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 5743845)							
ES2412694-002	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.25 µg/L	92.3	67.0	137
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.625 µg/L	86.7	68.0	141
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.625 µg/L	75.8	62.6	147
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.625 µg/L	107	66.0	145
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.625 µg/L	96.8	57.6	145
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.25 µg/L	123	65.0	136
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.25 µg/L	92.6	61.0	135
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5738215)							
ES2412012-004	0021_SW004_240412	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.25 µg/L	94.9	63.0	143



Sub-Matrix: **WATER**

Sub-Matrix: WATER				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Acceptable Limits (%)	
Laboratory sample ID	Sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5738215) - continued							
ES2412012-004	0021_SW004_240412	EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.25 µg/L	110	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.25 µg/L	102	67.0	138
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.25 µg/L	119	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5738216)							
ES2412012-023	0021_SW043_240409	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.25 µg/L	88.6	63.0	143
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.25 µg/L	128	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.25 µg/L	127	67.0	138
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.25 µg/L	111	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5738217)							
ES2412012-042	0021_SW080_240410	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.25 µg/L	94.5	63.0	143
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.25 µg/L	123	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.25 µg/L	120	67.0	138
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.25 µg/L	111	71.4	144
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 5743845)							
ES2412694-002	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.25 µg/L	79.7	63.0	143
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.25 µg/L	106	64.0	140
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.25 µg/L	99.5	67.0	138
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.25 µg/L	82.2	71.4	144



QA/QC Compliance Assessment to assist with Quality Review

Work Order : ES2412012

Page : 1 of 9

Amendment : 1

Client : AECOM AUSTRALIA PTY LTD

Laboratory : Environmental Division Sydney

Contact : [REDACTED]

Telephone : +61 2 8784 8555

Project : ACT_0021_PFASOMP_24

Date Samples Received : 12-Apr-2024

Site : 0021 SW

Issue Date : 20-May-2024

Sampler : [REDACTED] [REDACTED]

No. of samples received : 63

Order number : 60612562_4.1

No. of samples analysed : 62

This report is automatically generated by the ALS LIMS through interpretation of the ALS Quality Control Report and several Quality Assurance parameters measured by ALS. This automated reporting highlights any non-conformances, facilitates faster and more accurate data validation and is designed to assist internal expert and external Auditor review. Many components of this report contribute to the overall DQO assessment and reporting for guideline compliance.

Brief method summaries and references are also provided to assist in traceability.

Summary of Outliers

Outliers : Quality Control Samples

This report highlights outliers flagged in the Quality Control (QC) Report.

- NO Method Blank value outliers occur.
- NO Duplicate outliers occur.
- NO Laboratory Control outliers occur.
- NO Matrix Spike outliers occur.
- For all regular sample matrices, where applicable to the methodology, NO surrogate recovery outliers occur.

Outliers : Analysis Holding Time Compliance

- NO Analysis Holding Time Outliers exist.

Outliers : Frequency of Quality Control Samples

- Quality Control Sample Frequency Outliers exist - please see following pages for full details.



Outliers : Frequency of Quality Control Samples

Matrix: **WATER**

Quality Control Sample Type		Count		Rate (%)		Quality Control Specification
Analytical Methods	Method	QC	Regular	Actual	Expected	
Laboratory Duplicates (DUP)						
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	0	12	0.00	10.00	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)						
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	0	12	0.00	5.00	NEPM 2013 B3 & ALS QC Standard

Analysis Holding Time Compliance

If samples are identified below as having been analysed or extracted outside of recommended holding times, this should be taken into consideration when interpreting results.

This report summarizes extraction / preparation and analysis times and compares each with ALS recommended holding times (referencing USEPA SW 846, APHA, AS and NEPM) based on the sample container provided. Dates reported represent first date of extraction or analysis and preclude subsequent dilutions and reruns. A listing of breaches (if any) is provided herein.

Holding time for leachate methods (e.g. TCLP) vary according to the analytes reported. Assessment compares the leach date with the shortest analyte holding time for the equivalent soil method. These are: organics 14 days, mercury 28 days & other metals 180 days. A recorded breach does not guarantee a breach for all non-volatile parameters.

Holding times for VOC in soils vary according to analytes of interest. Vinyl Chloride and Styrene holding time is 7 days; others 14 days. A recorded breach does not guarantee a breach for all VOC analytes and should be verified in case the reported breach is a false positive or Vinyl Chloride and Styrene are not key analytes of interest/concern.

Matrix: **WATER**

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231A: Perfluoroalkyl Sulfonic Acids								
HDPE (no PTFE) (EP231X) 0021_SW062_240408,	0021_SW064_240408	08-Apr-2024	24-Apr-2024	05-Oct-2024	✔	26-Apr-2024	05-Oct-2024	✔
HDPE (no PTFE) (EP231X-SUT) 0021_SW036_240409,	0021_SW037_240409	09-Apr-2024	18-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_SW032_240409, 0021_SW083_240409, 0021_QC103_240409	0021_SW034_240409, 0021_SW085_240409,	09-Apr-2024	23-Apr-2024	06-Oct-2024	✔	26-Apr-2024	06-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_SW040_240409, 0021_SW044_240409, 0021_SW052_240409, 0021_SW056_240409, 0021_SW058_240409	0021_SW043_240409, 0021_SW045_240409, 0021_SW053_240409, 0021_SW057_240409,	09-Apr-2024	24-Apr-2024	06-Oct-2024	✔	26-Apr-2024	06-Oct-2024	✔
HDPE (no PTFE) (EP231X)								



Matrix: WATER

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231A: Perfluoroalkyl Sulfonic Acids - Continued								
0021_SW001_240410, 0021_SW011_240410, 0021_SW022_240410, 0021_SW025_240410, 0021_SW035_240410, 0021_SW080_240410, 0021_SW112_240410, 0021_SW153_240410, 0021_QC110_240410, 0021_QC109_240410,	0021_SW010_240410, 0021_SW013_240410, 0021_SW024_240410, 0021_SW027_240410, 0021_SW079_240410, 0021_SW110_240410, 0021_SW127_240410, 0021_QC106_240410, 0021_QC105_240410, 0021_OTH005_240410	10-Apr-2024	23-Apr-2024	07-Oct-2024	✔	26-Apr-2024	07-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_SW048_240410, 0021_SW060_240410, 0021_SW069_240410, 0021_SW077_240410, 0021_OTH002_240410	0021_SW059_240410, 0021_SW068_240410, 0021_SW076_240410, 0021_SW078_240410,	10-Apr-2024	24-Apr-2024	07-Oct-2024	✔	26-Apr-2024	07-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_SW002_240411, 0021_SW019_240411, 0021_SW130_240411, 0021_OTH006_240411,	0021_SW003_240411, 0021_SW126_240411, 0021_QC114_240411, 0021_OTH004_240411	11-Apr-2024	23-Apr-2024	08-Oct-2024	✔	26-Apr-2024	08-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_OTH003_240411,	0021_OTH001_240411	11-Apr-2024	24-Apr-2024	08-Oct-2024	✔	26-Apr-2024	08-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_SW004_240412, 0021_SW006_240412, 0021_SW021_240412	0021_SW005_240412, 0021_SW020_240412,	12-Apr-2024	23-Apr-2024	09-Oct-2024	✔	26-Apr-2024	09-Oct-2024	✔



Matrix: WATER

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231B: Perfluoroalkyl Carboxylic Acids								
HDPE (no PTFE) (EP231X) 0021_SW062_240408,	0021_SW064_240408	08-Apr-2024	24-Apr-2024	05-Oct-2024	✓	26-Apr-2024	05-Oct-2024	✓
HDPE (no PTFE) (EP231X-SUT) 0021_SW036_240409,	0021_SW037_240409	09-Apr-2024	18-Apr-2024	06-Oct-2024	✓	24-Apr-2024	06-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW032_240409, 0021_SW083_240409, 0021_QC103_240409	0021_SW034_240409, 0021_SW085_240409,	09-Apr-2024	23-Apr-2024	06-Oct-2024	✓	26-Apr-2024	06-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW040_240409, 0021_SW044_240409, 0021_SW052_240409, 0021_SW056_240409, 0021_SW058_240409	0021_SW043_240409, 0021_SW045_240409, 0021_SW053_240409, 0021_SW057_240409,	09-Apr-2024	24-Apr-2024	06-Oct-2024	✓	26-Apr-2024	06-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW001_240410, 0021_SW011_240410, 0021_SW022_240410, 0021_SW025_240410, 0021_SW035_240410, 0021_SW080_240410, 0021_SW112_240410, 0021_SW153_240410, 0021_QC110_240410, 0021_QC109_240410,	0021_SW010_240410, 0021_SW013_240410, 0021_SW024_240410, 0021_SW027_240410, 0021_SW079_240410, 0021_SW110_240410, 0021_SW127_240410, 0021_QC106_240410, 0021_QC105_240410, 0021_OTH005_240410	10-Apr-2024	23-Apr-2024	07-Oct-2024	✓	26-Apr-2024	07-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW048_240410, 0021_SW060_240410, 0021_SW069_240410, 0021_SW077_240410, 0021_OTH002_240410	0021_SW059_240410, 0021_SW068_240410, 0021_SW076_240410, 0021_SW078_240410,	10-Apr-2024	24-Apr-2024	07-Oct-2024	✓	26-Apr-2024	07-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW002_240411, 0021_SW019_240411, 0021_SW130_240411, 0021_OTH006_240411,	0021_SW003_240411, 0021_SW126_240411, 0021_QC114_240411, 0021_OTH004_240411	11-Apr-2024	23-Apr-2024	08-Oct-2024	✓	26-Apr-2024	08-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_OTH003_240411,	0021_OTH001_240411	11-Apr-2024	24-Apr-2024	08-Oct-2024	✓	26-Apr-2024	08-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW004_240412, 0021_SW006_240412, 0021_SW021_240412	0021_SW005_240412, 0021_SW020_240412,	12-Apr-2024	23-Apr-2024	09-Oct-2024	✓	26-Apr-2024	09-Oct-2024	✓



Matrix: WATER

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231C: Perfluoroalkyl Sulfonamides								
HDPE (no PTFE) (EP231X) 0021_SW062_240408,	0021_SW064_240408	08-Apr-2024	24-Apr-2024	05-Oct-2024	✓	26-Apr-2024	05-Oct-2024	✓
HDPE (no PTFE) (EP231X-SUT) 0021_SW036_240409,	0021_SW037_240409	09-Apr-2024	18-Apr-2024	06-Oct-2024	✓	24-Apr-2024	06-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW032_240409, 0021_SW083_240409, 0021_QC103_240409	0021_SW034_240409, 0021_SW085_240409,	09-Apr-2024	23-Apr-2024	06-Oct-2024	✓	26-Apr-2024	06-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW040_240409, 0021_SW044_240409, 0021_SW052_240409, 0021_SW056_240409, 0021_SW058_240409	0021_SW043_240409, 0021_SW045_240409, 0021_SW053_240409, 0021_SW057_240409,	09-Apr-2024	24-Apr-2024	06-Oct-2024	✓	26-Apr-2024	06-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW001_240410, 0021_SW011_240410, 0021_SW022_240410, 0021_SW025_240410, 0021_SW035_240410, 0021_SW080_240410, 0021_SW112_240410, 0021_SW153_240410, 0021_QC110_240410, 0021_QC109_240410,	0021_SW010_240410, 0021_SW013_240410, 0021_SW024_240410, 0021_SW027_240410, 0021_SW079_240410, 0021_SW110_240410, 0021_SW127_240410, 0021_QC106_240410, 0021_QC105_240410, 0021_OTH005_240410	10-Apr-2024	23-Apr-2024	07-Oct-2024	✓	26-Apr-2024	07-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW048_240410, 0021_SW060_240410, 0021_SW069_240410, 0021_SW077_240410, 0021_OTH002_240410	0021_SW059_240410, 0021_SW068_240410, 0021_SW076_240410, 0021_SW078_240410,	10-Apr-2024	24-Apr-2024	07-Oct-2024	✓	26-Apr-2024	07-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW002_240411, 0021_SW019_240411, 0021_SW130_240411, 0021_OTH006_240411,	0021_SW003_240411, 0021_SW126_240411, 0021_QC114_240411, 0021_OTH004_240411	11-Apr-2024	23-Apr-2024	08-Oct-2024	✓	26-Apr-2024	08-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_OTH003_240411,	0021_OTH001_240411	11-Apr-2024	24-Apr-2024	08-Oct-2024	✓	26-Apr-2024	08-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW004_240412, 0021_SW006_240412, 0021_SW021_240412	0021_SW005_240412, 0021_SW020_240412,	12-Apr-2024	23-Apr-2024	09-Oct-2024	✓	26-Apr-2024	09-Oct-2024	✓



Matrix: WATER

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
HDPE (no PTFE) (EP231X) 0021_SW062_240408,	0021_SW064_240408	08-Apr-2024	24-Apr-2024	05-Oct-2024	✓	26-Apr-2024	05-Oct-2024	✓
HDPE (no PTFE) (EP231X-SUT) 0021_SW036_240409,	0021_SW037_240409	09-Apr-2024	18-Apr-2024	06-Oct-2024	✓	24-Apr-2024	06-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW032_240409, 0021_SW083_240409, 0021_QC103_240409	0021_SW034_240409, 0021_SW085_240409,	09-Apr-2024	23-Apr-2024	06-Oct-2024	✓	26-Apr-2024	06-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW040_240409, 0021_SW044_240409, 0021_SW052_240409, 0021_SW056_240409, 0021_SW058_240409	0021_SW043_240409, 0021_SW045_240409, 0021_SW053_240409, 0021_SW057_240409,	09-Apr-2024	24-Apr-2024	06-Oct-2024	✓	26-Apr-2024	06-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW001_240410, 0021_SW011_240410, 0021_SW022_240410, 0021_SW025_240410, 0021_SW035_240410, 0021_SW080_240410, 0021_SW112_240410, 0021_SW153_240410, 0021_QC110_240410, 0021_QC109_240410,	0021_SW010_240410, 0021_SW013_240410, 0021_SW024_240410, 0021_SW027_240410, 0021_SW079_240410, 0021_SW110_240410, 0021_SW127_240410, 0021_QC106_240410, 0021_QC105_240410, 0021_OTH005_240410	10-Apr-2024	23-Apr-2024	07-Oct-2024	✓	26-Apr-2024	07-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW048_240410, 0021_SW060_240410, 0021_SW069_240410, 0021_SW077_240410, 0021_OTH002_240410	0021_SW059_240410, 0021_SW068_240410, 0021_SW076_240410, 0021_SW078_240410,	10-Apr-2024	24-Apr-2024	07-Oct-2024	✓	26-Apr-2024	07-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW002_240411, 0021_SW019_240411, 0021_SW130_240411, 0021_OTH006_240411,	0021_SW003_240411, 0021_SW126_240411, 0021_QC114_240411, 0021_OTH004_240411	11-Apr-2024	23-Apr-2024	08-Oct-2024	✓	26-Apr-2024	08-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_OTH003_240411,	0021_OTH001_240411	11-Apr-2024	24-Apr-2024	08-Oct-2024	✓	26-Apr-2024	08-Oct-2024	✓
HDPE (no PTFE) (EP231X) 0021_SW004_240412, 0021_SW006_240412, 0021_SW021_240412	0021_SW005_240412, 0021_SW020_240412,	12-Apr-2024	23-Apr-2024	09-Oct-2024	✓	26-Apr-2024	09-Oct-2024	✓



Matrix: WATER

Evaluation: ✖ = Holding time breach ; ✔ = Within holding time.

Method	Sample Date	Extraction / Preparation			Analysis			
Container / Client Sample ID(s)		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation	
EP231P: PFAS Sums								
HDPE (no PTFE) (EP231X) 0021_SW062_240408,	0021_SW064_240408	08-Apr-2024	24-Apr-2024	05-Oct-2024	✔	26-Apr-2024	05-Oct-2024	✔
HDPE (no PTFE) (EP231X-SUT) 0021_SW036_240409,	0021_SW037_240409	09-Apr-2024	18-Apr-2024	06-Oct-2024	✔	24-Apr-2024	06-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_SW032_240409, 0021_SW083_240409, 0021_QC103_240409	0021_SW034_240409, 0021_SW085_240409,	09-Apr-2024	23-Apr-2024	06-Oct-2024	✔	26-Apr-2024	06-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_SW040_240409, 0021_SW044_240409, 0021_SW052_240409, 0021_SW056_240409, 0021_SW058_240409	0021_SW043_240409, 0021_SW045_240409, 0021_SW053_240409, 0021_SW057_240409,	09-Apr-2024	24-Apr-2024	06-Oct-2024	✔	26-Apr-2024	06-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_SW001_240410, 0021_SW011_240410, 0021_SW022_240410, 0021_SW025_240410, 0021_SW035_240410, 0021_SW080_240410, 0021_SW112_240410, 0021_SW153_240410, 0021_QC110_240410, 0021_QC109_240410,	0021_SW010_240410, 0021_SW013_240410, 0021_SW024_240410, 0021_SW027_240410, 0021_SW079_240410, 0021_SW110_240410, 0021_SW127_240410, 0021_QC106_240410, 0021_QC105_240410, 0021_OTH005_240410	10-Apr-2024	23-Apr-2024	07-Oct-2024	✔	26-Apr-2024	07-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_SW048_240410, 0021_SW060_240410, 0021_SW069_240410, 0021_SW077_240410, 0021_OTH002_240410	0021_SW059_240410, 0021_SW068_240410, 0021_SW076_240410, 0021_SW078_240410,	10-Apr-2024	24-Apr-2024	07-Oct-2024	✔	26-Apr-2024	07-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_SW002_240411, 0021_SW019_240411, 0021_SW130_240411, 0021_OTH006_240411,	0021_SW003_240411, 0021_SW126_240411, 0021_QC114_240411, 0021_OTH004_240411	11-Apr-2024	23-Apr-2024	08-Oct-2024	✔	26-Apr-2024	08-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_OTH003_240411,	0021_OTH001_240411	11-Apr-2024	24-Apr-2024	08-Oct-2024	✔	26-Apr-2024	08-Oct-2024	✔
HDPE (no PTFE) (EP231X) 0021_SW004_240412, 0021_SW006_240412, 0021_SW021_240412	0021_SW005_240412, 0021_SW020_240412,	12-Apr-2024	23-Apr-2024	09-Oct-2024	✔	26-Apr-2024	09-Oct-2024	✔



Quality Control Parameter Frequency Compliance

The following report summarises the frequency of laboratory QC samples analysed within the analytical lot(s) in which the submitted sample(s) was(were) processed. Actual rate should be greater than or equal to the expected rate. A listing of breaches is provided in the Summary of Outliers.

Matrix: **WATER**

Evaluation: ✖ = Quality Control frequency not within specification ; ✔ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	Method	QC	Regular	Actual	Expected	Evaluation	
Laboratory Duplicates (DUP)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	8	74	10.81	10.00	✔	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	0	12	0.00	10.00	✖	NEPM 2013 B3 & ALS QC Standard
Laboratory Control Samples (LCS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	4	74	5.41	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	1	12	8.33	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Method Blanks (MB)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	4	74	5.41	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	1	12	8.33	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	4	74	5.41	5.00	✔	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	0	12	0.00	5.00	✖	NEPM 2013 B3 & ALS QC Standard



Brief Method Summaries

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the US EPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request. The following report provides brief descriptions of the analytical procedures employed for results reported in the Certificate of Analysis. Sources from which ALS methods have been developed are provided within the Method Descriptions.

Analytical Methods	Method	Matrix	Method Descriptions
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	WATER	In-house: Analysis of fresh and saline waters by Solid Phase Extraction (SPE) followed by LC-Electrospray-MS-MS, Negative Mode using MRM and internal standard quantitation. Isotopically labelled analogues of target analytes used as internal standards and surrogates are added to the sample container. The entire contents are transferred to a solid phase extraction (SPE) cartridge. The sample container is successively rinsed with aliquots of the elution solvent. The eluted extract is combined with an equal volume of reagent water and a portion is filtered for analysis. Method procedures and data quality objectives conform to US DoD QSM 5.4, table B-15 requirements.
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X-SUT	WATER	In-house: Analysis of fresh and saline waters by Solid Phase Extraction (SPE) followed by LC-Electrospray-MS-MS, Negative Mode using MRM and internal standard quantitation. Isotopically labelled analogues of target analytes used as internal standards and surrogates are added to the sample container. The entire contents are transferred to a solid phase extraction (SPE) cartridge. The sample container is successively rinsed with aliquots of the elution solvent. The eluted extract is concentrated, combined with an equal volume of reagent water and filtered for analysis. Method procedures and data quality objectives conform to US DoD QSM 5.4, table B-15 requirements.
Preparation Methods	Method	Matrix	Method Descriptions
Solid Phase Extraction (SPE) for PFAS in water	ORG72	WATER	In-house: Isotopically labelled analogues of target analytes used as internal standards and surrogates are added to the sample container. The entire contents are transferred to a solid phase extraction (SPE) cartridge. The sample container is successively rinsed with aliquots of the elution solvent. The eluted extract is combined with an equal volume of reagent water and a portion is filtered for analysis. Method procedures conform to US DoD QSM 5.3, table B-15 requirements.



SAMPLE RECEIPT NOTIFICATION (SRN)

Work Order : ES2412012

Amendment : 1

Client : AECOM AUSTRALIA PTY LTD
Contact : [REDACTED]
Address : LEVEL 2 60 MARCUS CLARKE ST
CANBERRA ACT, AUSTRALIA 2600

E-mail : [REDACTED]
Telephone : ----
Facsimile : ----

Project : ACT_0021_PFASOMP_24
Order number : 60612562_4.1

C-O-C number : 66217
Site : 0021 SW
Sampler : [REDACTED]

Laboratory : Environmental Division Sydney
Contact : [REDACTED]
Address : 277-289 Woodpark Road Smithfield
NSW Australia 2164

E-mail : [REDACTED]@ALSGlobal.com
Telephone : +61 2 8784 8555
Facsimile : +61-2-8784 8500

Page : 1 of 4
Quote number : ES2021AECOMAU0042 (SY/139/19 v4
60612562_4.1)
QC Level : NEPM 2013 B3 & ALS QC Standard

Dates

Date Samples Received : 12-Apr-2024 17:48
Client Requested Due Date : 24-Apr-2024

Issue Date : 20-May-2024
Scheduled Reporting Date : 24-Apr-2024

Delivery Details

Mode of Delivery : Carrier
No. of coolers/boxes : 8

Security Seal : Not Available
Temperature : 4.5°C 3.8°C 3.5°C - Ice
present

Receipt Detail : No. of samples received / analysed : 63 / 62

General Comments

- This report contains the following information:
 - Sample Container(s)/Preservation Non-Compliances
 - Summary of Sample(s) and Requested Analysis
 - Proactive Holding Time Report
 - Requested Deliverables
- **Please refer to the Proactive Holding Time Report table below which summarises breaches of recommended holding times that have occurred prior to samples/instructions being received at the laboratory. The laboratory will process these samples unless instructions are received from you indicating you do not wish to proceed. The absence of this summary table indicates that all samples have been received within the recommended holding times for the analysis requested.**
- Please direct any queries you have regarding this work order to the above ALS laboratory contact.
- Analytical work for this work order will be conducted at ALS Sydney.
- Sample Disposal - Aqueous (3 weeks), Solid (2 months ± 1 week) from receipt of samples.
- Please be aware that APHA/NEPM recommends water and soil samples be chilled to less than or equal to 6°C for chemical analysis, and less than or equal to 10°C but unfrozen for Microbiological analysis. Where samples are received above this temperature, it should be taken into consideration when interpreting results. Refer to ALS EnviroMail 85 for ALS recommendations of the best practice for chilling samples after sampling and for maintaining a cool temperature during transit.



Sample Container(s)/Preservation Non-Compliances

All comparisons are made against pretreatment/preservation AS, APHA, USEPA standards.

- No sample container / preservation non-compliance exists.

Any sample identifications that cannot be displayed entirely in the analysis summary table will be listed below.

ES2412012-057 : 11-Apr-2024 09:50 : 0021_OTH004_ENVIROPACIFIC_240411

Summary of Sample(s) and Requested Analysis

Some items described below may be part of a laboratory process necessary for the execution of client requested tasks. Packages may contain additional analyses, such as the determination of moisture content and preparation tasks, that are included in the package.

If no sampling time is provided, the sampling time will default 00:00 on the date of sampling. If no sampling date is provided, the sampling date will be assumed by the laboratory and displayed in brackets without a time component

Matrix: WATER

Laboratory sample ID	Sampling date / time	Sample ID	(On Hold) WATER No analysis requested	WATER - EP231X PFAS - Full Suite (30 analytes)	WATER - EP231X-SUT PFAS - Super Ultra Trace Waters Long Suite (30)
ES2412012-001	10-Apr-2024 13:59	0021_SW001_240410		✓	
ES2412012-002	11-Apr-2024 09:05	0021_SW002_240411		✓	
ES2412012-003	11-Apr-2024 09:38	0021_SW003_240411		✓	
ES2412012-004	12-Apr-2024 08:25	0021_SW004_240412		✓	
ES2412012-005	12-Apr-2024 08:21	0021_SW005_240412		✓	
ES2412012-006	12-Apr-2024 08:12	0021_SW006_240412		✓	
ES2412012-007	10-Apr-2024 12:20	0021_SW010_240410		✓	
ES2412012-008	10-Apr-2024 11:58	0021_SW011_240410		✓	
ES2412012-009	10-Apr-2024 11:48	0021_SW013_240410		✓	
ES2412012-010	11-Apr-2024 10:40	0021_SW019_240411		✓	
ES2412012-011	12-Apr-2024 09:15	0021_SW020_240412		✓	
ES2412012-012	12-Apr-2024 09:20	0021_SW021_240412		✓	
ES2412012-013	10-Apr-2024 08:40	0021_SW022_240410		✓	
ES2412012-014	10-Apr-2024 08:45	0021_SW024_240410		✓	
ES2412012-015	10-Apr-2024 10:00	0021_SW025_240410		✓	
ES2412012-016	10-Apr-2024 10:56	0021_SW027_240410		✓	
ES2412012-017	09-Apr-2024 09:24	0021_SW032_240409		✓	
ES2412012-018	09-Apr-2024 09:41	0021_SW034_240409		✓	
ES2412012-019	10-Apr-2024 08:15	0021_SW035_240410		✓	
ES2412012-020	09-Apr-2024 14:21	0021_SW036_240409			✓
ES2412012-021	09-Apr-2024 15:04	0021_SW037_240409			✓
ES2412012-022	09-Apr-2024 14:47	0021_SW040_240409		✓	
ES2412012-023	09-Apr-2024 14:35	0021_SW043_240409		✓	
ES2412012-024	09-Apr-2024 12:40	0021_SW044_240409		✓	
ES2412012-025	09-Apr-2024 12:20	0021_SW045_240409		✓	
ES2412012-026	10-Apr-2024 08:40	0021_SW048_240410		✓	
ES2412012-027	09-Apr-2024 11:20	0021_SW052_240409		✓	
ES2412012-028	09-Apr-2024 12:00	0021_SW053_240409		✓	
ES2412012-029	09-Apr-2024 11:00	0021_SW056_240409		✓	
ES2412012-030	09-Apr-2024 15:10	0021_SW057_240409		✓	
ES2412012-031	09-Apr-2024 15:45	0021_SW058_240409		✓	
ES2412012-032	10-Apr-2024 13:31	0021_SW059_240410		✓	
ES2412012-033	10-Apr-2024 10:48	0021_SW060_240410		✓	



			(On Hold) WATER No analysis requested	WATER - EP231X PFAS - Full Suite (30 analytes)	WATER - EP231X-SUT PFAS - Super Ultra Trace Waters Long Suite (30
ES2412012-034	08-Apr-2024 14:54	0021_SW062_240408		✓	
ES2412012-035	08-Apr-2024 14:29	0021_SW064_240408		✓	
ES2412012-036	10-Apr-2024 11:03	0021_SW068_240410		✓	
ES2412012-037	10-Apr-2024 11:19	0021_SW069_240410		✓	
ES2412012-038	10-Apr-2024 09:00	0021_SW076_240410		✓	
ES2412012-039	10-Apr-2024 09:15	0021_SW077_240410		✓	
ES2412012-040	10-Apr-2024 09:30	0021_SW078_240410		✓	
ES2412012-041	10-Apr-2024 09:45	0021_SW079_240410		✓	
ES2412012-042	10-Apr-2024 10:00	0021_SW080_240410		✓	
ES2412012-043	09-Apr-2024 15:53	0021_SW083_240409		✓	
ES2412012-044	09-Apr-2024 10:30	0021_SW085_240409		✓	
ES2412012-045	10-Apr-2024 14:14	0021_SW110_240410		✓	
ES2412012-046	10-Apr-2024 14:25	0021_SW112_240410		✓	
ES2412012-047	11-Apr-2024 10:29	0021_SW126_240411		✓	
ES2412012-048	10-Apr-2024 12:50	0021_SW127_240410		✓	
ES2412012-049	11-Apr-2024 08:50	0021_SW130_240411		✓	
ES2412012-050	10-Apr-2024 12:46	0021_SW153_240410		✓	
ES2412012-051	10-Apr-2024 11:49	0021_QC106_240410		✓	
ES2412012-052	10-Apr-2024 14:17	0021_QC110_240410		✓	
ES2412012-053	11-Apr-2024 10:30	0021_QC114_240411		✓	
ES2412012-054	09-Apr-2024 12:00	0021_QC103_240409		✓	
ES2412012-055	10-Apr-2024 09:00	0021_QC105_240410		✓	
ES2412012-056	10-Apr-2024 10:00	0021_QC109_240410		✓	
ES2412012-057	11-Apr-2024 09:50	0021_OTH004_ENVIROP.	✓		
ES2412012-058	11-Apr-2024 10:10	0021_OTH006_240411		✓	
ES2412012-059	10-Apr-2024 14:26	0021_OTH005_240410		✓	
ES2412012-060	11-Apr-2024 09:45	0021_OTH004_240411		✓	
ES2412012-061	11-Apr-2024 10:30	0021_OTH003_240411		✓	
ES2412012-062	10-Apr-2024 14:05	0021_OTH002_240410		✓	
ES2412012-063	11-Apr-2024 09:45	0021_OTH001_240411		✓	

Proactive Holding Time Report

Sample(s) have been received within the recommended holding times for the requested analysis.



ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT 0021 PFASOMP 24

SITE: 0021 SW

ORDER NO:

PROJECT MANAGER

PRIMARY SAMPLER:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes	No	N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

°C

Other comments:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

SAMPLE DETAILS							ANALYSIS REQUIRED			
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_SuperTrace_Water WATER	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
008	0021_SW011_240410		10/04/2024 11:58 AM	WATER	ALS: 4 Non ALS: 0	No		X		
009	0021_SW013_240410		10/04/2024 11:48 AM	WATER	ALS: 4 Non ALS: 0	No		X		
010	0021_SW019_240419		11/04/2024 10:40 AM	WATER	ALS: 3 Non ALS: 0	No		X		
011	0021_SW020_240412		12/04/2024 09:15 AM	WATER	ALS: 3 Non ALS: 0	No		X		
012	0021_SW021_240412		12/04/2024 09:20 AM	WATER	ALS: 3 Non ALS: 0	No		X		
013	0021_SW022_240410		10/04/2024 08:40 AM	WATER	ALS: 4 Non ALS: 0	No		X		
014	0021_SW024_240410		10/04/2024 08:45 AM	WATER	ALS: 4 Non ALS: 0	No		X		



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:

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ALS Laboratory: ES Sydney
Environmental

DATE TIME:

Other comments:

EMAIL INVOICES TO:

[illegible]



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:

CONTACT PH: SAMPLER MOBILE [REDACTED]
QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

Other comments:

EMAIL INVOICES TO:

SAMPLE DETAILS							ANALYSIS REQUIRED			
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_SuperTrace_Water WATER	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
029	0021_SW056_240409		09/04/2024 11:00 AM	WATER	ALS: 4 Non ALS: 0	No		X		
030	0021_SW057_240409		09/04/2024 03:10 PM	WATER	ALS: 4 Non ALS: 0	No		X		
031	0021_SW058_240409		09/04/2024 03:45 PM	WATER	ALS: 4 Non ALS: 0	No		X		
032	0021_SW059_240410		10/04/2024 01:31 PM	WATER	ALS: 4 Non ALS: 0	No		X		
033	0021_SW060_240410		10/04/2024 10:48 AM	WATER	ALS: 4 Non ALS: 0	No		X		
034	0021_SW062_240408		08/04/2024 02:54 PM	WATER	ALS: 4 Non ALS: 0	No		X		
035	0021_SW064_240408		08/04/2024 02:29 PM	WATER	ALS: 4 Non ALS: 0	No		X		



COC#: 66217

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFASOMP_24

SITE: 0021 SW

ORDER NO:

PROJECT MANAGER

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS: 5 Days

Biohazard info:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes	No	N/A

Random Sample Temperature on Receipt:

©

Other comments:

SAMPLE DETAILS							ANALYSIS REQUIRED			
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_SuperTrace_Water WATER	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
036	0021_SW068_240410		10/04/2024 11:03 AM	WATER	ALS: 4 Non ALS: 0	No		X		
037	0021_SW069_240410		10/04/2024 11:19 AM	WATER	ALS: 4 Non ALS: 0	No		X		
038	0021_SW076_240410		10/04/2024 09:00 AM	WATER	ALS: 4 Non ALS: 0	No		X		
039	0021_SW077_240410		10/04/2024 09:15 AM	WATER	ALS: 4 Non ALS: 0	No		X		
040	0021_SW078_240410		10/04/2024 09:30 AM	WATER	ALS: 4 Non ALS: 0	No		X		
041	0021_SW079_240410		10/04/2024 09:45 AM	WATER	ALS: 4 Non ALS: 0	No		X		
042	0021_SW080_240410		10/04/2024 10:00 AM	WATER	ALS: 4 Non ALS: 0	No		X		



ALS Laboratory: ES Sydney
Environmental

DATE TIME:

DATE TIME:

DATE TIME:

DATE TIME:

EMAIL INVOICES TO:

Biohazard info:

C

Other comments:

SAMPLE DETAILS							ANALYSIS REQUIRED			
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_SuperTrace_Water WATER	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
043	0021_SW083_240409		09/04/2024 03:53 PM	WATER	ALS: 4 Non ALS: 0	No		X		
044	0021_SW085_240409		09/04/2024 10:30 AM	WATER	ALS: 4 Non ALS: 0	No		X		
045	0021_SW110_240410		10/04/2024 02:14 PM	WATER	ALS: 4 Non ALS: 0	No		X		
046	0021_SW112_240412		10/04/2024 02:25 PM	WATER	ALS: 4 Non ALS: 0	No		X		
047	0021_SW126_240411		11/04/2024 10:29 AM	WATER	ALS: 3 Non ALS: 0	No		X		
048	0021_SW127_240410		10/04/2024 12:50 PM	WATER	ALS: 4 Non ALS: 0	No		X		
049	0021_SW130_240411		11/04/2024 08:50 AM	WATER	ALS: 3 Non ALS: 0	No		X		



ALS Laboratory: ES Sydney
Environmental

EMAIL INVOICES TO:

DATE TIME:

Other comments:

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 CHAIN OF CUSTODY COC#: 66217 ALS Laboratory: ES Sydney Environmental		RELINQUISHED BY: DATE TIME:	RECEIVED BY: DATE TIME:	RELINQUISHED BY: DATE TIME:	RECEIVED BY: DATE TIME:
CLIENT: AECOMAU - AECOM Australia Pty Ltd PROJECT: ACT_0021_PFASOMP_24 SITE: 0021 SW ORDER NO: PROJECT MANAGER: [REDACTED] PRIMARY SAMPLER: [REDACTED] EMAIL REPORTS TO: EMAIL INVOICES TO:		TURNAROUND REQUIREMENTS : 5 Days Biohazard info:		LABORATORY USE ONLY (Circle) Custody Seal intact? Yes No N/A Free ice / frozen ice bricks present upon receipt? Yes No N/A Random Sample Temperature on Receipt: C Other comments:	
CONTACT PH: SAMPLER MOBILE: [REDACTED]		QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU0042			

SAMPLE DETAILS							ANALYSIS REQUIRED			
SAMPLE	NAME	DESCRIPTION	DATE / TIME	MATRIX	TOTAL BOTTLES	ON HOLD	PFAS_SuperTrace_Water	PFAS_Waters WATER	ALTERNATIVE ANALYSIS	ADDITIONAL INFORMATION
057	0021_OTH004_ENVIROPA CIFIC_240411		11/04/2024 09:50 AM	WATER	ALS: 4 Non ALS: 0	Yes				
058	0021_OTH006_240411		11/04/2024 10:10 AM	WATER	ALS: 4 Non ALS: 0	No		X		
059	0021_OTH005_240410		10/04/2024 02:26 PM	WATER	ALS: 4 Non ALS: 0	No		X		
060	0021_OTH004_240411		11/04/2024 09:45 AM	WATER	ALS: 4 Non ALS: 0	No		X		
061	0021_OTH003_240411		11/04/2024 10:30 AM	WATER	ALS: 4 Non ALS: 0	No		X		
062	0021_OTH002_240410		10/04/2024 02:05 PM	WATER	ALS: 4 Non ALS: 0	No		X		
063	0021_OTH001_240411		11/04/2024 09:45 AM	WATER	ALS: 4 Non ALS: 0	No		X		



CHAIN OF CUSTODY

COC#: 66217

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

RECEIVED BY:

RELINQUISHED BY:

RECEIVED BY:

DATE TIME:

DATE TIME:

DATE TIME:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFSOMP_24

SITE: 0021 SW

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

°C

Other comments:

CONTACT PH:

SAMPLER MOBILE

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

SAMPLE	SAMPLE NAME	BOTTLE NAME	VOLUME	BARCODE	TYPE	FILTERED	REASON
001	0021_SW001_240410	HDPE (no PTFE)	20 mL	00352312011056	Grey	No	
001	0021_SW001_240410	HDPE (no PTFE)	20 mL	00352312010992	Grey	No	
001	0021_SW001_240410	HDPE (no PTFE)	20 mL	00352312010971	Grey	No	
001	0021_SW001_240410	HDPE (no PTFE)	20 mL	00352312010964	Grey	No	
002	0021_SW002_240411	HDPE (no PTFE)	20 mL	00352312010913	Grey	No	
002	0021_SW002_240411	HDPE (no PTFE)	20 mL	00352312011092	Grey	No	
002	0021_SW002_240411	HDPE (no PTFE)	20 mL	00352312011134	Grey	No	
003	0021_SW003_240411	HDPE (no PTFE)	20 mL	00352312011019	Grey	No	
003	0021_SW003_240411	HDPE (no PTFE)	20 mL	00352312010926	Grey	No	
003	0021_SW003_240411	HDPE (no PTFE)	20 mL	00352312011136	Grey	No	
004	0021_SW004_240412	HDPE (no PTFE)	20 mL	00352312010899	Grey	No	
004	0021_SW004_240412	HDPE (no PTFE)	20 mL	00352312011016	Grey	No	
004	0021_SW004_240412	HDPE (no PTFE)	20 mL	00352312010884	Grey	No	
004	0021_SW004_240412	HDPE (no PTFE)	20 mL	00352312011094	Grey	No	
005	0021_SW005_240412	HDPE (no PTFE)	20 mL	00352312011069	Grey	No	
005	0021_SW005_240412	HDPE (no PTFE)	20 mL	00352312011104	Grey	No	
005	0021_SW005_240412	HDPE (no PTFE)	20 mL	00352312010975	Grey	No	
005	0021_SW005_240412	HDPE (no PTFE)	20 mL	00352312011049	Grey	No	
006	0021_SW006_240412	HDPE (no PTFE)	20 mL	00352312011085	Grey	No	
006	0021_SW006_240412	HDPE (no PTFE)	20 mL	00352312010952	Grey	No	
006	0021_SW006_240412	HDPE (no PTFE)	20 mL	00352312019783	Grey	No	
006	0021_SW006_240412	HDPE (no PTFE)	20 mL	00352312019716	Grey	No	
007	0021_SW010_240410	HDPE (no PTFE)	20 mL	00352312019774	Grey	No	
007	0021_SW010_240410	HDPE (no PTFE)	20 mL	00352312019680	Grey	No	
007	0021_SW010_240410	HDPE (no PTFE)	20 mL	00352312019800	Grey	No	
007	0021_SW010_240410	HDPE (no PTFE)	20 mL	00352312019558	Grey	No	

**CHAIN OF CUSTODY**

COC#: 66217

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

RECEIVED BY:

RELINQUISHED BY:

RECEIVED BY:

DATE TIME:

DATE TIME:

DATE TIME:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFSOMP_24

SITE: 0021 SW

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

CONTACT PH:

SAMPLER MOBILE

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

TURNAROUND REQUIREMENTS: 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

C

Other comments:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

008	0021_SW011_240410	HDPE (no PTFE)	20 mL	00352312019754	Grey	No	
008	0021_SW011_240410	HDPE (no PTFE)	20 mL	00352312019775	Grey	No	
008	0021_SW011_240410	HDPE (no PTFE)	20 mL	00352312019667	Grey	No	
008	0021_SW011_240410	HDPE (no PTFE)	20 mL	00352312019556	Grey	No	
009	0021_SW013_240410	HDPE (no PTFE)	20 mL	00352312010924	Grey	No	
009	0021_SW013_240410	HDPE (no PTFE)	20 mL	00352312010905	Grey	No	
009	0021_SW013_240410	HDPE (no PTFE)	20 mL	00352312010850	Grey	No	
009	0021_SW013_240410	HDPE (no PTFE)	20 mL	00352312011135	Grey	No	
010	0021_SW019_240419	HDPE (no PTFE)	20 mL	00352309041334	Grey	No	
010	0021_SW019_240419	HDPE (no PTFE)	20 mL	00352312010906	Grey	No	
010	0021_SW019_240419	HDPE (no PTFE)	20 mL	00352309041516	Grey	No	
011	0021_SW020_240412	HDPE (no PTFE)	20 mL	00352312010980	Grey	No	
011	0021_SW020_240412	HDPE (no PTFE)	20 mL	00352312010978	Grey	No	
011	0021_SW020_240412	HDPE (no PTFE)	20 mL	00352312011018	Grey	No	
012	0021_SW021_240412	HDPE (no PTFE)	20 mL	00352312010847	Grey	No	
012	0021_SW021_240412	HDPE (no PTFE)	20 mL	00352312011007	Grey	No	
012	0021_SW021_240412	HDPE (no PTFE)	20 mL	00352312010958	Grey	No	
013	0021_SW022_240410	HDPE (no PTFE)	20 mL	00352312010866	Grey	No	
013	0021_SW022_240410	HDPE (no PTFE)	20 mL	00352312010910	Grey	No	
013	0021_SW022_240410	HDPE (no PTFE)	20 mL	00352312010890	Grey	No	
013	0021_SW022_240410	HDPE (no PTFE)	20 mL	00352312011121	Grey	No	
014	0021_SW024_240410	HDPE (no PTFE)	20 mL	00352312010995	Grey	No	
014	0021_SW024_240410	HDPE (no PTFE)	20 mL	00352312011089	Grey	No	
014	0021_SW024_240410	HDPE (no PTFE)	20 mL	00352312011052	Grey	No	
014	0021_SW024_240410	HDPE (no PTFE)	20 mL	00352312010912	Grey	No	
015	0021_SW025_240410	HDPE (no PTFE)	20 mL	00352312011027	Grey	No	
015	0021_SW025_240410	HDPE (no PTFE)	20 mL	00352312011096	Grey	No	



CHAIN OF CUSTODY

COC#: 66217

ALS Laboratory: ES Sydney
Environmental

RELINQUISHED BY:

RECEIVED BY:

RELINQUISHED BY:

RECEIVED BY:

DATE TIME:

DATE TIME:

DATE TIME:

DATE TIME:

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFSOMP_24

SITE: 0021 SW

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

CONTACT PH:

SAMPLER MOBILE

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

C

Other comments:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

015	0021_SW025_240410	HDPE (no PTFE)	20 mL	00352312010965	Grey	No	
015	0021_SW025_240410	HDPE (no PTFE)	20 mL	00352312011076	Grey	No	
016	0021_SW027_240410	HDPE (no PTFE)	20 mL	00352312019665	Grey	No	
016	0021_SW027_240410	HDPE (no PTFE)	20 mL	00352312019742	Grey	No	
016	0021_SW027_240410	HDPE (no PTFE)	20 mL	00352312019743	Grey	No	
016	0021_SW027_240410	HDPE (no PTFE)	20 mL	00352312019572	Grey	No	
017	0021_SW032_240409	HDPE (no PTFE)	20 mL	00350822063154	Grey	No	
017	0021_SW032_240409	HDPE (no PTFE)	20 mL	00350621001636	Grey	No	
017	0021_SW032_240409	HDPE (no PTFE)	20 mL	00350822063024	Grey	No	
017	0021_SW032_240409	HDPE (no PTFE)	20 mL	00350621001288	Grey	No	
018	0021_SW034_240409	HDPE (no PTFE)	20 mL	00350822063035	Grey	No	
018	0021_SW034_240409	HDPE (no PTFE)	20 mL	00352312010849	Grey	No	
018	0021_SW034_240409	HDPE (no PTFE)	20 mL	00352312010949	Grey	No	
018	0021_SW034_240409	HDPE (no PTFE)	20 mL	00350822063164	Grey	No	
019	0021_SW035_240410	HDPE (no PTFE)	20 mL	00352312011022	Grey	No	
019	0021_SW035_240410	HDPE (no PTFE)	20 mL	00352312010916	Grey	No	
019	0021_SW035_240410	HDPE (no PTFE)	20 mL	00352312011107	Grey	No	
019	0021_SW035_240410	HDPE (no PTFE)	20 mL	00352312010938	Grey	No	
020	0021_SW036_240409	HDPE (no PTFE)	125 mL	00352208100295	Grey	No	
020	0021_SW036_240409	HDPE (no PTFE)	125 mL	00352208100237	Grey	No	
021	0021_SW037_240409	HDPE (no PTFE)	125 mL	00352208100434	Grey	No	
021	0021_SW037_240409	HDPE (no PTFE)	125 mL	00352208100079	Grey	No	
022	0021_SW040_240409	HDPE (no PTFE)	20 mL	00352312010893	Grey	No	
022	0021_SW040_240409	HDPE (no PTFE)	20 mL	00352312010937	Grey	No	
022	0021_SW040_240409	HDPE (no PTFE)	20 mL	00352312010887	Grey	No	
022	0021_SW040_240409	HDPE (no PTFE)	20 mL	00352312011030	Grey	No	
023	0021_SW043_240409	HDPE (no PTFE)	20 mL	00352312019813	Grey	No	



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:

030	0021_SW057_240409	HDPE (no PTFE)	20 mL	00352312019549	Grey	No
030	0021_SW057_240409	HDPE (no PTFE)	20 mL	00352312019725	Grey	No
030	0021_SW057_240409	HDPE (no PTFE)	20 mL	00352312019619	Grey	No
030	0021_SW057_240409	HDPE (no PTFE)	20 mL	00352312019575	Grey	No
031	0021_SW058_240409	HDPE (no PTFE)	20 mL	00352312019615	Grey	No
031	0021_SW058_240409	HDPE (no PTFE)	20 mL	00352312019566	Grey	No
031	0021_SW058_240409	HDPE (no PTFE)	20 mL	00352312019542	Grey	No
031	0021_SW058_240409	HDPE (no PTFE)	20 mL	00352312019693	Grey	No
032	0021_SW059_240410	HDPE (no PTFE)	20 mL	00352312010854	Grey	No
032	0021_SW059_240410	HDPE (no PTFE)	20 mL	00352312010956	Grey	No
032	0021_SW059_240410	HDPE (no PTFE)	20 mL	00352312011110	Grey	No
032	0021_SW059_240410	HDPE (no PTFE)	20 mL	00352312011066	Grey	No
033	0021_SW060_240410	HDPE (no PTFE)	20 mL	00352312010860	Grey	No
033	0021_SW060_240410	HDPE (no PTFE)	20 mL	00352312011059	Grey	No
033	0021_SW060_240410	HDPE (no PTFE)	20 mL	00352312011020	Grey	No
033	0021_SW060_240410	HDPE (no PTFE)	20 mL	00352312011065	Grey	No
034	0021_SW062_240408	HDPE (no PTFE)	20 mL	00352312011006	Grey	No
034	0021_SW062_240408	HDPE (no PTFE)	20 mL	00352312011083	Grey	No
034	0021_SW062_240408	HDPE (no PTFE)	20 mL	00352312010935	Grey	No
034	0021_SW062_240408	HDPE (no PTFE)	20 mL	00352312010842	Grey	No
035	0021_SW064_240408	HDPE (no PTFE)	20 mL	00352312010987	Grey	No
035	0021_SW064_240408	HDPE (no PTFE)	20 mL	00352312011047	Grey	No
035	0021_SW064_240408	HDPE (no PTFE)	20 mL	00352312010944	Grey	No
035	0021_SW064_240408	HDPE (no PTFE)	20 mL	00352312011010	Grey	No
036	0021_SW068_240410	HDPE (no PTFE)	20 mL	00352312010879	Grey	No
036	0021_SW068_240410	HDPE (no PTFE)	20 mL	00352312010881	Grey	No
036	0021_SW068_240410	HDPE (no PTFE)	20 mL	00352312010851	Grey	No

 CHAIN OF CUSTODY COC#: 66217 ALS Laboratory: ES Sydney Environmental		RELINQUISHED BY: DATE TIME:	RECEIVED BY: DATE TIME:	RELINQUISHED BY: DATE TIME:	RECEIVED BY: DATE TIME:
CLIENT: AECOMAU - AECOM Australia Pty Ltd PROJECT: ACT_0021_PFASOMP_24 SITE: 0021 SW ORDER NO: PROJECT MANAGER: [REDACTED] PRIMARY SAMPLER: [REDACTED] EMAIL REPORTS TO: EMAIL INVOICES TO:		TURNAROUND REQUIREMENTS : 5 Days Biohazard info:	LABORATORY USE ONLY (Circle) Custody Seal intact? Yes No N/A Free ice / frozen ice bricks present upon receipt? Yes No N/A Random Sample Temperature on Receipt: °C Other comments:		
CONTACT PH: SAMPLER MOBILE: [REDACTED] QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU0042					

036	0021_SW068_240410	HDPE (no PTFE)	20 mL	00352312010930	Grey	No
037	0021_SW069_240410	HDPE (no PTFE)	20 mL	00352312010895	Grey	No
037	0021_SW069_240410	HDPE (no PTFE)	20 mL	00352312010873	Grey	No
037	0021_SW069_240410	HDPE (no PTFE)	20 mL	00352312010923	Grey	No
037	0021_SW069_240410	HDPE (no PTFE)	20 mL	00352312010837	Grey	No
038	0021_SW076_240410	HDPE (no PTFE)	20 mL	00352312019669	Grey	No
038	0021_SW076_240410	HDPE (no PTFE)	20 mL	00352312019795	Grey	No
038	0021_SW076_240410	HDPE (no PTFE)	20 mL	00352312019538	Grey	No
038	0021_SW076_240410	HDPE (no PTFE)	20 mL	00352312019703	Grey	No
039	0021_SW077_240410	HDPE (no PTFE)	20 mL	00352312019585	Grey	No
039	0021_SW077_240410	HDPE (no PTFE)	20 mL	00352312019717	Grey	No
039	0021_SW077_240410	HDPE (no PTFE)	20 mL	00352312019638	Grey	No
039	0021_SW077_240410	HDPE (no PTFE)	20 mL	00352312019816	Grey	No
040	0021_SW078_240410	HDPE (no PTFE)	20 mL	00352312019812	Grey	No
040	0021_SW078_240410	HDPE (no PTFE)	20 mL	00352312019613	Grey	No
040	0021_SW078_240410	HDPE (no PTFE)	20 mL	00352312019541	Grey	No
040	0021_SW078_240410	HDPE (no PTFE)	20 mL	00352312019576	Grey	No
041	0021_SW079_240410	HDPE (no PTFE)	20 mL	00352312019594	Grey	No
041	0021_SW079_240410	HDPE (no PTFE)	20 mL	00352312019708	Grey	No
041	0021_SW079_240410	HDPE (no PTFE)	20 mL	00352312019654	Grey	No
041	0021_SW079_240410	HDPE (no PTFE)	20 mL	00352312019798	Grey	No
042	0021_SW080_240410	HDPE (no PTFE)	20 mL	00352312019608	Grey	No
042	0021_SW080_240410	HDPE (no PTFE)	20 mL	00352312019744	Grey	No
042	0021_SW080_240410	HDPE (no PTFE)	20 mL	00352312019641	Grey	No
042	0021_SW080_240410	HDPE (no PTFE)	20 mL	00352312019663	Grey	No
043	0021_SW083_240409	HDPE (no PTFE)	20 mL	00352312010972	Grey	No
043	0021_SW083_240409	HDPE (no PTFE)	20 mL	00352312011070	Grey	No



ALS Laboratory: ES Sydney
Environmental

DATE TIME:

043	0021_SW083_240409	HDPE (no PTFE)	20 mL	00352312010915	Grey	No
043	0021_SW083_240409	HDPE (no PTFE)	20 mL	00352312010859	Grey	No
044	0021_SW085_240409	HDPE (no PTFE)	20 mL	00352312019786	Grey	No
044	0021_SW085_240409	HDPE (no PTFE)	20 mL	00352312019604	Grey	No
044	0021_SW085_240409	HDPE (no PTFE)	20 mL	00352312019652	Grey	No
044	0021_SW085_240409	HDPE (no PTFE)	20 mL	00352312019544	Grey	No
045	0021_SW110_240410	HDPE (no PTFE)	20 mL	00352312010894	Grey	No
045	0021_SW110_240410	HDPE (no PTFE)	20 mL	00352312011036	Grey	No
045	0021_SW110_240410	HDPE (no PTFE)	20 mL	00352312011103	Grey	No
045	0021_SW110_240410	HDPE (no PTFE)	20 mL	00352312010946	Grey	No
046	0021_SW112_240412	HDPE (no PTFE)	20 mL	00352312010931	Grey	No
046	0021_SW112_240412	HDPE (no PTFE)	20 mL	00352312010957	Grey	No
046	0021_SW112_240412	HDPE (no PTFE)	20 mL	00352312010921	Grey	No
046	0021_SW112_240412	HDPE (no PTFE)	20 mL	00352312010836	Grey	No
047	0021_SW126_240411	HDPE (no PTFE)	20 mL	00352312010843	Grey	No
047	0021_SW126_240411	HDPE (no PTFE)	20 mL	00352312010999	Grey	No
047	0021_SW126_240411	HDPE (no PTFE)	20 mL	00352312010967	Grey	No
048	0021_SW127_240410	HDPE (no PTFE)	20 mL	00352312019714	Grey	No
048	0021_SW127_240410	HDPE (no PTFE)	20 mL	00352312019792	Grey	No
048	0021_SW127_240410	HDPE (no PTFE)	20 mL	00352312019649	Grey	No
048	0021_SW127_240410	HDPE (no PTFE)	20 mL	00352312019767	Grey	No
049	0021_SW130_240411	HDPE (no PTFE)	20 mL	00352312011054	Grey	No
049	0021_SW130_240411	HDPE (no PTFE)	20 mL	00352312010845	Grey	No
049	0021_SW130_240411	HDPE (no PTFE)	20 mL	00352312011118	Grey	No
050	0021_SW153_240410	HDPE (no PTFE)	20 mL	00352312019804	Grey	No
050	0021_SW153_240410	HDPE (no PTFE)	20 mL	00352312019633	Grey	No
050	0021_SW153_240410	HDPE (no PTFE)	20 mL	00352312019660	Grey	No



CHAIN OF CUSTODY

COC#: 66217

ALS Laboratory: ES Sydney
Environmental

CLIENT: AECOMAU - AECOM Australia Pty Ltd

PROJECT: ACT_0021_PFSOMP_24

SITE: 0021 SW

ORDER NO:

PROJECT MANAGER:

PRIMARY SAMPLER:

EMAIL REPORTS TO:

EMAIL INVOICES TO:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

RELINQUISHED BY:

DATE TIME:

RECEIVED BY:

DATE TIME:

TURNAROUND REQUIREMENTS : 5 Days

Biohazard info:

LABORATORY USE ONLY (Circle)

Custody Seal intact?

Yes No N/A

Free ice / frozen ice bricks present upon receipt?

Yes No N/A

Random Sample Temperature on Receipt:

°C

Other comments:

CONTACT PH:

SAMPLER MOBILE:

QUOTE NO: SY/139/19 v4 60612562_4.1 / ES2021AECOMAU004
2

050	0021_SW153_240410	HDPE (no PTFE)	20 mL	00352312019721	Grey	No	
051	0021_QC106_240410	HDPE (no PTFE)	20 mL	00352312011087	Grey	No	
051	0021_QC106_240410	HDPE (no PTFE)	20 mL	00352312010862	Grey	No	
051	0021_QC106_240410	HDPE (no PTFE)	20 mL	00352312010928	Grey	No	
051	0021_QC106_240410	HDPE (no PTFE)	20 mL	00352312010880	Grey	No	
052	0021_QC110_240410	HDPE (no PTFE)	20 mL	00352312010932	Grey	No	
052	0021_QC110_240410	HDPE (no PTFE)	20 mL	00352312010962	Grey	No	
052	0021_QC110_240410	HDPE (no PTFE)	20 mL	00352312010922	Grey	No	
052	0021_QC110_240410	HDPE (no PTFE)	20 mL	00352312010911	Grey	No	
053	0021_QC114_240411	HDPE (no PTFE)	20 mL	00352312010933	Grey	No	
053	0021_QC114_240411	HDPE (no PTFE)	20 mL	00352312010960	Grey	No	
053	0021_QC114_240411	HDPE (no PTFE)	20 mL	00352312011086	Grey	No	
054	0021_QC103_240409	HDPE (no PTFE)	20 mL	00352312019586	Grey	No	
054	0021_QC103_240409	HDPE (no PTFE)	20 mL	00352312019551	Grey	No	
054	0021_QC103_240409	HDPE (no PTFE)	20 mL	00352312019550	Grey	No	
054	0021_QC103_240409	HDPE (no PTFE)	20 mL	00352312019719	Grey	No	
055	0021_QC105_240410	HDPE (no PTFE)	20 mL	00352312019569	Grey	No	
055	0021_QC105_240410	HDPE (no PTFE)	20 mL	00352312019622	Grey	No	
055	0021_QC105_240410	HDPE (no PTFE)	20 mL	00352312019626	Grey	No	
055	0021_QC105_240410	HDPE (no PTFE)	20 mL	00352312019562	Grey	No	
056	0021_QC109_240410	HDPE (no PTFE)	20 mL	00352312019761	Grey	No	
056	0021_QC109_240410	HDPE (no PTFE)	20 mL	00352312019740	Grey	No	
056	0021_QC109_240410	HDPE (no PTFE)	20 mL	00352312019543	Grey	No	
056	0021_QC109_240410	HDPE (no PTFE)	20 mL	00352312019583	Grey	No	
057	0021_OTH004_ENVIROPA	HDPE (no PTFE)	20 mL	00352312019618	Grey	No	
057	0021_OTH004_ENVIROPA	HDPE (no PTFE)	20 mL	00352312019617	Grey	No	
057	0021_OTH004_ENVIROPA	HDPE (no PTFE)	20 mL	00352312011099	Grey	No	



ALS Laboratory: ES Sydney
Environmental

RECEIVED BY:

DATE TIME:

057	0021_OTH004_ENVIROPA	HDPE (no PTFE)	20 mL	00352312010896	Grey	No
058	0021_OTH006_240411	HDPE (no PTFE)	20 mL	00352312019552	Grey	No
058	0021_OTH006_240411	HDPE (no PTFE)	20 mL	00352312019643	Grey	No
058	0021_OTH006_240411	HDPE (no PTFE)	20 mL	00352312019597	Grey	No
058	0021_OTH006_240411	HDPE (no PTFE)	20 mL	00352312019640	Grey	No
059	0021_OTH005_240410	HDPE (no PTFE)	20 mL	00352312019580	Grey	No
059	0021_OTH005_240410	HDPE (no PTFE)	20 mL	00352312019806	Grey	No
059	0021_OTH005_240410	HDPE (no PTFE)	20 mL	00352312019568	Grey	No
059	0021_OTH005_240410	HDPE (no PTFE)	20 mL	00352312019781	Grey	No
060	0021_OTH004_240411	HDPE (no PTFE)	20 mL	00352312019689	Grey	No
060	0021_OTH004_240411	HDPE (no PTFE)	20 mL	00352312019570	Grey	No
060	0021_OTH004_240411	HDPE (no PTFE)	20 mL	00352312010840	Grey	No
060	0021_OTH004_240411	HDPE (no PTFE)	20 mL	00352312010977	Grey	No
061	0021_OTH003_240411	HDPE (no PTFE)	20 mL	00352312019820	Grey	No
061	0021_OTH003_240411	HDPE (no PTFE)	20 mL	00352312019564	Grey	No
061	0021_OTH003_240411	HDPE (no PTFE)	20 mL	00352312019789	Grey	No
061	0021_OTH003_240411	HDPE (no PTFE)	20 mL	00352312019819	Grey	No
062	0021_OTH002_240410	HDPE (no PTFE)	20 mL	00352312019722	Grey	No
062	0021_OTH002_240410	HDPE (no PTFE)	20 mL	00352312019681	Grey	No
062	0021_OTH002_240410	HDPE (no PTFE)	20 mL	00352312019771	Grey	No
062	0021_OTH002_240410	HDPE (no PTFE)	20 mL	00352312019540	Grey	No
063	0021_OTH001_240411	HDPE (no PTFE)	20 mL	00352312019621	Grey	No
063	0021_OTH001_240411	HDPE (no PTFE)	20 mL	00352312019589	Grey	No
063	0021_OTH001_240411	HDPE (no PTFE)	20 mL	00352312019736	Grey	No
063	0021_OTH001_240411	HDPE (no PTFE)	20 mL	00352312019533	Grey	No

2:21:22 AM

CERTIFICATE OF ANALYSIS 348825

Client Details

Client	AECOM Australia Pty Ltd (Sydney)
Attention	
Address	PO Box Q410, QVB Post Office, Sydney, NSW, 1230

Sample Details

Your Reference	<u>ACT_0021_PFASOMP_24</u>
Number of Samples	11 Water, 5 Sediment
Date samples received	15/04/2024
Date completed instructions received	17/04/2024

Analysis Details

Please refer to the following pages for results, methodology summary and quality control data.
Samples were analysed as received from the client. Results relate specifically to the samples as received.
Results are reported on a dry weight basis for solids and on an as received basis for other matrices.
Please refer to the last page of this report for any comments relating to the results.

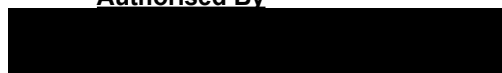
Report Details

Date results requested by	24/04/2024
Date of Issue	24/04/2024
NATA Accreditation Number 2901. This document shall not be reproduced except in full.	
Accredited for compliance with ISO/IEC 17025 - Testing. Tests not covered by NATA are denoted with *	

Results Approved By



Authorised By



PFAS in Soils Extended						
Our Reference		348825-3	348825-8	348825-9	348825-14	348825-16
Your Reference	UNITS	0021_QC202_24 0409	0021_QC207_24 0410	0021_QC208_24 0410	0021_QC213_24 0412	0021_QC215_24 0412
Date Sampled		09/04/2024	10/04/2024	10/04/2024	12/04/2024	12/04/2024
Type of sample		Sediment	Sediment	Sediment	Sediment	Sediment
Date prepared	-	22/04/2024	22/04/2024	22/04/2024	22/04/2024	22/04/2024
Date analysed	-	22/04/2024	22/04/2024	22/04/2024	22/04/2024	22/04/2024
Perfluorobutanesulfonic acid	µg/kg	<0.1	0.1	<0.1	0.4	0.2
Perfluoropentanesulfonic acid	µg/kg	<0.1	<0.1	<0.1	0.5	0.2
Perfluorohexanesulfonic acid - PFHxS	µg/kg	<0.1	4.4	<0.1	9.0	1.6
Perfluoroheptanesulfonic acid	µg/kg	<0.1	<0.1	<0.1	0.8	0.1
Perfluorooctanesulfonic acid PFOS	µg/kg	<0.1	43	0.7	19	5.4
Perfluorodecanesulfonic acid	µg/kg	<0.2	<0.2	<0.2	<0.2	<0.2
Perfluorobutanoic acid	µg/kg	<0.2	<0.2	<0.2	0.4	<0.2
Perfluoropentanoic acid	µg/kg	<0.2	<0.2	<0.2	0.5	<0.2
Perfluorohexanoic acid	µg/kg	<0.1	0.4	<0.1	1.2	0.2
Perfluoroheptanoic acid	µg/kg	<0.1	0.1	<0.1	0.2	<0.1
Perfluorooctanoic acid PFOA	µg/kg	<0.1	0.2	<0.1	0.7	<0.1
Perfluorononanoic acid	µg/kg	<0.1	0.1	<0.1	<0.1	<0.1
Perfluorodecanoic acid	µg/kg	<0.5	<2	<0.5	<0.5	<0.5
Perfluoroundecanoic acid	µg/kg	<0.5	<2	<0.5	<0.5	<0.5
Perfluorododecanoic acid	µg/kg	<0.5	<5.0	<0.5	<0.5	<0.5
Perfluorotridecanoic acid	µg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Perfluorotetradecanoic acid	µg/kg	<5	<5	<5	<5	<5
4:2 FTS	µg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
6:2 FTS	µg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
8:2 FTS	µg/kg	<0.2	<0.2	<0.2	<0.2	<0.2
10:2 FTS	µg/kg	<0.2	<0.2	<0.2	<0.2	<0.2
Perfluorooctane sulfonamide	µg/kg	<1	<1	<1	<1	<1
N-Methyl perfluorooctane sulfonamide	µg/kg	<1	<10	<1	<1	<1
N-Ethyl perfluorooctanesulfonamide	µg/kg	<1	<5	<1	<1	<1
N-Me perfluorooctanesulfonamid oethanol	µg/kg	<1	<5	<1	<1	<1
N-Et perfluorooctanesulfonamid oethanol	µg/kg	<5	<20	<5	<5	<5
MePerfluorooctanesulf- amid oacetic acid	µg/kg	<0.2	<0.2	<0.2	<0.2	<0.2
EtPerfluorooctanesulf amid oacetic acid	µg/kg	<0.2	<0.2	<0.2	<0.2	<0.2
Surrogate ¹³ C ₈ PFOS	%	107	105	117	108	110
Surrogate ¹³ C ₂ PFOA	%	99	96	94	101	96
Extracted ISTD ¹³ C ₃ PFBS	%	93	76	78	99	90
Extracted ISTD ¹⁸ O ₂ PFHxS	%	97	87	88	104	98
Extracted ISTD ¹³ C ₄ PFOS	%	85	54	66	93	85

PFAS in Soils Extended						
Our Reference		348825-3	348825-8	348825-9	348825-14	348825-16
Your Reference	UNITS	0021_QC202_24 0409	0021_QC207_24 0410	0021_QC208_24 0410	0021_QC213_24 0412	0021_QC215_24 0412
Date Sampled		09/04/2024	10/04/2024	10/04/2024	12/04/2024	12/04/2024
Type of sample		Sediment	Sediment	Sediment	Sediment	Sediment
Extracted ISTD ¹³ C ₄ PFBA	%	92	65	54	95	92
Extracted ISTD ¹³ C ₃ PFPeA	%	104	75	87	100	98
Extracted ISTD ¹³ C ₂ PFHxA	%	96	74	86	98	104
Extracted ISTD ¹³ C ₄ PFHpA	%	100	69	75	97	102
Extracted ISTD ¹³ C ₄ PFOA	%	90	52	70	103	96
Extracted ISTD ¹³ C ₅ PFNA	%	91	51	72	105	95
Extracted ISTD ¹³ C ₂ PFDA	%	91	34	73	116	110
Extracted ISTD ¹³ C ₂ PFUnDA	%	81	37	76	136	106
Extracted ISTD ¹³ C ₂ PFDoDA	%	57	#	70	101	77
Extracted ISTD ¹³ C ₂ PFTeDA	%	62	44	77	139	103
Extracted ISTD ¹³ C ₂ 4:2FTS	%	112	98	174	104	108
Extracted ISTD ¹³ C ₂ 6:2FTS	%	90	58	116	115	93
Extracted ISTD ¹³ C ₂ 8:2FTS	%	108	51	123	139	119
Extracted ISTD ¹³ C ₈ FOSA	%	75	42	72	108	98
Extracted ISTD d ₃ N MeFOSA	%	52	28	45	96	77
Extracted ISTD d ₅ N EtFOSA	%	60	34	48	97	64
Extracted ISTD d ₇ N MeFOSE	%	54	32	48	101	76
Extracted ISTD d ₉ N EtFOSE	%	55	33	45	101	71
Extracted ISTD d ₃ N MeFOSAA	%	78	48	79	119	109
Extracted ISTD d ₅ N EtFOSAA	%	80	50	88	127	106
Total Positive PFHxS & PFOS	µg/kg	<0.1	47	0.7	28	7.0
Total Positive PFOS & PFOA	µg/kg	<0.1	43	0.7	19	5.4
Total Positive PFAS	µg/kg	<0.1	48	0.7	32	7.7

Moisture						
Our Reference		348825-3	348825-8	348825-9	348825-14	348825-16
Your Reference	UNITS	0021_QC202_24 0409	0021_QC207_24 0410	0021_QC208_24 0410	0021_QC213_24 0412	0021_QC215_24 0412
Date Sampled		09/04/2024	10/04/2024	10/04/2024	12/04/2024	12/04/2024
Type of sample		Sediment	Sediment	Sediment	Sediment	Sediment
Date prepared	-	19/04/2024	19/04/2024	19/04/2024	19/04/2024	19/04/2024
Date analysed	-	22/04/2024	22/04/2024	22/04/2024	22/04/2024	22/04/2024
Moisture	%	25	82	55	15	20

PFAS in Waters Extended						
Our Reference		348825-2	348825-4	348825-5	348825-6	348825-7
Your Reference	UNITS	0021_QC201_24 0408	0021_QC203_24 0409	0021_QC204_24 0410	0021_QC205_24 0410	0021_QC206_24 0410
Date Sampled		08/04/2024	09/04/2024	10/04/2024	10/04/2024	10/04/2024
Type of sample		Water	Water	Water	Water	Water
Date prepared	-	17/04/2024	17/04/2024	17/04/2024	17/04/2024	17/04/2024
Date analysed	-	17/04/2024	17/04/2024	17/04/2024	17/04/2024	17/04/2024
Perfluorobutanesulfonic acid	µg/L	<0.01	0.03	<0.01	<0.01	0.01
Perfluoropentanesulfonic acid	µg/L	0.02	0.04	<0.01	<0.01	<0.01
Perfluorohexanesulfonic acid - PFHxS	µg/L	0.67	0.87	<0.01	<0.01	0.16
Perfluoroheptanesulfonic acid	µg/L	0.05	0.06	<0.01	<0.01	<0.01
Perfluorooctanesulfonic acid PFOS	µg/L	0.66	1.7	<0.01	<0.01	0.13
Perfluorodecanesulfonic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorobutanoic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoropentanoic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid	µg/L	0.06	0.04	<0.01	<0.01	<0.01
Perfluoroheptanoic acid	µg/L	0.01	0.01	<0.01	<0.01	<0.01
Perfluorooctanoic acid PFOA	µg/L	0.04	0.04	<0.01	<0.01	<0.01
Perfluorononanoic acid	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorodecanoic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
Perfluorotridecanoic acid	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluorotetradecanoic acid	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
4:2 FTS	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
6:2 FTS	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
8:2 FTS	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
10:2 FTS	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctane sulfonamide	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
N-Methyl perfluorooctane sulfonamide	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctanesulfonamide	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
N-Me perfluorooctanesulfonamid oethanol	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Et perfluorooctanesulfonamid oethanol	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
MePerfluorooctanesulf- amid oacetic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EtPerfluorooctanesulf- amid oacetic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Surrogate ¹³ C ₈ PFOS	%	96	100	101	91	97
Surrogate ¹³ C ₂ PFOA	%	102	101	99	101	98
Extracted ISTD ¹³ C ₃ PFBS	%	98	95	99	99	101
Extracted ISTD ¹⁸ O ₂ PFHxS	%	100	100	100	97	99
Extracted ISTD ¹³ C ₄ PFOS	%	97	94	96	99	103

PFAS in Waters Extended						
Our Reference		348825-2	348825-4	348825-5	348825-6	348825-7
Your Reference	UNITS	0021_QC201_24 0408	0021_QC203_24 0409	0021_QC204_24 0410	0021_QC205_24 0410	0021_QC206_24 0410
Date Sampled		08/04/2024	09/04/2024	10/04/2024	10/04/2024	10/04/2024
Type of sample		Water	Water	Water	Water	Water
Extracted ISTD ¹³ C ₄ PFBA	%	96	92	93	93	95
Extracted ISTD ¹³ C ₃ PFPeA	%	96	98	97	97	99
Extracted ISTD ¹³ C ₂ PFHxA	%	93	93	95	96	97
Extracted ISTD ¹³ C ₄ PFHpA	%	106	107	111	109	113
Extracted ISTD ¹³ C ₄ PFOA	%	98	98	101	101	105
Extracted ISTD ¹³ C ₅ PFNA	%	99	98	99	101	103
Extracted ISTD ¹³ C ₂ PFDA	%	94	92	94	95	95
Extracted ISTD ¹³ C ₂ PFUnDA	%	101	102	92	100	103
Extracted ISTD ¹³ C ₂ PFDoDA	%	100	89	90	88	96
Extracted ISTD ¹³ C ₂ PFTeDA	%	71	64	64	63	69
Extracted ISTD ¹³ C ₂ 4:2FTS	%	98	105	87	108	112
Extracted ISTD ¹³ C ₂ 6:2FTS	%	102	107	107	107	119
Extracted ISTD ¹³ C ₂ 8:2FTS	%	108	104	102	105	114
Extracted ISTD ¹³ C ₈ FOSA	%	103	103	106	105	106
Extracted ISTD d ₃ N MeFOSA	%	93	88	92	95	92
Extracted ISTD d ₅ N EtFOSA	%	86	87	82	90	88
Extracted ISTD d ₇ N MeFOSE	%	93	94	90	92	90
Extracted ISTD d ₉ N EtFOSE	%	92	91	84	89	83
Extracted ISTD d ₃ N MeFOSAA	%	111	106	106	108	113
Extracted ISTD d ₅ N EtFOSAA	%	109	104	94	109	108
Total Positive PFHxS & PFOS	µg/L	1.3	2.6	<0.01	<0.01	0.29
Total Positive PFOA & PFOS	µg/L	0.70	1.7	<0.01	<0.01	0.13
Total Positive PFAS	µg/L	1.5	2.8	<0.01	<0.01	0.30

PFAS in Waters Extended

Our Reference		348825-10	348825-11	348825-12	348825-13	348825-15
Your Reference	UNITS	0021_QC209_24 0410	0021_QC210_24 0410	0021_QC211_24 0410	0021_QC212_24 0411	0021_QC214_24 0411
Date Sampled		10/04/2024	10/04/2024	10/04/2024	11/04/2024	11/04/2024
Type of sample		Water	Water	Water	Water	Water
Date prepared	-	17/04/2024	17/04/2024	17/04/2024	17/04/2024	17/04/2024
Date analysed	-	17/04/2024	17/04/2024	17/04/2024	17/04/2024	17/04/2024
Perfluorobutanesulfonic acid	µg/L	<0.01	0.02	<0.01	0.17	0.26
Perfluoropentanesulfonic acid	µg/L	<0.01	0.04	<0.01	0.21	0.25
Perfluorohexanesulfonic acid - PFHxS	µg/L	<0.01	0.41	0.02	3.0	1.1
Perfluoroheptanesulfonic acid	µg/L	<0.01	<0.01	<0.01	0.09	<0.01
Perfluorooctanesulfonic acid PFOS	µg/L	<0.01	0.61	0.02	2.3	0.20
Perfluorodecanesulfonic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorobutanoic acid	µg/L	<0.02	<0.02	<0.02	0.04	0.07
Perfluoropentanoic acid	µg/L	<0.02	<0.02	<0.02	0.08	0.2
Perfluorohexanoic acid	µg/L	<0.01	0.10	<0.01	0.40	0.64
Perfluoroheptanoic acid	µg/L	<0.01	<0.01	<0.01	0.05	0.06
Perfluorooctanoic acid PFOA	µg/L	<0.01	0.02	<0.01	0.09	0.03
Perfluorononanoic acid	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorodecanoic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
Perfluorotridecanoic acid	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
Perfluorotetradecanoic acid	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
4:2 FTS	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
6:2 FTS	µg/L	<0.01	<0.01	<0.01	<0.01	<0.01
8:2 FTS	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
10:2 FTS	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctane sulfonamide	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
N-Methyl perfluorooctane sulfonamide	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctanesulfonamide	µg/L	<0.1	<0.1	<0.1	<0.1	<0.1
N-Me perfluorooctanesulfonamid oethanol	µg/L	<0.05	<0.05	<0.05	<0.05	<0.05
N-Et perfluorooctanesulfonamid oethanol	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
MePerfluorooctanesulf- amid oacetic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
EtPerfluorooctanesulf- amid oacetic acid	µg/L	<0.02	<0.02	<0.02	<0.02	<0.02
Surrogate ¹³ C ₈ PFOS	%	97	99	97	103	94
Surrogate ¹³ C ₂ PFOA	%	103	100	98	98	95
Extracted ISTD ¹³ C ₃ PFBS	%	96	94	97	97	100
Extracted ISTD ¹⁸ O ₂ PFHxS	%	95	92	95	97	96
Extracted ISTD ¹³ C ₄ PFOS	%	99	100	100	96	102
Extracted ISTD ¹³ C ₄ PFBA	%	77	90	90	95	97

PFAS in Waters Extended						
Our Reference		348825-10	348825-11	348825-12	348825-13	348825-15
Your Reference	UNITS	0021_QC209_24 0410	0021_QC210_24 0410	0021_QC211_24 0410	0021_QC212_24 0411	0021_QC214_24 0411
Date Sampled		10/04/2024	10/04/2024	10/04/2024	11/04/2024	11/04/2024
Type of sample		Water	Water	Water	Water	Water
Extracted ISTD ¹³ C ₃ PFPeA	%	101	102	100	101	101
Extracted ISTD ¹³ C ₂ PFHxA	%	96	96	93	97	96
Extracted ISTD ¹³ C ₄ PFHpA	%	100	103	103	102	106
Extracted ISTD ¹³ C ₄ PFOA	%	101	102	104	107	111
Extracted ISTD ¹³ C ₅ PFNA	%	111	112	114	114	116
Extracted ISTD ¹³ C ₂ PFDA	%	112	107	109	109	108
Extracted ISTD ¹³ C ₂ PFUnDA	%	115	115	113	118	115
Extracted ISTD ¹³ C ₂ PFDoDA	%	111	112	116	116	116
Extracted ISTD ¹³ C ₂ PFTeDA	%	83	82	88	80	87
Extracted ISTD ¹³ C ₂ 4:2FTS	%	112	108	106	107	115
Extracted ISTD ¹³ C ₂ 6:2FTS	%	115	120	117	121	82
Extracted ISTD ¹³ C ₂ 8:2FTS	%	152	151	137	103	141
Extracted ISTD ¹³ C ₈ FOSA	%	107	107	109	108	108
Extracted ISTD d ₃ N MeFOSA	%	92	93	97	96	94
Extracted ISTD d ₅ N EtFOSA	%	90	91	92	93	95
Extracted ISTD d ₇ N MeFOSE	%	95	97	95	96	92
Extracted ISTD d ₉ N EtFOSE	%	90	93	96	91	93
Extracted ISTD d ₃ N MeFOSAA	%	111	116	108	111	112
Extracted ISTD d ₅ N EtFOSAA	%	115	113	111	121	121
Total Positive PFHxS & PFOS	µg/L	<0.01	1.0	0.05	5.3	1.3
Total Positive PFOA & PFOS	µg/L	<0.01	0.63	0.02	2.3	0.23
Total Positive PFAS	µg/L	<0.01	1.2	0.05	6.4	2.8

PFAS in Waters Trace Extended		
Our Reference		348825-1
Your Reference	UNITS	0021_QC200_24 0409
Date Sampled		09/04/2024
Type of sample		Water
Date prepared	-	18/04/2024
Date analysed	-	18/04/2024
Perfluorobutanesulfonic acid	µg/L	<0.0004
Perfluoropentanesulfonic acid	µg/L	<0.001
Perfluorohexanesulfonic acid - PFHxS	µg/L	<0.0002
Perfluoroheptanesulfonic acid	µg/L	<0.001
Perfluorooctanesulfonic acid PFOS	µg/L	<0.0002
Perfluorodecanesulfonic acid	µg/L	<0.002
Perfluorobutanoic acid	µg/L	<0.002
Perfluoropentanoic acid	µg/L	<0.002
Perfluorohexanoic acid	µg/L	<0.0004
Perfluoroheptanoic acid	µg/L	<0.0004
Perfluorooctanoic acid PFOA	µg/L	<0.0002
Perfluorononanoic acid	µg/L	<0.001
Perfluorodecanoic acid	µg/L	<0.002
Perfluoroundecanoic acid	µg/L	<0.002
Perfluorododecanoic acid	µg/L	<0.005
Perfluorotridecanoic acid	µg/L	<0.01
Perfluorotetradecanoic acid	µg/L	<0.05
4:2 FTS	µg/L	<0.001
6:2 FTS	µg/L	<0.0004
8:2 FTS	µg/L	<0.0004
10:2 FTS	µg/L	<0.002
Perfluorooctane sulfonamide	µg/L	<0.01
N-Methyl perfluorooctane sulfonamide	µg/L	<0.05
N-Ethyl perfluorooctanesulfonamide	µg/L	<0.1
N-Me perfluorooctanesulfonamid oethanol	µg/L	<0.05
N-Et perfluorooctanesulfonamid oethanol	µg/L	<0.5
MePerfluorooctanesulf- amid oacetic acid	µg/L	<0.002
EtPerfluorooctanesulf- amid oacetic acid	µg/L	<0.002
Surrogate ¹³ C ₈ PFOS	%	101
Surrogate ¹³ C ₂ PFOA	%	98
Extracted ISTD ¹³ C ₃ PFBS	%	87
Extracted ISTD ¹⁸ O ₂ PFHxS	%	82
Extracted ISTD ¹³ C ₄ PFOS	%	73

PFAS in Waters Trace Extended		
Our Reference		348825-1
Your Reference	UNITS	0021_QC200_24 0409
Date Sampled		09/04/2024
Type of sample		Water
Extracted ISTD ¹³ C ₄ PFBA	%	54
Extracted ISTD ¹³ C ₃ PFPeA	%	78
Extracted ISTD ¹³ C ₂ PFHxA	%	89
Extracted ISTD ¹³ C ₄ PFHpA	%	92
Extracted ISTD ¹³ C ₄ PFOA	%	94
Extracted ISTD ¹³ C ₅ PFNA	%	90
Extracted ISTD ¹³ C ₂ PFDA	%	80
Extracted ISTD ¹³ C ₂ PFUnDA	%	88
Extracted ISTD ¹³ C ₂ PFDoDA	%	82
Extracted ISTD ¹³ C ₂ PFTeDA	%	58
Extracted ISTD ¹³ C ₂ 4:2FTS	%	108
Extracted ISTD ¹³ C ₂ 6:2FTS	%	123
Extracted ISTD ¹³ C ₂ 8:2FTS	%	121
Extracted ISTD ¹³ C ₈ FOSA	%	71
Extracted ISTD d ₃ N MeFOSA	%	108
Extracted ISTD d ₅ N EtFOSA	%	110
Extracted ISTD d ₇ N MeFOSE	%	110
Extracted ISTD d ₉ N EtFOSE	%	101
Extracted ISTD d ₃ N MeFOSAA	%	83
Extracted ISTD d ₅ N EtFOSAA	%	82
Total Positive PFHxS & PFOS	µg/L	<0.0002
Total Positive PFOS & PFOA	µg/L	<0.0002
Total Positive PFAS	µg/L	<0.0002

Method ID	Methodology Summary
Inorg-008	Moisture content determined by heating at 105+/-5 °C for a minimum of 12 hours.
Org-029	Soil samples are extracted with basified Methanol. Waters and soil extracts are directly injected and/or concentrated/extracted using SPE. TCLPs/ASLP leachates are centrifuged, the supernatant is then analysed (including amendment with solvent) - as per the option in AS4439.3. Analysis is undertaken with LC-MS/MS. PFAS results include the sum of branched and linear isomers where applicable. Please note that PFAS results are corrected for Extracted Internal Standards (QSM 5.4 Table B-15 terminology), which are mass labelled analytes added prior to sample preparation to assess matrix effects and verify processing of the sample. PFAS analytes without a commercially available mass labelled analogue are corrected vs a closely eluting mass labelled PFAS compound. Surrogates are also reported, in this context they are mass labelled PFAS compounds added prior to extraction but are used as monitoring compounds only (not used for result correction). Envicarb (or similar) is used discretionally to remove interfering matrix components. Please contact the laboratory if estimates of Measurement Uncertainty are required as per WA DER.

QUALITY CONTROL: PFAS in Soils Extended					Duplicate			Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	348825-8
Date prepared	-			22/04/2024	3	22/04/2024	22/04/2024		22/04/2024	22/04/2024
Date analysed	-			22/04/2024	3	22/04/2024	22/04/2024		22/04/2024	22/04/2024
Perfluorobutanesulfonic acid	µg/kg	0.1	Org-029	<0.1	3	<0.1	<0.1	0	97	94
Perfluoropentanesulfonic acid	µg/kg	0.1	Org-029	<0.1	3	<0.1	<0.1	0	92	82
Perfluorohexanesulfonic acid - PFHxS	µg/kg	0.1	Org-029	<0.1	3	<0.1	<0.1	0	96	91
Perfluoroheptanesulfonic acid	µg/kg	0.1	Org-029	<0.1	3	<0.1	<0.1	0	97	80
Perfluorooctanesulfonic acid PFOS	µg/kg	0.1	Org-029	<0.1	3	<0.1	<0.1	0	106	86
Perfluorodecanesulfonic acid	µg/kg	0.2	Org-029	<0.2	3	<0.2	<0.2	0	124	86
Perfluorobutanoic acid	µg/kg	0.2	Org-029	<0.2	3	<0.2	<0.2	0	101	97
Perfluoropentanoic acid	µg/kg	0.2	Org-029	<0.2	3	<0.2	<0.2	0	99	93
Perfluorohexanoic acid	µg/kg	0.1	Org-029	<0.1	3	<0.1	<0.1	0	94	88
Perfluoroheptanoic acid	µg/kg	0.1	Org-029	<0.1	3	<0.1	<0.1	0	96	95
Perfluorooctanoic acid PFOA	µg/kg	0.1	Org-029	<0.1	3	<0.1	<0.1	0	94	95
Perfluorononanoic acid	µg/kg	0.1	Org-029	<0.1	3	<0.1	<0.1	0	93	78
Perfluorodecanoic acid	µg/kg	0.5	Org-029	<0.5	3	<0.5	<0.5	0	100	93
Perfluoroundecanoic acid	µg/kg	0.5	Org-029	<0.5	3	<0.5	<0.5	0	95	82
Perfluorododecanoic acid	µg/kg	0.5	Org-029	<0.5	3	<0.5	<0.5	0	98	86
Perfluorotridecanoic acid	µg/kg	0.5	Org-029	<0.5	3	<0.5	<0.5	0	109	147
Perfluorotetradecanoic acid	µg/kg	5	Org-029	<5	3	<5	<5	0	101	98
4:2 FTS	µg/kg	0.1	Org-029	<0.1	3	<0.1	<0.1	0	107	103
6:2 FTS	µg/kg	0.1	Org-029	<0.1	3	<0.1	<0.1	0	98	106
8:2 FTS	µg/kg	0.2	Org-029	<0.2	3	<0.2	<0.2	0	100	70
10:2 FTS	µg/kg	0.2	Org-029	<0.2	3	<0.2	<0.2	0	109	42
Perfluorooctane sulfonamide	µg/kg	1	Org-029	<1	3	<1	<1	0	95	91
N-Methyl perfluorooctane sulfonamide	µg/kg	1	Org-029	<1	3	<1	<1	0	98	90
N-Ethyl perfluorooctanesulfonamide	µg/kg	1	Org-029	<1	3	<1	<1	0	94	93
N-Me perfluorooctanesulfonamidethanol	µg/kg	1	Org-029	<1	3	<1	<1	0	94	100
N-Et perfluorooctanesulfonamidethanol	µg/kg	5	Org-029	<5	3	<5	<5	0	99	114
MePerfluorooctanesulfonamidacetic acid	µg/kg	0.2	Org-029	<0.2	3	<0.2	<0.2	0	101	101
EtPerfluorooctanesulfonamidacetic acid	µg/kg	0.2	Org-029	<0.2	3	<0.2	<0.2	0	92	80
Surrogate ¹³ C ₈ PFOS	%		Org-029	104	3	107	110	3	100	108
Surrogate ¹³ C ₂ PFOA	%		Org-029	101	3	99	101	2	98	100

QUALITY CONTROL: PFAS in Soils Extended					Duplicate			Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	348825-8
Extracted ISTD ¹³ C ₃ PFBS	%		Org-029	109	3	93	91	2	105	75
Extracted ISTD ¹⁸ O ₂ PFHxS	%		Org-029	113	3	97	106	9	113	85
Extracted ISTD ¹³ C ₄ PFOS	%		Org-029	101	3	85	86	1	101	57
Extracted ISTD ¹³ C ₄ PFBA	%		Org-029	101	3	92	92	0	101	62
Extracted ISTD ¹³ C ₃ PFPeA	%		Org-029	105	3	104	101	3	103	73
Extracted ISTD ¹³ C ₂ PFHxA	%		Org-029	101	3	96	97	1	100	74
Extracted ISTD ¹³ C ₄ PFHpA	%		Org-029	109	3	100	100	0	106	66
Extracted ISTD ¹³ C ₄ PFOA	%		Org-029	110	3	90	92	2	110	48
Extracted ISTD ¹³ C ₅ PFNA	%		Org-029	124	3	91	99	8	117	52
Extracted ISTD ¹³ C ₂ PFDA	%		Org-029	118	3	91	91	0	110	34
Extracted ISTD ¹³ C ₂ PFUnDA	%		Org-029	138	3	81	90	11	129	45
Extracted ISTD ¹³ C ₂ PFDoDA	%		Org-029	124	3	57	63	10	120	##
Extracted ISTD ¹³ C ₂ PFTeDA	%		Org-029	142	3	62	68	9	136	43
Extracted ISTD ¹³ C ₂ 4:2FTS	%		Org-029	103	3	112	120	7	105	92
Extracted ISTD ¹³ C ₂ 6:2FTS	%		Org-029	117	3	90	104	14	113	61
Extracted ISTD ¹³ C ₂ 8:2FTS	%		Org-029	123	3	108	116	7	131	59
Extracted ISTD ¹³ C ₈ FOSA	%		Org-029	116	3	75	79	5	111	48
Extracted ISTD d ₃ N MeFOSA	%		Org-029	111	3	52	55	6	108	33
Extracted ISTD d ₅ N EtFOSA	%		Org-029	113	3	60	63	5	108	37
Extracted ISTD d ₇ N MeFOSE	%		Org-029	112	3	54	58	7	114	35

QUALITY CONTROL: PFAS in Soils Extended					Duplicate			Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	348825-8
<i>Extracted ISTD d₉ N EtFOSE</i>	%		Org-029	114	3	55	61	10	110	35
<i>Extracted ISTD d₃ N MeFOSAA</i>	%		Org-029	118	3	78	83	6	109	49
<i>Extracted ISTD d₅ N EtFOSAA</i>	%		Org-029	112	3	80	84	5	115	51

QUALITY CONTROL: PFAS in Waters Extended						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W2	348825-4
Date prepared	-			17/04/2024	2	17/04/2024	17/04/2024		17/04/2024	17/04/2024
Date analysed	-			17/04/2024	2	17/04/2024	17/04/2024		17/04/2024	17/04/2024
Perfluorobutanesulfonic acid	µg/L	0.01	Org-029	<0.01	2	<0.01	<0.01	0	110	118
Perfluoropentanesulfonic acid	µg/L	0.01	Org-029	<0.01	2	0.02	0.02	0	105	105
Perfluorohexanesulfonic acid - PFHxS	µg/L	0.01	Org-029	<0.01	2	0.67	0.68	1	104	110
Perfluoroheptanesulfonic acid	µg/L	0.01	Org-029	<0.01	2	0.05	0.05	0	105	106
Perfluorooctanesulfonic acid PFOS	µg/L	0.01	Org-029	<0.01	2	0.66	0.68	3	113	122
Perfluorodecanesulfonic acid	µg/L	0.02	Org-029	<0.02	2	<0.02	<0.02	0	87	102
Perfluorobutanoic acid	µg/L	0.02	Org-029	<0.02	2	<0.02	<0.02	0	112	114
Perfluoropentanoic acid	µg/L	0.02	Org-029	<0.02	2	<0.02	<0.02	0	105	108
Perfluorohexanoic acid	µg/L	0.01	Org-029	<0.01	2	0.06	0.06	0	101	109
Perfluoroheptanoic acid	µg/L	0.01	Org-029	<0.01	2	0.01	0.01	0	102	105
Perfluorooctanoic acid PFOA	µg/L	0.01	Org-029	<0.01	2	0.04	0.04	0	101	107
Perfluorononanoic acid	µg/L	0.01	Org-029	<0.01	2	<0.01	<0.01	0	102	105
Perfluorodecanoic acid	µg/L	0.02	Org-029	<0.02	2	<0.02	<0.02	0	110	106
Perfluoroundecanoic acid	µg/L	0.02	Org-029	<0.02	2	<0.02	<0.02	0	107	110
Perfluorododecanoic acid	µg/L	0.05	Org-029	<0.05	2	<0.05	<0.05	0	107	108
Perfluorotridecanoic acid	µg/L	0.1	Org-029	<0.1	2	<0.1	<0.1	0	108	104
Perfluorotetradecanoic acid	µg/L	0.5	Org-029	<0.5	2	<0.5	<0.5	0	109	115
4:2 FTS	µg/L	0.01	Org-029	<0.01	2	<0.01	<0.01	0	100	99
6:2 FTS	µg/L	0.01	Org-029	<0.01	2	<0.01	<0.01	0	102	99
8:2 FTS	µg/L	0.02	Org-029	<0.02	2	<0.02	<0.02	0	97	109
10:2 FTS	µg/L	0.02	Org-029	<0.02	2	<0.02	<0.02	0	109	107
Perfluorooctane sulfonamide	µg/L	0.1	Org-029	<0.1	2	<0.1	<0.1	0	102	102
N-Methyl perfluorooctane sulfonamide	µg/L	0.05	Org-029	<0.05	2	<0.05	<0.05	0	104	106
N-Ethyl perfluorooctanesulfonamide	µg/L	0.1	Org-029	<0.1	2	<0.1	<0.1	0	100	107
N-Me perfluorooctanesulfonamidethanol	µg/L	0.05	Org-029	<0.05	2	<0.05	<0.05	0	106	106
N-Et perfluorooctanesulfonamidethanol	µg/L	0.5	Org-029	<0.5	2	<0.5	<0.5	0	105	108
MePerfluorooctanesulfonamidacetic acid	µg/L	0.02	Org-029	<0.02	2	<0.02	<0.02	0	105	97
EtPerfluorooctanesulfonamidacetic acid	µg/L	0.02	Org-029	<0.02	2	<0.02	<0.02	0	98	109
Surrogate ¹³ C ₈ PFOS	%		Org-029	95	2	96	99	3	99	103
Surrogate ¹³ C ₂ PFOA	%		Org-029	97	2	102	97	5	95	98

QUALITY CONTROL: PFAS in Waters Extended					Duplicate			Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W2	348825-4
Extracted ISTD ¹³ C ₃ PFBS	%		Org-029	100	2	98	99	1	95	97
Extracted ISTD ¹⁸ O ₂ PFHxS	%		Org-029	103	2	100	98	2	97	99
Extracted ISTD ¹³ C ₄ PFOS	%		Org-029	99	2	97	93	4	99	93
Extracted ISTD ¹³ C ₄ PFBA	%		Org-029	96	2	96	96	0	98	91
Extracted ISTD ¹³ C ₃ PFPeA	%		Org-029	99	2	96	101	5	99	97
Extracted ISTD ¹³ C ₂ PFHxA	%		Org-029	95	2	93	94	1	96	94
Extracted ISTD ¹³ C ₄ PFHpA	%		Org-029	108	2	106	105	1	103	105
Extracted ISTD ¹³ C ₄ PFOA	%		Org-029	101	2	98	99	1	105	101
Extracted ISTD ¹³ C ₅ PFNA	%		Org-029	100	2	99	101	2	113	99
Extracted ISTD ¹³ C ₂ PFDA	%		Org-029	95	2	94	94	0	106	95
Extracted ISTD ¹³ C ₂ PFUnDA	%		Org-029	105	2	101	105	4	116	98
Extracted ISTD ¹³ C ₂ PFDoDA	%		Org-029	96	2	100	97	3	112	94
Extracted ISTD ¹³ C ₂ PFTeDA	%		Org-029	71	2	71	69	3	85	73
Extracted ISTD ¹³ C ₂ 4:2FTS	%		Org-029	99	2	98	92	6	99	98
Extracted ISTD ¹³ C ₂ 6:2FTS	%		Org-029	107	2	102	106	4	106	111
Extracted ISTD ¹³ C ₂ 8:2FTS	%		Org-029	105	2	108	100	8	137	106
Extracted ISTD ¹³ C ₈ FOSA	%		Org-029	107	2	103	105	2	105	103
Extracted ISTD d ₃ N MeFOSA	%		Org-029	96	2	93	91	2	97	94
Extracted ISTD d ₅ N EtFOSA	%		Org-029	90	2	86	86	0	95	89
Extracted ISTD d ₇ N MeFOSE	%		Org-029	96	2	93	96	3	93	94

QUALITY CONTROL: PFAS in Waters Extended						Duplicate		Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W2	348825-4
Extracted ISTD d ₉ N EtFOSE	%		Org-029	94	2	92	95	3	91	91
Extracted ISTD d ₃ N MeFOSAA	%		Org-029	111	2	111	111	0	111	108
Extracted ISTD d ₅ N EtFOSAA	%		Org-029	108	2	109	108	1	121	110

QUALITY CONTROL: PFAS in Waters Extended						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	[NT]	[NT]
Date prepared	-			[NT]	15	17/04/2024	17/04/2024		[NT]	[NT]
Date analysed	-			[NT]	15	17/04/2024	17/04/2024		[NT]	[NT]
Perfluorobutanesulfonic acid	µg/L	0.01	Org-029	[NT]	15	0.26	0.27	4	[NT]	[NT]
Perfluoropentanesulfonic acid	µg/L	0.01	Org-029	[NT]	15	0.25	0.27	8	[NT]	[NT]
Perfluorohexanesulfonic acid - PFHxS	µg/L	0.01	Org-029	[NT]	15	1.1	1.1	0	[NT]	[NT]
Perfluoroheptanesulfonic acid	µg/L	0.01	Org-029	[NT]	15	<0.01	0.01	0	[NT]	[NT]
Perfluorooctanesulfonic acid PFOS	µg/L	0.01	Org-029	[NT]	15	0.20	0.20	0	[NT]	[NT]
Perfluorodecanesulfonic acid	µg/L	0.02	Org-029	[NT]	15	<0.02	<0.02	0	[NT]	[NT]
Perfluorobutanoic acid	µg/L	0.02	Org-029	[NT]	15	0.07	0.07	0	[NT]	[NT]
Perfluoropentanoic acid	µg/L	0.02	Org-029	[NT]	15	0.2	0.2	0	[NT]	[NT]
Perfluorohexanoic acid	µg/L	0.01	Org-029	[NT]	15	0.64	0.65	2	[NT]	[NT]
Perfluoroheptanoic acid	µg/L	0.01	Org-029	[NT]	15	0.06	0.07	15	[NT]	[NT]
Perfluorooctanoic acid PFOA	µg/L	0.01	Org-029	[NT]	15	0.03	0.03	0	[NT]	[NT]
Perfluorononanoic acid	µg/L	0.01	Org-029	[NT]	15	<0.01	<0.01	0	[NT]	[NT]
Perfluorodecanoic acid	µg/L	0.02	Org-029	[NT]	15	<0.02	<0.02	0	[NT]	[NT]
Perfluoroundecanoic acid	µg/L	0.02	Org-029	[NT]	15	<0.02	<0.02	0	[NT]	[NT]
Perfluorododecanoic acid	µg/L	0.05	Org-029	[NT]	15	<0.05	<0.05	0	[NT]	[NT]
Perfluorotridecanoic acid	µg/L	0.1	Org-029	[NT]	15	<0.1	<0.1	0	[NT]	[NT]
Perfluorotetradecanoic acid	µg/L	0.5	Org-029	[NT]	15	<0.5	<0.5	0	[NT]	[NT]
4:2 FTS	µg/L	0.01	Org-029	[NT]	15	<0.01	<0.01	0	[NT]	[NT]
6:2 FTS	µg/L	0.01	Org-029	[NT]	15	<0.01	<0.01	0	[NT]	[NT]
8:2 FTS	µg/L	0.02	Org-029	[NT]	15	<0.02	<0.02	0	[NT]	[NT]
10:2 FTS	µg/L	0.02	Org-029	[NT]	15	<0.02	<0.02	0	[NT]	[NT]
Perfluorooctane sulfonamide	µg/L	0.1	Org-029	[NT]	15	<0.1	<0.1	0	[NT]	[NT]
N-Methyl perfluorooctane sulfonamide	µg/L	0.05	Org-029	[NT]	15	<0.05	<0.05	0	[NT]	[NT]
N-Ethyl perfluorooctanesulfon amide	µg/L	0.1	Org-029	[NT]	15	<0.1	<0.1	0	[NT]	[NT]
N-Me perfluorooctanesulfonamid oethanol	µg/L	0.05	Org-029	[NT]	15	<0.05	<0.05	0	[NT]	[NT]
N-Et perfluorooctanesulfonamid oethanol	µg/L	0.5	Org-029	[NT]	15	<0.5	<0.5	0	[NT]	[NT]
MePerfluorooctanesulf- amid oacetic acid	µg/L	0.02	Org-029	[NT]	15	<0.02	<0.02	0	[NT]	[NT]
EtPerfluorooctanesulf- amid oacetic acid	µg/L	0.02	Org-029	[NT]	15	<0.02	<0.02	0	[NT]	[NT]
Surrogate ¹³ C ₈ PFOS	%		Org-029	[NT]	15	94	94	0	[NT]	[NT]
Surrogate ¹³ C ₂ PFOA	%		Org-029	[NT]	15	95	96	1	[NT]	[NT]

QUALITY CONTROL: PFAS in Waters Extended						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	[NT]	[NT]
Extracted ISTD ¹³ C ₃ PFBS	%		Org-029	[NT]	15	100	98	2	[NT]	[NT]
Extracted ISTD ¹⁸ O ₂ PFHxS	%		Org-029	[NT]	15	96	95	1	[NT]	[NT]
Extracted ISTD ¹³ C ₄ PFOS	%		Org-029	[NT]	15	102	102	0	[NT]	[NT]
Extracted ISTD ¹³ C ₄ PFBA	%		Org-029	[NT]	15	97	98	1	[NT]	[NT]
Extracted ISTD ¹³ C ₃ PFPeA	%		Org-029	[NT]	15	101	101	0	[NT]	[NT]
Extracted ISTD ¹³ C ₂ PFHxA	%		Org-029	[NT]	15	96	96	0	[NT]	[NT]
Extracted ISTD ¹³ C ₄ PFHpA	%		Org-029	[NT]	15	106	106	0	[NT]	[NT]
Extracted ISTD ¹³ C ₄ PFOA	%		Org-029	[NT]	15	111	108	3	[NT]	[NT]
Extracted ISTD ¹³ C ₅ PFNA	%		Org-029	[NT]	15	116	116	0	[NT]	[NT]
Extracted ISTD ¹³ C ₂ PFDA	%		Org-029	[NT]	15	108	107	1	[NT]	[NT]
Extracted ISTD ¹³ C ₂ PFUnDA	%		Org-029	[NT]	15	115	115	0	[NT]	[NT]
Extracted ISTD ¹³ C ₂ PFDoDA	%		Org-029	[NT]	15	116	109	6	[NT]	[NT]
Extracted ISTD ¹³ C ₂ PFTeDA	%		Org-029	[NT]	15	87	81	7	[NT]	[NT]
Extracted ISTD ¹³ C ₂ 4:2FTS	%		Org-029	[NT]	15	115	103	11	[NT]	[NT]
Extracted ISTD ¹³ C ₂ 6:2FTS	%		Org-029	[NT]	15	82	86	5	[NT]	[NT]
Extracted ISTD ¹³ C ₂ 8:2FTS	%		Org-029	[NT]	15	141	134	5	[NT]	[NT]
Extracted ISTD ¹³ C ₈ FOSA	%		Org-029	[NT]	15	108	110	2	[NT]	[NT]
Extracted ISTD d ₃ N MeFOSA	%		Org-029	[NT]	15	94	95	1	[NT]	[NT]
Extracted ISTD d ₅ N EtFOSA	%		Org-029	[NT]	15	95	92	3	[NT]	[NT]
Extracted ISTD d ₇ N MeFOSE	%		Org-029	[NT]	15	92	89	3	[NT]	[NT]

QUALITY CONTROL: PFAS in Waters Extended						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	[NT]	[NT]
Extracted ISTD d ₉ N EtFOSE	%		Org-029	[NT]	15	93	84	10	[NT]	[NT]
Extracted ISTD d ₃ N MeFOSAA	%		Org-029	[NT]	15	112	108	4	[NT]	[NT]
Extracted ISTD d ₅ N EtFOSAA	%		Org-029	[NT]	15	121	117	3	[NT]	[NT]

QUALITY CONTROL: PFAS in Waters Trace Extended						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W2	[NT]
Date prepared	-			18/04/2024	1	18/04/2024	18/04/2024		18/04/2024	[NT]
Date analysed	-			18/04/2024	1	18/04/2024	18/04/2024		18/04/2024	[NT]
Perfluorobutanesulfonic acid	µg/L	0.0004	Org-029	<0.0004	1	<0.0004	<0.0004	0	108	[NT]
Perfluoropentanesulfonic acid	µg/L	0.001	Org-029	<0.001	1	<0.001	<0.001	0	101	[NT]
Perfluorohexanesulfonic acid - PFHxS	µg/L	0.0002	Org-029	<0.0002	1	<0.0002	<0.0002	0	97	[NT]
Perfluoroheptanesulfonic acid	µg/L	0.001	Org-029	<0.001	1	<0.001	<0.001	0	88	[NT]
Perfluorooctanesulfonic acid PFOS	µg/L	0.0002	Org-029	<0.0002	1	<0.0002	<0.0002	0	106	[NT]
Perfluorodecanesulfonic acid	µg/L	0.002	Org-029	<0.002	1	<0.002	<0.002	0	74	[NT]
Perfluorobutanoic acid	µg/L	0.002	Org-029	<0.002	1	<0.002	<0.002	0	100	[NT]
Perfluoropentanoic acid	µg/L	0.002	Org-029	<0.002	1	<0.002	<0.002	0	99	[NT]
Perfluorohexanoic acid	µg/L	0.0004	Org-029	<0.0004	1	<0.0004	<0.0004	0	98	[NT]
Perfluoroheptanoic acid	µg/L	0.0004	Org-029	<0.0004	1	<0.0004	<0.0004	0	97	[NT]
Perfluorooctanoic acid PFOA	µg/L	0.0002	Org-029	<0.0002	1	<0.0002	<0.0002	0	99	[NT]
Perfluorononanoic acid	µg/L	0.001	Org-029	<0.001	1	<0.001	<0.001	0	100	[NT]
Perfluorodecanoic acid	µg/L	0.002	Org-029	<0.002	1	<0.002	<0.002	0	102	[NT]
Perfluoroundecanoic acid	µg/L	0.002	Org-029	<0.002	1	<0.002	<0.002	0	103	[NT]
Perfluorododecanoic acid	µg/L	0.005	Org-029	<0.005	1	<0.005	<0.005	0	102	[NT]
Perfluorotridecanoic acid	µg/L	0.01	Org-029	<0.01	1	<0.01	<0.01	0	109	[NT]
Perfluorotetradecanoic acid	µg/L	0.05	Org-029	<0.05	1	<0.05	<0.05	0	101	[NT]
4:2 FTS	µg/L	0.001	Org-029	<0.001	1	<0.001	<0.001	0	98	[NT]
6:2 FTS	µg/L	0.0004	Org-029	<0.0004	1	<0.0004	<0.0004	0	111	[NT]
8:2 FTS	µg/L	0.0004	Org-029	<0.0004	1	<0.0004	<0.0004	0	110	[NT]
10:2 FTS	µg/L	0.002	Org-029	<0.002	1	<0.002	<0.002	0	96	[NT]
Perfluorooctane sulfonamide	µg/L	0.01	Org-029	<0.01	1	<0.01	<0.01	0	102	[NT]
N-Methyl perfluorooctane sulfonamide	µg/L	0.05	Org-029	<0.05	1	<0.05	<0.05	0	115	[NT]
N-Ethyl perfluorooctanesulfonamide	µg/L	0.1	Org-029	<0.1	1	<0.1	<0.1	0	109	[NT]
N-Me perfluorooctanesulfonamidethanol	µg/L	0.05	Org-029	<0.05	1	<0.05	<0.05	0	107	[NT]
N-Et perfluorooctanesulfonamidethanol	µg/L	0.5	Org-029	<0.5	1	<0.5	<0.5	0	106	[NT]
MePerfluorooctanesulfonamidacetic acid	µg/L	0.002	Org-029	<0.002	1	<0.002	<0.002	0	103	[NT]
EtPerfluorooctanesulfonamidacetic acid	µg/L	0.002	Org-029	<0.002	1	<0.002	<0.002	0	103	[NT]
Surrogate ¹³ C ₈ PFOS	%		Org-029	98	1	101	102	1	97	[NT]
Surrogate ¹³ C ₂ PFOA	%		Org-029	102	1	98	98	0	100	[NT]

QUALITY CONTROL: PFAS in Waters Trace Extended					Duplicate			Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W2	[NT]
Extracted ISTD ¹³ C ₃ PFBS	%		Org-029	86	1	87	76	13	83	[NT]
Extracted ISTD ¹⁸ O ₂ PFHxS	%		Org-029	80	1	82	77	6	83	[NT]
Extracted ISTD ¹³ C ₄ PFOS	%		Org-029	72	1	73	68	7	72	[NT]
Extracted ISTD ¹³ C ₄ PFBA	%		Org-029	85	1	54	51	6	87	[NT]
Extracted ISTD ¹³ C ₃ PFPeA	%		Org-029	86	1	78	71	9	87	[NT]
Extracted ISTD ¹³ C ₂ PFHxA	%		Org-029	82	1	89	78	13	89	[NT]
Extracted ISTD ¹³ C ₄ PFHpA	%		Org-029	84	1	92	85	8	85	[NT]
Extracted ISTD ¹³ C ₄ PFOA	%		Org-029	82	1	94	87	8	84	[NT]
Extracted ISTD ¹³ C ₅ PFNA	%		Org-029	82	1	90	80	12	82	[NT]
Extracted ISTD ¹³ C ₂ PFDA	%		Org-029	89	1	80	81	1	86	[NT]
Extracted ISTD ¹³ C ₂ PFUnDA	%		Org-029	110	1	88	87	1	104	[NT]
Extracted ISTD ¹³ C ₂ PFDoDA	%		Org-029	89	1	82	74	10	89	[NT]
Extracted ISTD ¹³ C ₂ PFTeDA	%		Org-029	94	1	58	81	33	93	[NT]
Extracted ISTD ¹³ C ₂ 4:2FTS	%		Org-029	96	1	108	97	11	97	[NT]
Extracted ISTD ¹³ C ₂ 6:2FTS	%		Org-029	103	1	123	104	17	85	[NT]
Extracted ISTD ¹³ C ₂ 8:2FTS	%		Org-029	134	1	121	118	3	116	[NT]
Extracted ISTD ¹³ C ₈ FOSA	%		Org-029	75	1	71	72	1	70	[NT]
Extracted ISTD d ₃ N MeFOSA	%		Org-029	105	1	108	108	0	103	[NT]
Extracted ISTD d ₅ N EtFOSA	%		Org-029	108	1	110	111	1	106	[NT]
Extracted ISTD d ₇ N MeFOSE	%		Org-029	108	1	110	114	4	110	[NT]

QUALITY CONTROL: PFAS in Waters Trace Extended					Duplicate			Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W2	[NT]
Extracted ISTD d ₉ N EtFOSE	%		Org-029	105	1	101	106	5	101	[NT]
Extracted ISTD d ₃ N MeFOSAA	%		Org-029	98	1	83	84	1	91	[NT]
Extracted ISTD d ₅ N EtFOSAA	%		Org-029	103	1	82	79	4	91	[NT]

Result Definitions

NT	Not tested
NA	Test not required
INS	Insufficient sample for this test
PQL	Practical Quantitation Limit
<	Less than
>	Greater than
RPD	Relative Percent Difference
LCS	Laboratory Control Sample
NS	Not specified
NEPM	National Environmental Protection Measure
NR	Not Reported

Quality Control Definitions

Blank	This is the component of the analytical signal which is not derived from the sample but from reagents, glassware etc, can be determined by processing solvents and reagents in exactly the same manner as for samples.
Duplicate	This is the complete duplicate analysis of a sample from the process batch. If possible, the sample selected should be one where the analyte concentration is easily measurable.
Matrix Spike	A portion of the sample is spiked with a known concentration of target analyte. The purpose of the matrix spike is to monitor the performance of the analytical method used and to determine whether matrix interferences exist.
LCS (Laboratory Control Sample)	This comprises either a standard reference material or a control matrix (such as a blank sand or water) fortified with analytes representative of the analyte class. It is simply a check sample.
Surrogate Spike	Surrogates are known additions to each sample, blank, matrix spike and LCS in a batch, of compounds which are similar to the analyte of interest, however are not expected to be found in real samples.
Australian Drinking Water Guidelines recommend that Thermotolerant Coliform, Faecal Enterococci, & E.Coli levels are less than 1cfu/100mL. The recommended maximums are taken from "Australian Drinking Water Guidelines", published by NHMRC & ARMC 2011.	
The recommended maximums for analytes in urine are taken from "2018 TLVs and BEIs", as published by ACGIH (where available). Limit provided for Nickel is a precautionary guideline as per Position Paper prepared by AIOH Exposure Standards Committee, 2016.	
Guideline limits for Rinse Water Quality reported as per analytical requirements and specifications of AS 4187, Amdt 2 2019, Table 7.2	

Laboratory Acceptance Criteria

Duplicate sample and matrix spike recoveries may not be reported on smaller jobs, however, were analysed at a frequency to meet or exceed NEPM requirements. All samples are tested in batches of 20. The duplicate sample RPD and matrix spike recoveries for the batch were within the laboratory acceptance criteria.

Filters, swabs, wipes, tubes and badges will not have duplicate data as the whole sample is generally extracted during sample extraction.

Spikes for Physical and Aggregate Tests are not applicable.

For VOCs in water samples, three vials are required for duplicate or spike analysis.

Duplicates: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% – see ELN-P05 QA/QC tables for details; <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals (not SPOCAS); 60-140% for organics/SPOCAS (+/-50% surrogates) and 10-140% for labile SVOCs (including labile surrogates), ultra trace organics and speciated phenols is acceptable.

In circumstances where no duplicate and/or sample spike has been reported at 1 in 10 and/or 1 in 20 samples respectively, the sample volume submitted was insufficient in order to satisfy laboratory QA/QC protocols.

When samples are received where certain analytes are outside of recommended technical holding times (THTs), the analysis has proceeded. Where analytes are on the verge of breaching THTs, every effort will be made to analyse within the THT or as soon as practicable.

Where sampling dates are not provided, Envirolab are not in a position to comment on the validity of the analysis where recommended technical holding times may have been breached.

Where matrix spike recoveries fall below the lower limit of the acceptance criteria (e.g. for non-labile or standard Organics <60%), positive result(s) in the parent sample will subsequently have a higher than typical estimated uncertainty (MU estimates supplied on request) and in these circumstances the sample result is likely biased significantly low.

Measurement Uncertainty estimates are available for most tests upon request.

Analysis of aqueous samples typically involves the extraction/digestion and/or analysis of the liquid phase only (i.e. NOT any settled sediment phase but inclusive of suspended particles if present), unless stipulated on the Envirolab COC and/or by correspondence. Notable exceptions include certain Physical Tests (pH/EC/BOD/COD/Apparent Colour etc.), Solids testing, total recoverable metals and PFAS where solids are included by default.

Samples for Microbiological analysis (not Amoeba forms) received outside of the 2-8°C temperature range do not meet the ideal cooling conditions as stated in AS2031-2012.

Report Comments

For PFAS Extracted Internal Standards denoted with # or outside the 50-150% acceptance range, the respective target analyte results may be unaffected, in other circumstances the PQL has been raised to accommodate the outlier(s).

SAMPLE RECEIPT ADVICE

Client Details

Client	AECOM Australia Pty Ltd (Sydney)
Attention	

Sample Login Details

Your reference	ACT_0021_PFASOMP_24
Envirolab Reference	348825
Date Sample Received	15/04/2024
Date Instructions Received	17/04/2024
Date Results Expected to be Reported	24/04/2024

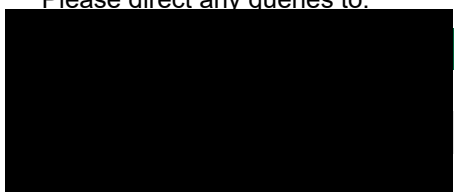
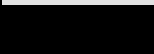
Sample Condition

Samples received in appropriate condition for analysis	Yes
No. of Samples Provided	11 Water, 5 Sediment
Turnaround Time Requested	Standard
Temperature on Receipt (°C)	3.0
Cooling Method	Ice
Sampling Date Provided	YES

Comments

All bottles came in bags, #7 had one bottle labelled as 0021_QC204 instead of 0021_QC206.
 Extra sample received - 0021_QC215_240412

Please direct any queries to:

Analysis Underway, details on the following page:

Sample ID	AECOM checks	AECOM checks	AECOM checks	PFAS in Soils Extended	PFAS in Waters Extended	PFAS in Waters Trace Extended
0021_QC200_240409	✓	✓	✓			✓
0021_QC201_240408	✓	✓	✓		✓	
0021_QC202_240409	✓	✓	✓	✓		
0021_QC203_240409	✓	✓	✓		✓	
0021_QC204_240410	✓	✓	✓		✓	
0021_QC205_240410	✓	✓	✓		✓	
0021_QC206_240410	✓	✓	✓		✓	
0021_QC207_240410	✓	✓	✓	✓		
0021_QC208_240410	✓	✓	✓	✓		
0021_QC209_240410	✓	✓	✓		✓	
0021_QC210_240410	✓	✓	✓		✓	
0021_QC211_240410	✓	✓	✓		✓	
0021_QC212_240411	✓	✓	✓		✓	
0021_QC213_240412	✓	✓	✓	✓		
0021_QC214_240411	✓	✓	✓		✓	
0021_QC215_240412	✓	✓	✓	✓		

The '✓' indicates the testing you have requested. **THIS IS NOT A REPORT OF THE RESULTS.**

Additional Info

Sample storage - Waters are routinely disposed of approximately 1 month and soils approximately 2 months from receipt.

Requests for longer term sample storage must be received in writing.

Please contact the laboratory immediately if observed settled sediment present in water samples is to be included in the extraction and/or analysis (exceptions include certain Physical Tests (pH/EC/BOD/COD/Apparent Colour etc.), Solids testing, Total Recoverable metals and PFAS analysis where solids are included by default.

TAT for Micro is dependent on incubation. This varies from 3 to 6 days.

ESKY 1: 3.0°C



CHAIN OF CUSTODY FORM - Client

ENVIROLAB GROUP

National phone number 1300 424 344

Sydney Lab - Envirolab Services
12 Ashley St, Chatswood, NSW 2067
☎ 02 9910 6200 | ✉ sydney@envirolab.com.au

Perth Lab - MPL Laboratories
16-18 Hayden Crt, Myaree, WA 6154
☎ 08 9317 2505 | ✉ lab@mpl.com.au

Melbourne Lab - Envirolab Services
25 Research Drive, Croydon South, VIC 3136
☎ 03 9763 2500 | ✉ melbourne@envirolab.com.au

Adelaide Office - Envirolab Services
7a The Parade, Norwood, SA 5067
☎ 08 7087 6800 | ✉ adelaide@envirolab.com.au

Brisbane Office - Envirolab Services
20a, 10-20 Depot St, Banyo, QLD 4014
☎ 07 3266 9532 | ✉ brisbane@envirolab.com.au

Darwin Office - Envirolab Services
Unit 20/119 Reichardt Road, Winnellie, NT 0820
☎ 08 8967 1201 | ✉ darwin@envirolab.com.au

[Copyright and Confidential]

Company:	AECOM		Client Project Name/Number/Site etc (ie report title):	ACT 0021 PFASOMP 24	
Contact Person:			PO No. (if applicable):	60612562 4.1	
Project Mgr:			Envirolab Quote No.:		
Sampler:			Date results required:	☒ Standard ☐ Same Day ☐ 1 day ☐ 2 day ☐ 3 day	
Address:	Level 21, 420 George St, Sydney, NSW, 2000		Note: Inform lab in advance if urgent turnaround is required - surcharges apply		
Phone:		Mob:	0431 835 223		
Email Results to:			Additional report format:	☒ Esdat ☐ Equis	
Email Invoice to:			Lab Comments:		

Sample information					Tests Required															Comments
Envirolab Sample ID (Lab use only)	Client Sample ID or Information	Depth	Date Sampled	Type of Sample	PFAS Extended Suite - Routine Level	PFAS Extended Suite - Trace Level														Provide as much information about the sample as you can
1	0021_QC200_24049		9/04/2024	Groundwater	X															
2	0021_QC201_24048		8/04/2024	Groundwater	X															
3	0021_QC202_24049		9/04/2024	Sediment	X															
4	0021_QC203_24049		9/04/2024	Surface water	X															
5	0021_QC204_240410		10/04/2024	Groundwater	X															
6	0021_QC205_240410		10/04/2024	Surface water	X															
7	0021_QC206_240410		10/04/2024	Surface water	X															
8	0021_QC207_240410		10/04/2024	Sediment	X															
9	0021_QC208_240410		10/04/2024	Sediment	X															
10	0021_QC209_240410		10/04/2024	Surface water	X															
11	0021_QC210_240410		10/04/2024	Surface water	X															
12	0021_QC211_240410		10/04/2024	Groundwater	X															
13	0021_QC212_240411		11/04/2024	Groundwater	X															
14	0021_QC213_240412		12/04/2024	Sediment	X															
15	0021_QC214_240411		11/04/2024	Surface water	X															

☐ Please tick the box if observed settled sediment present in water samples is to be included in the extraction and/or analysis

Relinquished by (Company): AECOM	Received by (Company): ELS 540	Lab Use Only	
Print Name:	Print Name:	Job number: 348825	Cooling: ☒ Ice / Ice pack / None
Date & Time:	Date & Time: 15/4/24 1130	Temperature: 3.0°C	Security seal: ☒ Intact / Broken / None
Signature:	Signature:	TAT Req - SAME day 1 1 2 3 4 1	STD

Form 302

Please send ESdat files to DERP.labreports@esdat.com.au and ensure that the files use the PROJECT NAME

16 0021-QC215-240412 (extra sample) UN

Page 1 of 1

<u>Login: LIMS PROCEDURE "AECOM LOGIN"</u>	Incorporated into EnviroLIMS	YES/No/Not Applicable (N/A)	Signed/Date
* Temp (to 0.5 deg) of each esky recorded on COC (eg write esky 1 = 6.5 deg, esky 2 = 8.5 deg).	AECOM_L_1	YES	UN 15/4
* Temp - on the SRA note the average of all esky temperatures	AECOM_L_1	YES	UN 15/4
* Arrival time - for samples received after 4pm the TAT starts the next day	AECOM_L_2	YES	UN 15/4
* Sample integrity - call AECOM + list on SRA if samples: damaged, wrong preservation, headspace, less than half holding time left, insufficient sample for analysis any other integrity issue	AECOM_L_3	N/A NO.	UN 15/4
* Cold storage <2hrs from receipt (ie: book them in quickly)	AECOM_L_4	YES	UN 15/4
* Check samples for headspace if for VOCs/SVOCs, let AECOM know if this is the case and record this	AECOM_L_5	N/A	UN 15/4
* Separate bags were not provided for Asbestos	AECOM_L_6	N/A	UN 15/4
* Samples of oil or fuel - must be stored in a separate fridge away from other samples	AECOM_L_7	N/A	UN 15/4
* If subcontracting – AECOM jobs must be on their own COC & include all the AECOM info (as we will attach the subcon report)	AECOM_L_8	N/A	UN 15/4
* If subcontracting – record temp on departure on the subcon COC & use a lot of ice bricks, temperature on arrival at the sub-con lab required	AECOM_L_9	N/A	UN 15/4
* If subcontracting volatiles – include a Trip Blank BTEX to the esky & add to the COC	AECOM_L_10	N/A	UN 15/4
* If metals bottles are not ticked as filtered - call the client and ask. Record this.	AECOM_L_11	N/A	UN 15/4
<u>Customer Service: LIMS PROCEDURE "AECOM CUST SERV"</u>	Incorporated into EnviroLIMS	YES/No/Not Applicable (N/A)	Signed/Date
* All correspondence in writing. cc AECOM Project Manager to everything. Save all emails in LIMS.	AECOM_CS_1		
* If we do a non routine test/matrix - inform AECOM of this + explain non NATA, non validated etc	AECOM_CS_2		
* Subcontracted – email to AECOM Project Manager informing them (pre-approved list)	DS to do this separately		
* Subcontracted – if you use a lab other than ALS/Eurofins/SGS/NMI - inform AECOM that normal QC procedures may not apply (needs to go on pre-approved list)	DS to do this separately		
* Complaints - respond in 24hrs and cc Project Manager and Yvonne	AECOM_CS_3		
* Complaints - CAR must be raised for wrong results, holding time breaches, non compliance with this agreement	AECOM_CS_4		
* SRA - Anything supposed to go here??	AECOM_CS_5		
* Holding time - if received after 12pm on last day of holding time or if day 1 tests are received too late - that's OK, just inform them	AECOM_CS_6		
* TAT- if received after 4pm TAT starts next day. TAT starts on receipt of correct COC	AECOM_CS_7		

CERTIFICATE OF ANALYSIS 348827

Client Details

Client	AECOM Australia Pty Ltd (Sydney)
Attention	
Address	PO Box Q410, QVB Post Office, Sydney, NSW, 1230

Sample Details

Your Reference	<u>ACT_0020_PFASOMP_24</u>
Number of Samples	3 Groundwater, 2 Sediment
Date samples received	15/04/2024
Date completed instructions received	15/04/2024

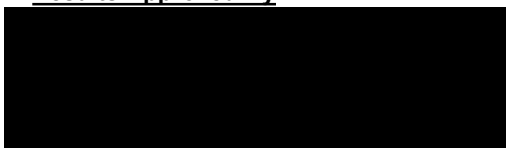
Analysis Details

Please refer to the following pages for results, methodology summary and quality control data.
Samples were analysed as received from the client. Results relate specifically to the samples as received.
Results are reported on a dry weight basis for solids and on an as received basis for other matrices.
Please refer to the last page of this report for any comments relating to the results.

Report Details

Date results requested by	22/04/2024
Date of Issue	22/04/2024
NATA Accreditation Number 2901. This document shall not be reproduced except in full.	
Accredited for compliance with ISO/IEC 17025 - Testing. Tests not covered by NATA are denoted with *	

Results Approved By



Authorised By



PFAS in Waters Extended				
Our Reference		348827-1	348827-2	348827-5
Your Reference	UNITS	0020_QC200_24 0408	0020_QC201_24 0408	0020_QC204_24 0408
Type of sample		Groundwater	Groundwater	Groundwater
Date Sampled		08/04/2024	08/04/2024	08/04/2024
Date prepared	-	16/04/2024	16/04/2024	16/04/2024
Date analysed	-	16/04/2024	16/04/2024	16/04/2024
Perfluorobutanesulfonic acid	µg/L	0.02	0.06	0.01
Perfluoropentanesulfonic acid	µg/L	0.03	0.08	<0.01
Perfluorohexanesulfonic acid - PFHxS	µg/L	0.39	1.3	0.14
Perfluoroheptanesulfonic acid	µg/L	0.06	0.08	<0.01
Perfluorooctanesulfonic acid PFOS	µg/L	0.89	6.5	0.27
Perfluorodecanesulfonic acid	µg/L	<0.02	<0.02	<0.02
Perfluorobutanoic acid	µg/L	0.05	<0.02	<0.02
Perfluoropentanoic acid	µg/L	0.05	0.02	<0.02
Perfluorohexanoic acid	µg/L	0.14	0.15	0.02
Perfluoroheptanoic acid	µg/L	0.02	0.02	<0.01
Perfluorooctanoic acid PFOA	µg/L	0.03	0.07	<0.01
Perfluorononanoic acid	µg/L	<0.01	<0.01	<0.01
Perfluorodecanoic acid	µg/L	<0.02	<0.02	<0.02
Perfluoroundecanoic acid	µg/L	<0.02	<0.02	<0.02
Perfluorododecanoic acid	µg/L	<0.05	<0.05	<0.05
Perfluorotridecanoic acid	µg/L	<0.1	<0.1	<0.1
Perfluorotetradecanoic acid	µg/L	<0.5	<0.5	<0.5
4:2 FTS	µg/L	<0.01	<0.01	<0.01
6:2 FTS	µg/L	<0.01	<0.01	<0.01
8:2 FTS	µg/L	<0.02	<0.02	<0.02
10:2 FTS	µg/L	<0.02	<0.02	<0.02
Perfluorooctane sulfonamide	µg/L	<0.1	<0.1	<0.1
N-Methyl perfluorooctane sulfonamide	µg/L	<0.05	<0.05	<0.05
N-Ethyl perfluorooctanesulfonamide	µg/L	<0.1	<0.1	<0.1
N-Me perfluorooctanesulfonamid oethanol	µg/L	<0.05	<0.05	<0.05
N-Et perfluorooctanesulfonamid oethanol	µg/L	<0.5	<0.5	<0.5
MePerfluorooctanesulf- amid oacetic acid	µg/L	<0.02	<0.02	<0.02
EtPerfluorooctanesulf- amid oacetic acid	µg/L	<0.02	<0.02	<0.02
Surrogate ¹³ C ₈ PFOS	%	97	102	102
Surrogate ¹³ C ₂ PFOA	%	101	99	98
Extracted ISTD ¹³ C ₃ PFBS	%	100	95	92
Extracted ISTD ¹⁸ O ₂ PFHxS	%	96	99	99
Extracted ISTD ¹³ C ₄ PFOS	%	107	95	95

PFAS in Waters Extended				
Our Reference		348827-1	348827-2	348827-5
Your Reference	UNITS	0020_QC200_24 0408	0020_QC201_24 0408	0020_QC204_24 0408
Type of sample		Groundwater	Groundwater	Groundwater
Date Sampled		08/04/2024	08/04/2024	08/04/2024
Extracted ISTD ¹³ C ₄ PFBA	%	82	92	79
Extracted ISTD ¹³ C ₃ PFPeA	%	113	103	85
Extracted ISTD ¹³ C ₂ PFHxA	%	101	97	92
Extracted ISTD ¹³ C ₄ PFHpA	%	110	111	104
Extracted ISTD ¹³ C ₄ PFOA	%	114	104	100
Extracted ISTD ¹³ C ₅ PFNA	%	127	98	101
Extracted ISTD ¹³ C ₂ PFDA	%	126	106	101
Extracted ISTD ¹³ C ₂ PFUnDA	%	138	109	111
Extracted ISTD ¹³ C ₂ PFDoDA	%	128	109	112
Extracted ISTD ¹³ C ₂ PFTeDA	%	94	82	83
Extracted ISTD ¹³ C ₂ 4:2FTS	%	114	108	73
Extracted ISTD ¹³ C ₂ 6:2FTS	%	123	111	76
Extracted ISTD ¹³ C ₂ 8:2FTS	%	174	116	92
Extracted ISTD ¹³ C ₈ FOSA	%	116	105	106
Extracted ISTD d ₃ N MeFOSA	%	108	97	95
Extracted ISTD d ₅ N EtFOSA	%	104	93	92
Extracted ISTD d ₇ N MeFOSE	%	114	95	91
Extracted ISTD d ₉ N EtFOSE	%	105	94	92
Extracted ISTD d ₃ N MeFOSAA	%	126	112	107
Extracted ISTD d ₅ N EtFOSAA	%	131	110	100
Total Positive PFHxS & PFOS	µg/L	1.3	7.9	0.41
Total Positive PFOA & PFOS	µg/L	0.91	6.6	0.27
Total Positive PFAS	µg/L	1.7	8.3	0.44

PFAS in Soils Extended			
Our Reference		348827-3	348827-4
Your Reference	UNITS	0020_QC202_24 0408	0020_QC203_24 0408
Type of sample		Sediment	Sediment
Date Sampled		08/04/2024	08/04/2024
Date prepared	-	16/04/2024	16/04/2024
Date analysed	-	16/04/2024	16/04/2024
Perfluorobutanesulfonic acid	µg/kg	<0.1	<0.1
Perfluoropentanesulfonic acid	µg/kg	<0.1	<0.1
Perfluorohexanesulfonic acid - PFHxS	µg/kg	<0.1	0.5
Perfluoroheptanesulfonic acid	µg/kg	<0.1	<0.1
Perfluorooctanesulfonic acid PFOS	µg/kg	0.3	10
Perfluorodecanesulfonic acid	µg/kg	<0.2	<0.2
Perfluorobutanoic acid	µg/kg	<0.2	<0.2
Perfluoropentanoic acid	µg/kg	<0.2	<0.2
Perfluorohexanoic acid	µg/kg	<0.1	0.1
Perfluoroheptanoic acid	µg/kg	<0.1	<0.1
Perfluorooctanoic acid PFOA	µg/kg	<0.1	0.1
Perfluorononanoic acid	µg/kg	<0.1	<0.1
Perfluorodecanoic acid	µg/kg	<0.5	<0.5
Perfluoroundecanoic acid	µg/kg	<0.5	<0.5
Perfluorododecanoic acid	µg/kg	<0.5	<0.5
Perfluorotridecanoic acid	µg/kg	<0.5	<0.5
Perfluorotetradecanoic acid	µg/kg	<5	<5
4:2 FTS	µg/kg	<0.1	<0.1
6:2 FTS	µg/kg	<0.1	<0.1
8:2 FTS	µg/kg	<0.2	<0.2
10:2 FTS	µg/kg	<0.2	<0.2
Perfluorooctane sulfonamide	µg/kg	<1	<1
N-Methyl perfluorooctane sulfonamide	µg/kg	<1	<1
N-Ethyl perfluorooctanesulfonamide	µg/kg	<1	<1
N-Me perfluorooctanesulfonamid oethanol	µg/kg	<1	<1
N-Et perfluorooctanesulfonamid oethanol	µg/kg	<5	<5
MePerfluorooctanesulf- amid oacetic acid	µg/kg	<0.2	<0.2
EtPerfluorooctanesulf amid oacetic acid	µg/kg	<0.2	<0.2
Surrogate ¹³ C ₈ PFOS	%	104	106
Surrogate ¹³ C ₂ PFOA	%	95	99
Extracted ISTD ¹³ C ₃ PFBS	%	94	85
Extracted ISTD ¹⁸ O ₂ PFHxS	%	91	86
Extracted ISTD ¹³ C ₄ PFOS	%	89	87

PFAS in Soils Extended			
Our Reference		348827-3	348827-4
Your Reference	UNITS	0020_QC202_24 0408	0020_QC203_24 0408
Type of sample		Sediment	Sediment
Date Sampled		08/04/2024	08/04/2024
Extracted ISTD ¹³ C ₄ PFBA	%	91	91
Extracted ISTD ¹³ C ₃ PFPeA	%	95	96
Extracted ISTD ¹³ C ₂ PFHxA	%	91	92
Extracted ISTD ¹³ C ₄ PFHpA	%	95	95
Extracted ISTD ¹³ C ₄ PFOA	%	95	97
Extracted ISTD ¹³ C ₅ PFNA	%	93	100
Extracted ISTD ¹³ C ₂ PFDA	%	95	97
Extracted ISTD ¹³ C ₂ PFUnDA	%	100	91
Extracted ISTD ¹³ C ₂ PFDoDA	%	94	100
Extracted ISTD ¹³ C ₂ PFTeDA	%	102	114
Extracted ISTD ¹³ C ₂ 4:2FTS	%	87	103
Extracted ISTD ¹³ C ₂ 6:2FTS	%	87	120
Extracted ISTD ¹³ C ₂ 8:2FTS	%	100	169
Extracted ISTD ¹³ C ₈ FOSA	%	96	54
Extracted ISTD d ₃ N MeFOSA	%	93	67
Extracted ISTD d ₅ N EtFOSA	%	90	70
Extracted ISTD d ₇ N MeFOSE	%	91	66
Extracted ISTD d ₉ N EtFOSE	%	92	65
Extracted ISTD d ₃ N MeFOSAA	%	92	108
Extracted ISTD d ₅ N EtFOSAA	%	93	118
Total Positive PFHxS & PFOS	µg/kg	0.3	11
Total Positive PFOS & PFOA	µg/kg	0.3	10
Total Positive PFAS	µg/kg	0.3	11

Moisture			
Our Reference		348827-3	348827-4
Your Reference	UNITS	0020_QC202_24 0408	0020_QC203_24 0408
Type of sample		Sediment	Sediment
Date Sampled		08/04/2024	08/04/2024
Date prepared	-	16/04/2024	16/04/2024
Date analysed	-	17/04/2024	17/04/2024
Moisture	%	17	39

Method ID	Methodology Summary
Inorg-008	Moisture content determined by heating at 105+/-5 °C for a minimum of 12 hours.
Org-029	Soil samples are extracted with basified Methanol. Waters and soil extracts are directly injected and/or concentrated/extracted using SPE. TCLPs/ASLP leachates are centrifuged, the supernatant is then analysed (including amendment with solvent) - as per the option in AS4439.3. Analysis is undertaken with LC-MS/MS. PFAS results include the sum of branched and linear isomers where applicable. Please note that PFAS results are corrected for Extracted Internal Standards (QSM 5.4 Table B-15 terminology), which are mass labelled analytes added prior to sample preparation to assess matrix effects and verify processing of the sample. PFAS analytes without a commercially available mass labelled analogue are corrected vs a closely eluting mass labelled PFAS compound. Surrogates are also reported, in this context they are mass labelled PFAS compounds added prior to extraction but are used as monitoring compounds only (not used for result correction). Envicarb (or similar) is used discretionally to remove interfering matrix components. Please contact the laboratory if estimates of Measurement Uncertainty are required as per WA DER.

QUALITY CONTROL: PFAS in Waters Extended					Duplicate			Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W2	348827-2
Date prepared	-			16/04/2024	1	16/04/2024	16/04/2024		16/04/2024	16/04/2024
Date analysed	-			16/04/2024	1	16/04/2024	16/04/2024		16/04/2024	16/04/2024
Perfluorobutanesulfonic acid	µg/L	0.01	Org-029	<0.01	1	0.02	0.02	0	112	111
Perfluoropentanesulfonic acid	µg/L	0.01	Org-029	<0.01	1	0.03	0.02	40	107	108
Perfluorohexanesulfonic acid - PFHxS	µg/L	0.01	Org-029	<0.01	1	0.39	0.38	3	109	103
Perfluoroheptanesulfonic acid	µg/L	0.01	Org-029	<0.01	1	0.06	0.05	18	109	113
Perfluorooctanesulfonic acid PFOS	µg/L	0.01	Org-029	<0.01	1	0.89	0.89	0	111	100
Perfluorodecanesulfonic acid	µg/L	0.02	Org-029	<0.02	1	<0.02	<0.02	0	95	93
Perfluorobutanoic acid	µg/L	0.02	Org-029	<0.02	1	0.05	0.04	22	108	107
Perfluoropentanoic acid	µg/L	0.02	Org-029	<0.02	1	0.05	0.05	0	104	107
Perfluorohexanoic acid	µg/L	0.01	Org-029	<0.01	1	0.14	0.14	0	105	104
Perfluoroheptanoic acid	µg/L	0.01	Org-029	<0.01	1	0.02	0.02	0	104	105
Perfluorooctanoic acid PFOA	µg/L	0.01	Org-029	<0.01	1	0.03	0.03	0	108	113
Perfluorononanoic acid	µg/L	0.01	Org-029	<0.01	1	<0.01	<0.01	0	108	113
Perfluorodecanoic acid	µg/L	0.02	Org-029	<0.02	1	<0.02	<0.02	0	105	109
Perfluoroundecanoic acid	µg/L	0.02	Org-029	<0.02	1	<0.02	<0.02	0	117	115
Perfluorododecanoic acid	µg/L	0.05	Org-029	<0.05	1	<0.05	<0.05	0	111	111
Perfluorotridecanoic acid	µg/L	0.1	Org-029	<0.1	1	<0.1	<0.1	0	112	107
Perfluorotetradecanoic acid	µg/L	0.5	Org-029	<0.5	1	<0.5	<0.5	0	112	114
4:2 FTS	µg/L	0.01	Org-029	<0.01	1	<0.01	<0.01	0	108	101
6:2 FTS	µg/L	0.01	Org-029	<0.01	1	<0.01	<0.01	0	95	110
8:2 FTS	µg/L	0.02	Org-029	<0.02	1	<0.02	<0.02	0	108	114
10:2 FTS	µg/L	0.02	Org-029	<0.02	1	<0.02	<0.02	0	102	106
Perfluorooctane sulfonamide	µg/L	0.1	Org-029	<0.1	1	<0.1	<0.1	0	111	105
N-Methyl perfluorooctane sulfonamide	µg/L	0.05	Org-029	<0.05	1	<0.05	<0.05	0	104	108
N-Ethyl perfluorooctanesulfonamide	µg/L	0.1	Org-029	<0.1	1	<0.1	<0.1	0	101	105
N-Me perfluorooctanesulfonamidethanol	µg/L	0.05	Org-029	<0.05	1	<0.05	<0.05	0	103	103
N-Et perfluorooctanesulfonamidethanol	µg/L	0.5	Org-029	<0.5	1	<0.5	<0.5	0	114	113
MePerfluorooctanesulfonamidacetic acid	µg/L	0.02	Org-029	<0.02	1	<0.02	<0.02	0	106	106
EtPerfluorooctanesulfonamidacetic acid	µg/L	0.02	Org-029	<0.02	1	<0.02	<0.02	0	105	103
Surrogate ¹³ C ₈ PFOS	%		Org-029	104	1	97	101	4	101	99
Surrogate ¹³ C ₂ PFOA	%		Org-029	99	1	101	101	0	100	99

QUALITY CONTROL: PFAS in Waters Extended					Duplicate			Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W2	348827-2
Extracted ISTD ¹³ C ₃ PFBS	%		Org-029	96	1	100	103	3	95	96
Extracted ISTD ¹⁸ O ₂ PFHxS	%		Org-029	98	1	96	102	6	98	98
Extracted ISTD ¹³ C ₄ PFOS	%		Org-029	94	1	107	107	0	95	96
Extracted ISTD ¹³ C ₄ PFBA	%		Org-029	103	1	82	82	0	100	89
Extracted ISTD ¹³ C ₃ PFPeA	%		Org-029	100	1	113	113	0	99	98
Extracted ISTD ¹³ C ₂ PFHxA	%		Org-029	98	1	101	102	1	97	99
Extracted ISTD ¹³ C ₄ PFHpA	%		Org-029	111	1	110	112	2	110	109
Extracted ISTD ¹³ C ₄ PFOA	%		Org-029	105	1	114	120	5	102	101
Extracted ISTD ¹³ C ₅ PFNA	%		Org-029	105	1	127	126	1	104	94
Extracted ISTD ¹³ C ₂ PFDA	%		Org-029	107	1	126	130	3	106	104
Extracted ISTD ¹³ C ₂ PFUnDA	%		Org-029	112	1	138	149	8	102	105
Extracted ISTD ¹³ C ₂ PFDoDA	%		Org-029	108	1	128	131	2	96	96
Extracted ISTD ¹³ C ₂ PFTeDA	%		Org-029	78	1	94	118	23	76	71
Extracted ISTD ¹³ C ₂ 4:2FTS	%		Org-029	107	1	114	107	6	98	110
Extracted ISTD ¹³ C ₂ 6:2FTS	%		Org-029	120	1	123	128	4	116	102
Extracted ISTD ¹³ C ₂ 8:2FTS	%		Org-029	133	1	174	167	4	119	113
Extracted ISTD ¹³ C ₈ FOSA	%		Org-029	107	1	116	120	3	102	100
Extracted ISTD d ₃ N MeFOSA	%		Org-029	93	1	108	115	6	93	91
Extracted ISTD d ₅ N EtFOSA	%		Org-029	92	1	104	114	9	90	87
Extracted ISTD d ₇ N MeFOSE	%		Org-029	97	1	114	121	6	93	91

QUALITY CONTROL: PFAS in Waters Extended					Duplicate			Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W2	348827-2
<i>Extracted ISTD d₉ N EtFOSE</i>	%		Org-029	93	1	105	110	5	91	90
<i>Extracted ISTD d₃ N MeFOSAA</i>	%		Org-029	114	1	126	125	1	109	104
<i>Extracted ISTD d₅ N EtFOSAA</i>	%		Org-029	116	1	131	130	1	105	110

QUALITY CONTROL: PFAS in Soils Extended						Duplicate		Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	[NT]
Date prepared	-			16/04/2024	[NT]	[NT]	[NT]	[NT]	16/04/2024	[NT]
Date analysed	-			16/04/2024	[NT]	[NT]	[NT]	[NT]	16/04/2024	[NT]
Perfluorobutanesulfonic acid	µg/kg	0.1	Org-029	<0.1	[NT]	[NT]	[NT]	[NT]	106	[NT]
Perfluoropentanesulfonic acid	µg/kg	0.1	Org-029	<0.1	[NT]	[NT]	[NT]	[NT]	105	[NT]
Perfluorohexanesulfonic acid - PFHxS	µg/kg	0.1	Org-029	<0.1	[NT]	[NT]	[NT]	[NT]	103	[NT]
Perfluoroheptanesulfonic acid	µg/kg	0.1	Org-029	<0.1	[NT]	[NT]	[NT]	[NT]	106	[NT]
Perfluorooctanesulfonic acid PFOS	µg/kg	0.1	Org-029	<0.1	[NT]	[NT]	[NT]	[NT]	106	[NT]
Perfluorodecanesulfonic acid	µg/kg	0.2	Org-029	<0.2	[NT]	[NT]	[NT]	[NT]	88	[NT]
Perfluorobutanoic acid	µg/kg	0.2	Org-029	<0.2	[NT]	[NT]	[NT]	[NT]	103	[NT]
Perfluoropentanoic acid	µg/kg	0.2	Org-029	<0.2	[NT]	[NT]	[NT]	[NT]	100	[NT]
Perfluorohexanoic acid	µg/kg	0.1	Org-029	<0.1	[NT]	[NT]	[NT]	[NT]	101	[NT]
Perfluoroheptanoic acid	µg/kg	0.1	Org-029	<0.1	[NT]	[NT]	[NT]	[NT]	102	[NT]
Perfluorooctanoic acid PFOA	µg/kg	0.1	Org-029	<0.1	[NT]	[NT]	[NT]	[NT]	95	[NT]
Perfluorononanoic acid	µg/kg	0.1	Org-029	<0.1	[NT]	[NT]	[NT]	[NT]	99	[NT]
Perfluorodecanoic acid	µg/kg	0.5	Org-029	<0.5	[NT]	[NT]	[NT]	[NT]	92	[NT]
Perfluoroundecanoic acid	µg/kg	0.5	Org-029	<0.5	[NT]	[NT]	[NT]	[NT]	98	[NT]
Perfluorododecanoic acid	µg/kg	0.5	Org-029	<0.5	[NT]	[NT]	[NT]	[NT]	102	[NT]
Perfluorotridecanoic acid	µg/kg	0.5	Org-029	<0.5	[NT]	[NT]	[NT]	[NT]	101	[NT]
Perfluorotetradecanoic acid	µg/kg	5	Org-029	<5	[NT]	[NT]	[NT]	[NT]	108	[NT]
4:2 FTS	µg/kg	0.1	Org-029	<0.1	[NT]	[NT]	[NT]	[NT]	109	[NT]
6:2 FTS	µg/kg	0.1	Org-029	<0.1	[NT]	[NT]	[NT]	[NT]	97	[NT]
8:2 FTS	µg/kg	0.2	Org-029	<0.2	[NT]	[NT]	[NT]	[NT]	96	[NT]
10:2 FTS	µg/kg	0.2	Org-029	<0.2	[NT]	[NT]	[NT]	[NT]	100	[NT]
Perfluorooctane sulfonamide	µg/kg	1	Org-029	<1	[NT]	[NT]	[NT]	[NT]	100	[NT]
N-Methyl perfluorooctane sulfonamide	µg/kg	1	Org-029	<1	[NT]	[NT]	[NT]	[NT]	103	[NT]
N-Ethyl perfluorooctanesulfonamide	µg/kg	1	Org-029	<1	[NT]	[NT]	[NT]	[NT]	100	[NT]
N-Me perfluorooctanesulfonamidethanol	µg/kg	1	Org-029	<1	[NT]	[NT]	[NT]	[NT]	99	[NT]
N-Et perfluorooctanesulfonamidethanol	µg/kg	5	Org-029	<5	[NT]	[NT]	[NT]	[NT]	105	[NT]
MePerfluorooctanesulfonamidacetic acid	µg/kg	0.2	Org-029	<0.2	[NT]	[NT]	[NT]	[NT]	102	[NT]
EtPerfluorooctanesulfonamidacetic acid	µg/kg	0.2	Org-029	<0.2	[NT]	[NT]	[NT]	[NT]	96	[NT]
Surrogate ¹³ C ₈ PFOS	%		Org-029	101	[NT]	[NT]	[NT]	[NT]	104	[NT]
Surrogate ¹³ C ₂ PFOA	%		Org-029	99	[NT]	[NT]	[NT]	[NT]	98	[NT]

QUALITY CONTROL: PFAS in Soils Extended					Duplicate			Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	[NT]
Extracted ISTD ¹³ C ₃ PFBS	%		Org-029	102	[NT]	[NT]	[NT]	[NT]	98	[NT]
Extracted ISTD ¹⁸ O ₂ PFHxS	%		Org-029	101	[NT]	[NT]	[NT]	[NT]	100	[NT]
Extracted ISTD ¹³ C ₄ PFOS	%		Org-029	100	[NT]	[NT]	[NT]	[NT]	97	[NT]
Extracted ISTD ¹³ C ₄ PFBA	%		Org-029	106	[NT]	[NT]	[NT]	[NT]	102	[NT]
Extracted ISTD ¹³ C ₃ PFPeA	%		Org-029	109	[NT]	[NT]	[NT]	[NT]	104	[NT]
Extracted ISTD ¹³ C ₂ PFHxA	%		Org-029	107	[NT]	[NT]	[NT]	[NT]	104	[NT]
Extracted ISTD ¹³ C ₄ PFHpA	%		Org-029	111	[NT]	[NT]	[NT]	[NT]	106	[NT]
Extracted ISTD ¹³ C ₄ PFOA	%		Org-029	109	[NT]	[NT]	[NT]	[NT]	107	[NT]
Extracted ISTD ¹³ C ₅ PFNA	%		Org-029	110	[NT]	[NT]	[NT]	[NT]	107	[NT]
Extracted ISTD ¹³ C ₂ PFDA	%		Org-029	112	[NT]	[NT]	[NT]	[NT]	111	[NT]
Extracted ISTD ¹³ C ₂ PFUnDA	%		Org-029	116	[NT]	[NT]	[NT]	[NT]	116	[NT]
Extracted ISTD ¹³ C ₂ PFDoDA	%		Org-029	122	[NT]	[NT]	[NT]	[NT]	113	[NT]
Extracted ISTD ¹³ C ₂ PFTeDA	%		Org-029	131	[NT]	[NT]	[NT]	[NT]	123	[NT]
Extracted ISTD ¹³ C ₂ 4:2FTS	%		Org-029	109	[NT]	[NT]	[NT]	[NT]	96	[NT]
Extracted ISTD ¹³ C ₂ 6:2FTS	%		Org-029	113	[NT]	[NT]	[NT]	[NT]	105	[NT]
Extracted ISTD ¹³ C ₂ 8:2FTS	%		Org-029	133	[NT]	[NT]	[NT]	[NT]	124	[NT]
Extracted ISTD ¹³ C ₈ FOSA	%		Org-029	109	[NT]	[NT]	[NT]	[NT]	107	[NT]
Extracted ISTD d ₃ N MeFOSA	%		Org-029	104	[NT]	[NT]	[NT]	[NT]	102	[NT]
Extracted ISTD d ₅ N EtFOSA	%		Org-029	102	[NT]	[NT]	[NT]	[NT]	100	[NT]
Extracted ISTD d ₇ N MeFOSE	%		Org-029	101	[NT]	[NT]	[NT]	[NT]	100	[NT]

QUALITY CONTROL: PFAS in Soils Extended						Duplicate		Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	[NT]
Extracted ISTD d ₉ N EtFOSE	%		Org-029	103	[NT]	[NT]	[NT]	[NT]	100	[NT]
Extracted ISTD d ₃ N MeFOSAA	%		Org-029	115	[NT]	[NT]	[NT]	[NT]	107	[NT]
Extracted ISTD d ₅ N EtFOSAA	%		Org-029	118	[NT]	[NT]	[NT]	[NT]	116	[NT]

Result Definitions

NT	Not tested
NA	Test not required
INS	Insufficient sample for this test
PQL	Practical Quantitation Limit
<	Less than
>	Greater than
RPD	Relative Percent Difference
LCS	Laboratory Control Sample
NS	Not specified
NEPM	National Environmental Protection Measure
NR	Not Reported

Quality Control Definitions

Blank	This is the component of the analytical signal which is not derived from the sample but from reagents, glassware etc, can be determined by processing solvents and reagents in exactly the same manner as for samples.
Duplicate	This is the complete duplicate analysis of a sample from the process batch. If possible, the sample selected should be one where the analyte concentration is easily measurable.
Matrix Spike	A portion of the sample is spiked with a known concentration of target analyte. The purpose of the matrix spike is to monitor the performance of the analytical method used and to determine whether matrix interferences exist.
LCS (Laboratory Control Sample)	This comprises either a standard reference material or a control matrix (such as a blank sand or water) fortified with analytes representative of the analyte class. It is simply a check sample.
Surrogate Spike	Surrogates are known additions to each sample, blank, matrix spike and LCS in a batch, of compounds which are similar to the analyte of interest, however are not expected to be found in real samples.
Australian Drinking Water Guidelines recommend that Thermotolerant Coliform, Faecal Enterococci, & E.Coli levels are less than 1cfu/100mL. The recommended maximums are taken from "Australian Drinking Water Guidelines", published by NHMRC & ARMC 2011.	
The recommended maximums for analytes in urine are taken from "2018 TLVs and BEIs", as published by ACGIH (where available). Limit provided for Nickel is a precautionary guideline as per Position Paper prepared by AIOH Exposure Standards Committee, 2016.	
Guideline limits for Rinse Water Quality reported as per analytical requirements and specifications of AS 4187, Amdt 2 2019, Table 7.2	

Laboratory Acceptance Criteria

Duplicate sample and matrix spike recoveries may not be reported on smaller jobs, however, were analysed at a frequency to meet or exceed NEPM requirements. All samples are tested in batches of 20. The duplicate sample RPD and matrix spike recoveries for the batch were within the laboratory acceptance criteria.

Filters, swabs, wipes, tubes and badges will not have duplicate data as the whole sample is generally extracted during sample extraction.

Spikes for Physical and Aggregate Tests are not applicable.

For VOCs in water samples, three vials are required for duplicate or spike analysis.

Duplicates: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% – see ELN-P05 QA/QC tables for details; <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals (not SPOCAS); 60-140% for organics/SPOCAS (+/-50% surrogates) and 10-140% for labile SVOCs (including labile surrogates), ultra trace organics and speciated phenols is acceptable.

In circumstances where no duplicate and/or sample spike has been reported at 1 in 10 and/or 1 in 20 samples respectively, the sample volume submitted was insufficient in order to satisfy laboratory QA/QC protocols.

When samples are received where certain analytes are outside of recommended technical holding times (THTs), the analysis has proceeded. Where analytes are on the verge of breaching THTs, every effort will be made to analyse within the THT or as soon as practicable.

Where sampling dates are not provided, Envirolab are not in a position to comment on the validity of the analysis where recommended technical holding times may have been breached.

Where matrix spike recoveries fall below the lower limit of the acceptance criteria (e.g. for non-labile or standard Organics <60%), positive result(s) in the parent sample will subsequently have a higher than typical estimated uncertainty (MU estimates supplied on request) and in these circumstances the sample result is likely biased significantly low.

Measurement Uncertainty estimates are available for most tests upon request.

Analysis of aqueous samples typically involves the extraction/digestion and/or analysis of the liquid phase only (i.e. NOT any settled sediment phase but inclusive of suspended particles if present), unless stipulated on the Envirolab COC and/or by correspondence. Notable exceptions include certain Physical Tests (pH/EC/BOD/COD/Apparent Colour etc.), Solids testing, total recoverable metals and PFAS where solids are included by default.

Samples for Microbiological analysis (not Amoeba forms) received outside of the 2-8°C temperature range do not meet the ideal cooling conditions as stated in AS2031-2012.

Report Comments

For PFAS Extracted Internal Standards denoted with # or outside the 50-150% acceptance range, the respective target analyte results may be unaffected, in other circumstances the PQL has been raised to accommodate the outlier(s).

SAMPLE RECEIPT ADVICE

Client Details

Client	AECOM Australia Pty Ltd (Sydney)
Attention	[REDACTED]

Sample Login Details

Your reference	ACT_0020_PFASOMP_24
Envirolab Reference	348827
Date Sample Received	15/04/2024
Date Instructions Received	15/04/2024
Date Results Expected to be Reported	22/04/2024

Sample Condition

Samples received in appropriate condition for analysis	Yes
No. of Samples Provided	3 Groundwater, 2 Sediment
Turnaround Time Requested	Standard
Temperature on Receipt (°C)	3
Cooling Method	Ice
Sampling Date Provided	YES

Comments

Nil

Please direct any queries to:

[REDACTED]	[REDACTED]
[REDACTED]	[REDACTED]
[REDACTED]	[REDACTED]

Analysis Underway, details on the following page:

Sample ID	AECOM checks	AECOM checks	AECOM checks	PFAS in Waters Extended	PFAS in Soils Extended
0020_QC200_240408	✓	✓	✓	✓	
0020_QC201_240408	✓	✓	✓	✓	
0020_QC202_240408	✓	✓	✓		✓
0020_QC203_240408	✓	✓	✓		✓
0020_QC204_240408	✓	✓	✓	✓	

The '✓' indicates the testing you have requested. **THIS IS NOT A REPORT OF THE RESULTS.**

Additional Info

Sample storage - Waters are routinely disposed of approximately 1 month and soils approximately 2 months from receipt.

Requests for longer term sample storage must be received in writing.

Please contact the laboratory immediately if observed settled sediment present in water samples is to be included in the extraction and/or analysis (exceptions include certain Physical Tests (pH/EC/BOD/COD/Apparent Colour etc.), Solids testing, Total Recoverable metals and PFAS analysis where solids are included by default.

TAT for Micro is dependent on incubation. This varies from 3 to 6 days.

CHAIN OF CUSTODY FORM - Client

ENVIROLAB GROUP

National phone number 1300 424 344

Sydney Lab - Envirolab Services
12 Ashley St, Chatswood, NSW 2067
☎ 02 9910 6200 | ✉ sydney@envirolab.com.au

Perth Lab - MPL Laboratories
16-18 Hayden Crt, Myaree, WA 6154
☎ 08 9317 2505 | ✉ lab@mpl.com.au

Melbourne Lab - Envirolab Services
25 Research Drive, Croydon South, VIC 3136
☎ 03 9763 2500 | ✉ melbourne@envirolab.com.au

Adelaide Office - Envirolab Services
7a The Parade, Norwood, SA 5067
☎ 08 7087 6800 | ✉ adelaide@envirolab.com.au

Brisbane Office - Envirolab Services
20a, 10-20 Depot St, Banyo, QLD 4014
☎ 07 3266 9532 | ✉ brisbane@envirolab.com.au

Darwin Office - Envirolab Services
Unit 20/119 Reichardt Road, Winnellie, NT 0820
☎ 08 8957 1201 | ✉ darwin@envirolab.com.au

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Company:	AECOM		Client Project Name/Number/Site etc (ie report title):	ACT_0020_PFSOMP_24	
Contact Person:	[REDACTED]		PO No. (if applicable):	60612562_4.1	
Project Mgr:	[REDACTED]		Envirolab Quote No.:		
Sampler:	[REDACTED]		Date results required:	☒ Standard ☐ Same Day ☐ 1 day ☐ 2 day ☐ 3 day	
Address:	Level 21, 420 George St, Sydney, NSW, 2000		Or choose:	☐ Standard ☐ Same Day ☐ 1 day ☐ 2 day ☐ 3 day	
Phone:	[REDACTED]	Mob:	[REDACTED]		
Email Results to:	[REDACTED]		Note: Inform lab in advance if urgent turnaround is required - surcharges apply		
Email Invoice to:	[REDACTED]		Additional report format:	☒ Esdat ☐ Equis	
			Lab Comments:		

Sample Information					Tests Required															Comments
Envirolab Sample ID (Lab use only)	Client Sample ID or Information	Depth	Date Sampled	Type of Sample	PFAS Extended Suite - Routine Level															Provide as much information about the sample as you can
1	0020_QC200_240408		8/04/2024	Groundwater	X															
2	0020_QC201_240408		8/04/2024	Groundwater	X															
3	0020_QC202_240408		8/04/2024	Sediment	X															
4	0020_QC203_240408		8/04/2024	Sediment	X															
5	0020_QC204_240408		8/04/2024	Surfacewater	X															



Please tick the box if observed settled sediment present in water samples is to be included in the extraction and/or analysis

Relinquished by (Company): AECOM	Received by (Company): ECS SLD	Lab Use Only	
Print Name: [REDACTED]	Print Name: [REDACTED]	Job number: 348827	Cooling: Ice / Ice pack / None
Date & Time: 12/04/2024	Date & Time: 15/4/24 1130	Temperature: 3°C	Security seal: Intact / Broken / None
Signature: [Signature]	Signature: [Signature]	TAT Req - SAME day / 1 / 2 / 3 / 4 / STD	

Please send ESdat files to DERP.labreports@esdat.com.au and ensure that the files use the PROJECT NAME

Login: LIMS PROCEDURE "AECOM LOGIN"	Incorporated into EnviroLIMS	YES/No/Not Applicable (N/A)	Signed/Date
* Temp (to 0.5 deg) of each esky recorded on COC (eg write esky 1 = 6.5 deg, esky 2 = 8.5 deg).	AECOM_L_1	Yes	15/4
* Temp - on the SRA note the average of all esky temperatures	AECOM_L_1	Yes	15/4
* Arrival time - for samples received after 4pm the TAT starts the next day	AECOM_L_2	Yes	15/4
* Sample integrity - call AECOM + list on SRA if samples: damaged, wrong preservation, headspace, less than half holding time left, insufficient sample for analysis any other integrity issue	AECOM_L_3	N/A	15/4
* Cold storage <2hrs from receipt (ie: book them in quickly)	AECOM_L_4	Yes	15/4
* Check samples for headspace if for VOCs/SVOCs, let AECOM know if this is the case and record this	AECOM_L_5	N/A	15/4
* Separate bags were not provided for Asbestos	AECOM_L_6	N/A	15/4
* Samples of oil or fuel - must be stored in a separate fridge away from other samples	AECOM_L_7	N/A	15/4
* If subcontracting - AECOM jobs must be on their own COC & include all the AECOM info (as we will attach the subcon report)	AECOM_L_8	N/A	15/4
* If subcontracting - record temp on departure on the subcon COC & use a lot of ice bricks, temperature on arrival at the sub-con lab required	AECOM_L_9	N/A	15/4
* If subcontracting volatiles - include a Trip Blank BTEX to the esky & add to the COC	AECOM_L_10	N/A	15/4
* If metals bottles are not ticked as filtered - call the client and ask. Record this.	AECOM_L_11	N/A	15/4
Customer Service: LIMS PROCEDURE "AECOM CUST-SERV"	Incorporated into EnviroLIMS	YES/No/Not Applicable (N/A)	Signed/Date
* All correspondence in writing. cc AECOM Project Manager to everything. Save all emails in LIMS.	AECOM_CS_1		
* If we do a non routine test/matrix - inform AECOM of this + explain non NATA, non validated etc	AECOM_CS_2		
* Subcontracted - email to AECOM Project Manager informing them (pre-approved list)	DS to do this separately		
* Subcontracted - if you use a lab other than ALS/Eurofins/SGS/NMI - inform AECOM that normal QC procedures may not apply (needs to go on pre-approved list)	DS to do this separately		
* Complaints - respond in 24hrs and cc Project Manager and Yvonne	AECOM_CS_3		
* Complaints - CAR must be raised for wrong results, holding time breaches, non compliance with this agreement	AECOM_CS_4		
* SRA - Anything supposed to go here??	AECOM_CS_5		
* Holding time - if received after 12pm on last day of holding time or if day 1 tests are received too late - that's OK, just inform them	AECOM_CS_6		
* TAT- if received after 4pm TAT starts next day. TAT starts on receipt of correct COC	AECOM_CS_7		

#348827
CH
15/4/24