

1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17

ANALYTICAL REPORT

PREPARED FOR

Attn: Mr. Erwin Kawata
City & County of Honolulu
630 South Beretania Street
Public Service Bldg. Room 310
Honolulu, Hawaii 96843

Generated 10/21/2025 5:04:24 PM

JOB DESCRIPTION

RED-HILL
PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells P1/P2, Aiea Wells Pumps 1&2

JOB NUMBER

380-177071-1

Eurofins Eaton Analytical Pomona

Job Notes

This report may not be reproduced except in full, and with written approval from the laboratory. The results relate only to the samples tested. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

The test results in this report relate only to the samples as received by the laboratory and meet all requirements of the methodology, with any exceptions noted. This report shall not be reproduced except in full, without the express written approval of the laboratory. All questions should be directed to the Eurofins Eaton Analytical, LLC Project Manager.

Compliance Statement

1. Laboratory is accredited in accordance with TNI 2016 Standards and ISO/IEC 17025:2017.
2. Laboratory certifies that the test results meet all TNI 2016 and ISO/IEC 17025:2017 requirements unless noted under the individual analysis
3. Test results relate only to the sample(s) tested.
4. This report shall not be reproduced except in full, without the written approval of the laboratory.
5. Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below. (DW, Water matrices)

Authorization



Authorized for release by
Maria Lopez, Project Manager
Maria.Lopez@et.eurofinsus.com
(626)386-1100

Generated
10/21/2025 5:04:24 PM

Table of Contents

Cover Page	1
Table of Contents	3
Definitions/Glossary	4
Case Narrative	5
Detection Summary	6
Client Sample Results	7
Action Limit Summary	26
Surrogate Summary	31
Isotope Dilution Summary	32
QC Sample Results	34
QC Association Summary	45
Lab Chronicle	47
Certification Summary	50
Method Summary	51
Sample Summary	52
Chain of Custody	53
Receipt Checklists	54



Definitions/Glossary

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Qualifiers

LCMS

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

Glossary

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

Case Narrative

Client: City & County of Honolulu
Project: RED-HILL

Job ID: 380-177071-1

Job ID: 380-177071-1

Eurofins Eaton Analytical Pomona

Job Narrative 380-177071-1

The analytical test results presented in this report meet all requirements of the associated regulatory program listed on the Accreditation/Certification Summary Page, unless otherwise noted. Data qualifiers and/or narrative comments are included to explain any exceptions, if applicable. Regulated compliance samples (e.g. SDWA, NPDES) must comply with associated agency requirements/permits.

- Matrix-specific batch QC (e.g., MS, MSD, SD) may not be reported when insufficient sample volume is available or when site-specific QC samples are not submitted. In such cases, a Laboratory Control Sample Duplicate (LCSD) may be analyzed to provide precision data for the batch.
- For samples analyzed using surrogate and/or isotope dilution analytes, any recoveries falling outside of established acceptance criteria are re-prepared and/or re-analyzed to confirm results, unless the deviation is due to sample dilution or otherwise explained in the case narrative.

Receipt

The samples were received on 10/15/2025 10:27 AM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 5.9°C.

PFAS

Method 537.1_DW_PREC: The following QC issues in 380-180534 OR 380-180688 were observed: Surrogate d5-NEtFOSAA, 13C2 PFHxA, 13C2 PFDA and 13C3-GenX recovery for field blank FB: AIEA GULCH WELLS PUMP 1 (331-201-TP071) (380-177071-6) failed to meet method limits (high bias), possibly double spiked. Insufficient volume for re-extraction / re-analysis for sample. All target analytes less than 1/3 MRL. 537.1 Data excluded due to this QC failure for FB: AIEA GULCH WELLS PUMP 1 (331-201-TP071) (380-177071-6). Analysis of the Field Blank is required only if a field sample contains a method analyte or analytes at, or above, the MRL. Sample results showed ND thus valid for reporting. (XWB4)

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

Detection Summary

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: MOANALUA WELLS (331-223-TP202)

Lab Sample ID: 380-177071-1

No Detections.

Client Sample ID: FB: MOANALUA WELLS (331-223-TP202)

Lab Sample ID: 380-177071-2

No Detections.

**Client Sample ID: HALAWA WELLS UNITS 1 & 2 P1
(331-206-TP065)**

Lab Sample ID: 380-177071-3

Analyte	Result	Qualifier	RL	Unit	Dil Fac	D	Method	Prep Type
Perfluorohexanesulfonic acid (PFHxS)	2.6		2.0	ng/L	1		533	Total/NA
Perfluorooctanesulfonic acid (PFOS)	2.3		2.0	ng/L	1		533	Total/NA
Perfluoropentanoic acid (PFPeA)	2.2		2.0	ng/L	1		533	Total/NA
Perfluorooctanesulfonic acid (PFOS)	2.5		2.0	ng/L	1		537.1	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	2.7		2.0	ng/L	1		537.1	Total/NA

**Client Sample ID: FB: HALAWA WELLS UNITS 1 & 2
(331-206-TP065)**

Lab Sample ID: 380-177071-4

No Detections.

**Client Sample ID: AIEA GULCH WELLS PUMP 1
(331-201-TP071)**

Lab Sample ID: 380-177071-5

No Detections.

**Client Sample ID: FB: AIEA GULCH WELLS PUMP 1
(331-201-TP071)**

Lab Sample ID: 380-177071-6

No Detections.

**Client Sample ID: AIEA GULCH WELLS PUMP 2
(331-202-TP072)**

Lab Sample ID: 380-177071-7

No Detections.

**Client Sample ID: FB: AIEA GULCH WELLS PUMP 2
(331-202-TP072)**

Lab Sample ID: 380-177071-8

No Detections.

**Client Sample ID: AIEA WELLS PUMPS 1&2 P2 (260)
(331-203-TP400)**

Lab Sample ID: 380-177071-9

No Detections.

**Client Sample ID: FB: AIEA WELLS PUMPS 1&2 (260)
(331-203-TP400)**

Lab Sample ID: 380-177071-10

No Detections.

This Detection Summary does not include radiochemical test results.

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: MOANALUA WELLS (331-223-TP202)

Lab Sample ID: 380-177071-1

Date Collected: 10/13/25 10:03

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
11-Chloroeicosafluoro-3-oxaundecan e-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
9-Chlorohexadecafluoro-3-oxanonan e-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluorobutanoic acid (PFBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluoropentanoic acid (PFPeA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1
Perfluoropentanesulfonic acid (PFPeS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:38	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C3 HFPO-DA	84		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C6 PFDA	93		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C5 PFHxA	93		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C4 PFHpA	91		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C8 PFOA	92		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C9 PFNA	96		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C7 PFUnA	92		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C2 PFDoA	100		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C4 PFBA	97		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C5 PFPeA	92		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C3 PFBS	108		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C3 PFHxS	111		50 - 200	10/17/25 16:13	10/19/25 16:38	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: MOANALUA WELLS (331-223-TP202)

Lab Sample ID: 380-177071-1

Date Collected: 10/13/25 10:03

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C8 PFOS	112		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C2-4:2-FTS	110		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C2-6:2-FTS	107		50 - 200	10/17/25 16:13	10/19/25 16:38	1
13C2-8:2-FTS	108		50 - 200	10/17/25 16:13	10/19/25 16:38	1

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluorotetradecanoic acid (PFTA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
Perfluorotridecanoic acid (PFTrDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
11-Chloroeicosafuoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 19:59	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
d5-NEtFOSAA	106		70 - 130	10/17/25 10:56	10/18/25 19:59	1
13C2 PFHxA	108		70 - 130	10/17/25 10:56	10/18/25 19:59	1
13C2 PFDA	111		70 - 130	10/17/25 10:56	10/18/25 19:59	1
13C3-GenX	103		70 - 130	10/17/25 10:56	10/18/25 19:59	1

Client Sample ID: FB: MOANALUA WELLS (331-223-TP202)

Lab Sample ID: 380-177071-2

Date Collected: 10/13/25 10:03

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
11-Chloroeicosafuoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: FB: MOANALUA WELLS (331-223-TP202)

Lab Sample ID: 380-177071-2

Date Collected: 10/13/25 10:03

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluorobutanoic acid (PFBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEESA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluoropentanoic acid (PFPeA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1
Perfluoropentanesulfonic acid (PFPeS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 17:55	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C3 HFPO-DA	103		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C6 PFDA	103		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C5 PFHxA	110		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C4 PFHpA	110		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C8 PFOA	111		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C9 PFNA	111		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C7 PFUnA	110		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C2 PFDoA	118		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C4 PFBA	113		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C5 PFPeA	114		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C3 PFBS	112		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C3 PFHxS	118		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C8 PFOS	114		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C2-4:2-FTS	121		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C2-6:2-FTS	112		50 - 200	10/17/25 16:13	10/19/25 17:55	1
13C2-8:2-FTS	111		50 - 200	10/17/25 16:13	10/19/25 17:55	1

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: FB: MOANALUA WELLS (331-223-TP202)

Lab Sample ID: 380-177071-2

Date Collected: 10/13/25 10:03

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluorotetradecanoic acid (PFTA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Perfluorotridecanoic acid (PFTrDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:20	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
d5-NEtFOSAA	112		70 - 130			10/17/25 10:56	10/18/25 20:20	1
13C2 PFHxA	113		70 - 130			10/17/25 10:56	10/18/25 20:20	1
13C2 PFDA	115		70 - 130			10/17/25 10:56	10/18/25 20:20	1
13C3-GenX	105		70 - 130			10/17/25 10:56	10/18/25 20:20	1

Client Sample ID: HALAWA WELLS UNITS 1 & 2 P1 (331-206-TP065)

Lab Sample ID: 380-177071-3

Date Collected: 10/13/25 10:28

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluorohexanesulfonic acid (PFHxS)	2.6		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: HALAWA WELLS UNITS 1 & 2 P1
(331-206-TP065)**

Lab Sample ID: 380-177071-3

Date Collected: 10/13/25 10:28

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluorooctanesulfonic acid (PFOS)	2.3		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluorobutanoic acid (PFBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluoropentanoic acid (PFPeA)	2.2		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1
Perfluoropentanesulfonic acid (PFPeS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:04	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C3 HFPO-DA	79		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C6 PFDA	76		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C5 PFHxA	80		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C4 PFHpA	85		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C8 PFOA	82		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C9 PFNA	82		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C7 PFUnA	76		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C2 PFDoA	82		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C4 PFBA	96		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C5 PFPeA	89		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C3 PFBS	105		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C3 PFHxS	106		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C8 PFOS	107		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C2-4:2-FTS	110		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C2-6:2-FTS	104		50 - 200	10/17/25 16:13	10/19/25 18:04	1
13C2-8:2-FTS	99		50 - 200	10/17/25 16:13	10/19/25 18:04	1

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Perfluorooctanesulfonic acid (PFOS)	2.5		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: HALAWA WELLS UNITS 1 & 2 P1
(331-206-TP065)**

Lab Sample ID: 380-177071-3

Date Collected: 10/13/25 10:28

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS) (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Perfluorohexanesulfonic acid (PFHxS)	2.7		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Perfluorotetradecanoic acid (PFTA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Perfluorotridecanoic acid (PFTTrDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
11-Chloroeicosafuoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:31	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
d5-NEtFOSAA	110		70 - 130			10/17/25 10:56	10/18/25 20:31	1
13C2 PFHxA	110		70 - 130			10/17/25 10:56	10/18/25 20:31	1
13C2 PFDA	110		70 - 130			10/17/25 10:56	10/18/25 20:31	1
13C3-GenX	105		70 - 130			10/17/25 10:56	10/18/25 20:31	1

**Client Sample ID: FB: HALAWA WELLS UNITS 1 & 2
(331-206-TP065)**

Lab Sample ID: 380-177071-4

Date Collected: 10/13/25 10:28

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
11-Chloroeicosafuoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: FB: HALAWA WELLS UNITS 1 & 2
(331-206-TP065)**

Lab Sample ID: 380-177071-4

Date Collected: 10/13/25 10:28

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluoroundecanoic acid (PFUnA)	2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluorobutanoic acid (PFBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluoropentanoic acid (PFPeA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1
Perfluoropentanesulfonic acid (PFPeS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:14	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C3 HFPO-DA	94		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C6 PFDA	111		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C5 PFHxA	110		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C4 PFHpA	109		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C8 PFOA	110		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C9 PFNA	107		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C7 PFUnA	105		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C2 PFDoA	109		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C4 PFBA	105		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C5 PFPeA	104		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C3 PFBS	103		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C3 PFHxS	111		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C8 PFOS	111		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C2-4:2-FTS	109		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C2-6:2-FTS	103		50 - 200	10/17/25 16:13	10/19/25 18:14	1
13C2-8:2-FTS	103		50 - 200	10/17/25 16:13	10/19/25 18:14	1

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
N-methylperfluorooctanesulfonamideacetic acid (NMeFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: FB: HALAWA WELLS UNITS 1 & 2
(331-206-TP065)**

Lab Sample ID: 380-177071-4

Date Collected: 10/13/25 10:28

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS) (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluorotetradecanoic acid (PFTA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Perfluorotridecanoic acid (PFTrDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:41	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
d5-NEtFOSAA	105		70 - 130			10/17/25 10:56	10/18/25 20:41	1
13C2 PFHxA	111		70 - 130			10/17/25 10:56	10/18/25 20:41	1
13C2 PFDA	112		70 - 130			10/17/25 10:56	10/18/25 20:41	1
13C3-GenX	106		70 - 130			10/17/25 10:56	10/18/25 20:41	1

**Client Sample ID: AIEA GULCH WELLS PUMP 1
(331-201-TP071)**

Lab Sample ID: 380-177071-5

Date Collected: 10/13/25 10:57

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: AIEA GULCH WELLS PUMP 1
(331-201-TP071)**

Lab Sample ID: 380-177071-5

Date Collected: 10/13/25 10:57

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluoropentanoic acid (PFPeA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1
Perfluoropentanesulfonic acid (PFPeS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:23	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C3 HFPO-DA	77		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C6 PFDA	89		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C5 PFHxA	83		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C4 PFHpA	87		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C8 PFOA	87		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C9 PFNA	92		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C7 PFUnA	94		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C2 PFDoA	95		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C4 PFBA	91		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C5 PFPeA	93		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C3 PFBS	110		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C3 PFHxS	113		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C8 PFOS	115		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C2-4:2-FTS	111		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C2-6:2-FTS	108		50 - 200	10/17/25 16:13	10/19/25 18:23	1
13C2-8:2-FTS	104		50 - 200	10/17/25 16:13	10/19/25 18:23	1

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: AIEA GULCH WELLS PUMP 1
(331-201-TP071)**

Lab Sample ID: 380-177071-5

Date Collected: 10/13/25 10:57

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS) (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Perfluorobutanesulfonic acid (PFBS)	2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Perfluorotetradecanoic acid (PFTA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Perfluorotridecanoic acid (PFTrDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
9-Chlorohexadecafluoro-3-oxanonan e-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
11-Chloroeicosafluoro-3-oxaundecan e-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 20:51	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
d5-NETfOSAA	107		70 - 130			10/17/25 10:56	10/18/25 20:51	1
13C2 PFHxA	109		70 - 130			10/17/25 10:56	10/18/25 20:51	1
13C2 PFDA	110		70 - 130			10/17/25 10:56	10/18/25 20:51	1
13C3-GenX	102		70 - 130			10/17/25 10:56	10/18/25 20:51	1

**Client Sample ID: FB: AIEA GULCH WELLS PUMP 1
(331-201-TP071)**

Lab Sample ID: 380-177071-6

Date Collected: 10/13/25 10:57

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
11-Chloroeicosafluoro-3-oxaundecan e-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
9-Chlorohexadecafluoro-3-oxanonan e-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluorobutanoic acid (PFBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: FB: AIEA GULCH WELLS PUMP 1
(331-201-TP071)**

Lab Sample ID: 380-177071-6

Date Collected: 10/13/25 10:57

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluoropentanoic acid (PFPeA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Perfluoropentanesulfonic acid (PFPeS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:42	1
Isotope Dilution	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
13C3 HFPO-DA	101		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C6 PFDA	108		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C5 PFHxA	103		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C4 PFHpA	107		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C8 PFOA	108		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C9 PFNA	109		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C7 PFUnA	103		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C2 PFDoA	104		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C4 PFBA	105		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C5 PFPeA	109		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C3 PFBS	109		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C3 PFHxS	116		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C8 PFOS	111		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C2-4:2-FTS	115		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C2-6:2-FTS	110		50 - 200			10/17/25 16:13	10/19/25 18:42	1
13C2-8:2-FTS	105		50 - 200			10/17/25 16:13	10/19/25 18:42	1

**Client Sample ID: AIEA GULCH WELLS PUMP 2
(331-202-TP072)**

Lab Sample ID: 380-177071-7

Date Collected: 10/13/25 11:16

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
11-Chloroeicosfluoro-3-oxaundecan e-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
9-Chlorohexadecafluoro-3-oxanonan e-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: AIEA GULCH WELLS PUMP 2
(331-202-TP072)**

Lab Sample ID: 380-177071-7

Date Collected: 10/13/25 11:16

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluoroheptanoic acid (PFHpA)	2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluorobutanoic acid (PFBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluoropentanoic acid (PFPeA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1
Perfluoropentanesulfonic acid (PFPeS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 18:52	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C3 HFPO-DA	62		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C6 PFDA	65		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C5 PFHxA	68		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C4 PFHpA	71		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C8 PFOA	71		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C9 PFNA	65		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C7 PFUnA	72		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C2 PFDoA	79		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C4 PFBA	79		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C5 PFPeA	73		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C3 PFBS	108		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C3 PFHxS	115		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C8 PFOS	110		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C2-4:2-FTS	119		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C2-6:2-FTS	108		50 - 200	10/17/25 16:13	10/19/25 18:52	1
13C2-8:2-FTS	110		50 - 200	10/17/25 16:13	10/19/25 18:52	1

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: AIEA GULCH WELLS PUMP 2
(331-202-TP072)**

Lab Sample ID: 380-177071-7

Date Collected: 10/13/25 11:16

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluorotetradecanoic acid (PFTA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Perfluorotridecanoic acid (PFTTrDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
11-Chloroeicosafuoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:10	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
d5-NEtFOSAA	106		70 - 130			10/17/25 10:56	10/18/25 21:10	1
13C2 PFHxA	111		70 - 130			10/17/25 10:56	10/18/25 21:10	1
13C2 PFDA	113		70 - 130			10/17/25 10:56	10/18/25 21:10	1
13C3-GenX	106		70 - 130			10/17/25 10:56	10/18/25 21:10	1

**Client Sample ID: FB: AIEA GULCH WELLS PUMP 2
(331-202-TP072)**

Lab Sample ID: 380-177071-8

Date Collected: 10/13/25 11:16

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
11-Chloroeicosafuoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: FB: AIEA GULCH WELLS PUMP 2
(331-202-TP072)**

Lab Sample ID: 380-177071-8

Date Collected: 10/13/25 11:16

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluorooctanesulfonic acid (PFOS)	2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluorobutanoic acid (PFBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluoropentanoic acid (PFPeA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1
Perfluoropentanesulfonic acid (PFPeS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:02	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C3 HFPO-DA	102		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C6 PFDA	104		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C5 PFHxA	106		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C4 PFHpA	106		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C8 PFOA	111		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C9 PFNA	111		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C7 PFUnA	106		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C2 PFDoA	107		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C4 PFBA	107		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C5 PFPeA	111		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C3 PFBS	112		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C3 PFHxS	113		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C8 PFOS	114		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C2-4:2-FTS	113		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C2-6:2-FTS	105		50 - 200	10/17/25 16:13	10/19/25 19:02	1
13C2-8:2-FTS	108		50 - 200	10/17/25 16:13	10/19/25 19:02	1

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: FB: AIEA GULCH WELLS PUMP 2
(331-202-TP072)**

Lab Sample ID: 380-177071-8

Date Collected: 10/13/25 11:16

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS) (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluorotetradecanoic acid (PFTA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Perfluorotridecanoic acid (PFTrDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:20	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
d5-NEtFOSAA	109		70 - 130			10/17/25 10:56	10/18/25 21:20	1
13C2 PFHxA	111		70 - 130			10/17/25 10:56	10/18/25 21:20	1
13C2 PFDA	110		70 - 130			10/17/25 10:56	10/18/25 21:20	1
13C3-GenX	104		70 - 130			10/17/25 10:56	10/18/25 21:20	1

**Client Sample ID: AIEA WELLS PUMPS 1&2 P2 (260)
(331-203-TP400)**

Lab Sample ID: 380-177071-9

Date Collected: 10/13/25 11:31

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: AIEA WELLS PUMPS 1&2 P2 (260)
(331-203-TP400)

Lab Sample ID: 380-177071-9

Date Collected: 10/13/25 11:31

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluorobutanoic acid (PFBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluoropentanoic acid (PFPeA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Perfluoropentanesulfonic acid (PFPeS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:11	1
Isotope Dilution	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
13C3 HFPO-DA	73		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C6 PFDA	83		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C5 PFHxA	79		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C4 PFHpA	80		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C8 PFOA	81		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C9 PFNA	83		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C7 PFUnA	86		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C2 PFDoA	90		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C4 PFBA	86		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C5 PFPeA	81		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C3 PFBS	114		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C3 PFHxS	115		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C8 PFOS	116		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C2-4:2-FTS	112		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C2-6:2-FTS	108		50 - 200			10/17/25 16:13	10/19/25 19:11	1
13C2-8:2-FTS	108		50 - 200			10/17/25 16:13	10/19/25 19:11	1

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: AIEA WELLS PUMPS 1&2 P2 (260)
(331-203-TP400)

Lab Sample ID: 380-177071-9

Date Collected: 10/13/25 11:31
Date Received: 10/15/25 10:27

Matrix: Drinking Water

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS) (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Perfluorodecanoic acid (PFDA)	2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Perfluorotetradecanoic acid (PFTA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Perfluorotridecanoic acid (PFTrDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
9-Chlorohexadecafluoro-3-oxanonan e-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
11-Chloroeicosafuoro-3-oxaundecan e-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:29	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
d5-NEtFOSAA	109		70 - 130			10/17/25 10:56	10/18/25 21:29	1
13C2 PFHxA	111		70 - 130			10/17/25 10:56	10/18/25 21:29	1
13C2 PFDA	112		70 - 130			10/17/25 10:56	10/18/25 21:29	1
13C3-GenX	104		70 - 130			10/17/25 10:56	10/18/25 21:29	1

Client Sample ID: FB: AIEA WELLS PUMPS 1&2 (260)
(331-203-TP400)

Lab Sample ID: 380-177071-10

Date Collected: 10/13/25 11:31
Date Received: 10/15/25 10:27

Matrix: Drinking Water

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
11-Chloroeicosafuoro-3-oxaundecan e-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
9-Chlorohexadecafluoro-3-oxanonan e-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluoroheptanoic acid (PFHpA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluorobutanoic acid (PFBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: FB: AIEA WELLS PUMPS 1&2 (260)
(331-203-TP400)

Lab Sample ID: 380-177071-10

Date Collected: 10/13/25 11:31

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluoropentanoic acid (PFPeA)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1
Perfluoropentanesulfonic acid (PFPeS)	<2.0		2.0	ng/L		10/17/25 16:13	10/19/25 19:21	1

Isotope Dilution	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C3 HFPO-DA	98		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C6 PFDA	106		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C5 PFHxA	108		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C4 PFHpA	105		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C8 PFOA	111		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C9 PFNA	108		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C7 PFUnA	104		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C2 PFDoA	110		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C4 PFBA	108		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C5 PFPeA	116		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C3 PFBS	106		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C3 PFHxS	117		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C8 PFOS	113		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C2-4:2-FTS	110		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C2-6:2-FTS	109		50 - 200	10/17/25 16:13	10/19/25 19:21	1
13C2-8:2-FTS	107		50 - 200	10/17/25 16:13	10/19/25 19:21	1

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Perfluorooctanesulfonic acid (PFOS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Perfluoroundecanoic acid (PFUnA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Perfluorohexanoic acid (PFHxA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Perfluorododecanoic acid (PFDoA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Perfluorooctanoic acid (PFOA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1

Eurofins Eaton Analytical Pomona

Client Sample Results

Client: City & County of Honolulu
 Project/Site: RED-HILL

Job ID: 380-177071-1
 SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
 P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: FB: AIEA WELLS PUMPS 1&2 (260)
 (331-203-TP400)**

Lab Sample ID: 380-177071-10

Date Collected: 10/13/25 11:31

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Method: EPA 537.1 - Perfluorinated Alkyl Acids (LC/MS) (Continued)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorodecanoic acid (PFDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Perfluorohexanesulfonic acid (PFHxS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Perfluorobutanesulfonic acid (PFBS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Perfluoroheptanoic acid (PFHpA)	2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Perfluorononanoic acid (PFNA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Perfluorotetradecanoic acid (PFTA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Perfluorotridecanoic acid (PFTrDA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
9-Chlorohexadecafluoro-3-oxanonan e-1-sulfonic acid(9Cl-PF3ONS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
11-Chloroeicosafluoro-3-oxaundecan e-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		2.0	ng/L		10/17/25 10:56	10/18/25 21:39	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
d5-NEtFOSAA	101		70 - 130			10/17/25 10:56	10/18/25 21:39	1
13C2 PFHxA	105		70 - 130			10/17/25 10:56	10/18/25 21:39	1
13C2 PFDA	111		70 - 130			10/17/25 10:56	10/18/25 21:39	1
13C3-GenX	96		70 - 130			10/17/25 10:56	10/18/25 21:39	1

Action Limit Summary

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: MOANALUA WELLS (331-223-TP202)

Lab Sample ID: 380-177071-1

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL	RL	Method	Prep Type
				Limit			
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	533	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	533	Total/NA
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	537.1	Total/NA

Client Sample ID: FB: MOANALUA WELLS (331-223-TP202)

Lab Sample ID: 380-177071-2

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL	RL	Method	Prep Type
				Limit			
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	533	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	533	Total/NA
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	537.1	Total/NA

Client Sample ID: HALAWA WELLS UNITS 1 & 2 P1 (331-206-TP065)

Lab Sample ID: 380-177071-3

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL	RL	Method	Prep Type
				Limit			
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	2.6		ng/L	10	2.0	533	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorooctanesulfonic acid (PFOS)	2.3		ng/L	4	2.0	533	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	533	Total/NA

Eurofins Eaton Analytical Pomona

Action Limit Summary

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: HALAWA WELLS UNITS 1 & 2 P1
(331-206-TP065) (Continued)**

Lab Sample ID: 380-177071-3

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL Limit	RL	Method	Prep Type
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorooctanesulfonic acid (PFOS)	2.5		ng/L	4	2.0	537.1	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	2.7		ng/L	10	2.0	537.1	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	537.1	Total/NA

**Client Sample ID: FB: HALAWA WELLS UNITS 1 & 2
(331-206-TP065)**

Lab Sample ID: 380-177071-4

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL Limit	RL	Method	Prep Type
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	533	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	533	Total/NA
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	537.1	Total/NA

**Client Sample ID: AIEA GULCH WELLS PUMP 1
(331-201-TP071)**

Lab Sample ID: 380-177071-5

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL Limit	RL	Method	Prep Type
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	533	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	533	Total/NA
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	537.1	Total/NA

Eurofins Eaton Analytical Pomona

Action Limit Summary

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: AIEA GULCH WELLS PUMP 1
(331-201-TP071) (Continued)**

Lab Sample ID: 380-177071-5

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL	RL	Method	Prep Type
				Limit			
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	537.1	Total/NA

**Client Sample ID: FB: AIEA GULCH WELLS PUMP 1
(331-201-TP071)**

Lab Sample ID: 380-177071-6

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL	RL	Method	Prep Type
				Limit			
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	533	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	533	Total/NA

**Client Sample ID: AIEA GULCH WELLS PUMP 2
(331-202-TP072)**

Lab Sample ID: 380-177071-7

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL	RL	Method	Prep Type
				Limit			
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	533	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	533	Total/NA
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	537.1	Total/NA

Action Limit Summary

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: FB: AIEA GULCH WELLS PUMP 2
(331-202-TP072)**

Lab Sample ID: 380-177071-8

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL	RL	Method	Prep Type
				Limit			
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	533	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	533	Total/NA
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	537.1	Total/NA

**Client Sample ID: AIEA WELLS PUMPS 1&2 P2 (260)
(331-203-TP400)**

Lab Sample ID: 380-177071-9

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL	RL	Method	Prep Type
				Limit			
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	533	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	533	Total/NA
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	537.1	Total/NA

**Client Sample ID: FB: AIEA WELLS PUMPS 1&2 (260)
(331-203-TP400)**

Lab Sample ID: 380-177071-10

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL	RL	Method	Prep Type
				Limit			
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	533	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	533	Total/NA

Eurofins Eaton Analytical Pomona

Action Limit Summary

Client: City & County of Honolulu
 Project/Site: RED-HILL

Job ID: 380-177071-1
 SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
 P1/P2, Aiea Wells Pumps 1&2

**Client Sample ID: FB: AIEA WELLS PUMPS 1&2 (260)
 (331-203-TP400) (Continued)**

Lab Sample ID: 380-177071-10

Compliance Check

The results obtained from the analytical testing of this data set were checked against compliance limits received from the client. Any results at or above the compliance limits have been highlighted for your convenience.

Analyte	Result	Qualifier	Unit	EPAMCL	RL	Method	Prep Type
				Limit			
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	533	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	533	Total/NA
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorooctanesulfonic acid (PFOS)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorooctanoic acid (PFOA)	<2.0		ng/L	4	2.0	537.1	Total/NA
Perfluorohexanesulfonic acid (PFHxS)	<2.0		ng/L	10	2.0	537.1	Total/NA
Perfluorononanoic acid (PFNA)	<2.0		ng/L	10	2.0	537.1	Total/NA

Surrogate Summary

Client: City & County of Honolulu
 Project/Site: RED-HILL

Job ID: 380-177071-1
 SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
 P1/P2, Aiea Wells Pumps 1&2

Method: 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Matrix: Drinking Water

Prep Type: Total/NA

Lab Sample ID	Client Sample ID	Percent Surrogate Recovery (Acceptance Limits)			
		d5NEFOS (70-130)	PFHxA (70-130)	PFDA (70-130)	GenX (70-130)
380-177071-1	MOANALUA WELLS (331-223-T	106	108	111	103
380-177071-2	FB: MOANALUA WELLS (331-223-TP202)	112	113	115	105
380-177071-3	HALAWA WELLS UNITS 1 & 2 P1 (331-206-TP065)	110	110	110	105
380-177071-4	FB: HALAWA WELLS UNITS 1 & 2 (331-206-TP065)	105	111	112	106
380-177071-5	AIEA GULCH WELLS PUMP 1 (331-201-TP071)	107	109	110	102
380-177071-7	AIEA GULCH WELLS PUMP 2 (331-202-TP072)	106	111	113	106
380-177071-8	FB: AIEA GULCH WELLS PUMF 2 (331-202-TP072)	109	111	110	104
380-177071-9	AIEA WELLS PUMPS 1&2 P2 (260) (331-203-TP400)	109	111	112	104
380-177071-10	FB: AIEA WELLS PUMPS 1&2 (260) (331-203-TP400)	101	105	111	96

Surrogate Legend

d5NEFOS = d5-NEtFOSAA
 PFHxA = 13C2 PFHxA
 PFDA = 13C2 PFDA
 GenX = 13C3-GenX

Method: 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Matrix: Water

Prep Type: Total/NA

Lab Sample ID	Client Sample ID	Percent Surrogate Recovery (Acceptance Limits)			
		d5NEFOS (70-130)	PFHxA (70-130)	PFDA (70-130)	GenX (70-130)
380-177016-J-1-A MS	Matrix Spike	106	110	109	104
380-177016-K-1-A MSD	Matrix Spike Duplicate	110	111	115	108
LCS 380-180534/24-A	Lab Control Sample	105	107	112	101
MBL 380-180534/22-A	Method Blank	114	110	115	108
MRL 380-180534/23-A	Lab Control Sample	112	115	119	112

Surrogate Legend

d5NEFOS = d5-NEtFOSAA
 PFHxA = 13C2 PFHxA
 PFDA = 13C2 PFDA
 GenX = 13C3-GenX

Isotope Dilution Summary

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method: 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Matrix: Drinking Water

Prep Type: Total/NA

Lab Sample ID	Client Sample ID	Percent Isotope Dilution Recovery (Acceptance Limits)							
		HFPODA (50-200)	C6PFDA (50-200)	13C5PHA (50-200)	C4PFHA (50-200)	C8PFOA (50-200)	C9PFNA (50-200)	13C7PUA (50-200)	PFDaA (50-200)
380-177071-1	MOANALUA WELLS (331-223-T	84	93	93	91	92	96	92	100
380-177071-1 MS	MOANALUA WELLS (331-223-TP202)	89	95	87	91	91	96	101	107
380-177071-1 MSD	MOANALUA WELLS (331-223-TP202)	70	59	69	66	62	60	65	72
380-177071-2	FB: MOANALUA WELLS (331-223-TP202)	103	103	110	110	111	111	110	118
380-177071-3	HALAWA WELLS UNITS 1 & 2 P1 (331-206-TP065)	79	76	80	85	82	82	76	82
380-177071-4	FB: HALAWA WELLS UNITS 1 & 2 (331-206-TP065)	94	111	110	109	110	107	105	109
380-177071-5	AIEA GULCH WELLS PUMP 1 (331-201-TP071)	77	89	83	87	87	92	94	95
380-177071-6	FB: AIEA GULCH WELLS PUMF 1 (331-201-TP071)	101	108	103	107	108	109	103	104
380-177071-7	AIEA GULCH WELLS PUMP 2 (331-202-TP072)	62	65	68	71	71	65	72	79
380-177071-8	FB: AIEA GULCH WELLS PUMF 2 (331-202-TP072)	102	104	106	106	111	111	106	107
380-177071-9	AIEA WELLS PUMPS 1&2 P2 (260) (331-203-TP400)	73	83	79	80	81	83	86	90
380-177071-10	FB: AIEA WELLS PUMPS 1&2 (260) (331-203-TP400)	98	106	108	105	111	108	104	110

Lab Sample ID	Client Sample ID	Percent Isotope Dilution Recovery (Acceptance Limits)							
		PFBA (50-200)	PFPeA (50-200)	C3PFBS (50-200)	C3PFHS (50-200)	C8PFOS (50-200)	42FTS (50-200)	62FTS (50-200)	82FTS (50-200)
380-177071-1	MOANALUA WELLS (331-223-T	97	92	108	111	112	110	107	108
380-177071-1 MS	MOANALUA WELLS (331-223-TP202)	96	90	118	120	114	110	108	109
380-177071-1 MSD	MOANALUA WELLS (331-223-TP202)	76	73	108	109	111	109	105	108
380-177071-2	FB: MOANALUA WELLS (331-223-TP202)	113	114	112	118	114	121	112	111
380-177071-3	HALAWA WELLS UNITS 1 & 2 P1 (331-206-TP065)	96	89	105	106	107	110	104	99
380-177071-4	FB: HALAWA WELLS UNITS 1 & 2 (331-206-TP065)	105	104	103	111	111	109	103	103
380-177071-5	AIEA GULCH WELLS PUMP 1 (331-201-TP071)	91	93	110	113	115	111	108	104
380-177071-6	FB: AIEA GULCH WELLS PUMF 1 (331-201-TP071)	105	109	109	116	111	115	110	105
380-177071-7	AIEA GULCH WELLS PUMP 2 (331-202-TP072)	79	73	108	115	110	119	108	110
380-177071-8	FB: AIEA GULCH WELLS PUMF 2 (331-202-TP072)	107	111	112	113	114	113	105	108
380-177071-9	AIEA WELLS PUMPS 1&2 P2 (260) (331-203-TP400)	86	81	114	115	116	112	108	108
380-177071-10	FB: AIEA WELLS PUMPS 1&2 (260) (331-203-TP400)	108	116	106	117	113	110	109	107

Surrogate Legend

HFPODA = 13C3 HFPO-DA
C6PFDA = 13C6 PFDA
13C5PHA = 13C5 PFHxA

Isotope Dilution Summary

Client: City & County of Honolulu
 Project/Site: RED-HILL

Job ID: 380-177071-1
 SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
 P1/P2, Aiea Wells Pumps 1&2

C4PFHA = 13C4 PFHpA
 C8PFOA = 13C8 PFOA
 C9PFNA = 13C9 PFNA
 13C7PUA = 13C7 PFUnA
 PFDoA = 13C2 PFDoA
 PFBA = 13C4 PFBA
 PFPeA = 13C5 PFPeA
 C3PFBS = 13C3 PFBS
 C3PFHS = 13C3 PFHxS
 C8PFOS = 13C8 PFOS
 42FTS = 13C2-4:2-FTS
 62FTS = 13C2-6:2-FTS
 82FTS = 13C2-8:2-FTS

Method: 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Matrix: Water

Prep Type: Total/NA

Percent Isotope Dilution Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	HFPODA (50-200)	C6PFDA (50-200)	13C5PHA (50-200)	C4PFHA (50-200)	C8PFOA (50-200)	C9PFNA (50-200)	13C7PUA (50-200)	PFDoA (50-200)
LCS 380-180587/22-A	Lab Control Sample	93	103	99	102	104	106	100	106
MBL 380-180587/20-A	Method Blank	95	107	104	110	106	109	103	108
MRL 380-180587/21-A	Lab Control Sample	96	102	104	104	104	103	103	104

Percent Isotope Dilution Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	PFBA (50-200)	PFPeA (50-200)	C3PFBS (50-200)	C3PFHS (50-200)	C8PFOS (50-200)	42FTS (50-200)	62FTS (50-200)	82FTS (50-200)
LCS 380-180587/22-A	Lab Control Sample	112	105	111	116	113	107	108	108
MBL 380-180587/20-A	Method Blank	112	106	106	113	111	111	108	102
MRL 380-180587/21-A	Lab Control Sample	104	105	114	114	113	107	108	107

Surrogate Legend

HFPODA = 13C3 HFPO-DA
 C6PFDA = 13C6 PFDA
 13C5PHA = 13C5 PFHxA
 C4PFHA = 13C4 PFHpA
 C8PFOA = 13C8 PFOA
 C9PFNA = 13C9 PFNA
 13C7PUA = 13C7 PFUnA
 PFDoA = 13C2 PFDoA
 PFBA = 13C4 PFBA
 PFPeA = 13C5 PFPeA
 C3PFBS = 13C3 PFBS
 C3PFHS = 13C3 PFHxS
 C8PFOS = 13C8 PFOS
 42FTS = 13C2-4:2-FTS
 62FTS = 13C2-6:2-FTS
 82FTS = 13C2-8:2-FTS

QC Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method: 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water

Lab Sample ID: MBL 380-180587/20-A
Matrix: Water
Analysis Batch: 180703

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 180587

Analyte	MBL Result	MBL Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
11-Chloroeicosafluoro-3-oxaundecan e-1-sulfonic acid (11Cl-PF3OUdS)	<0.30		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
9-Chlorohexadecafluoro-3-oxanonan e-1-sulfonic acid(9Cl-PF3ONS)	<0.30		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<0.60		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<1.0		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluorobutanesulfonic acid (PFBS)	<0.37		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluorodecanoic acid (PFDA)	<0.31		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluorododecanoic acid (PFDoA)	<0.54		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluoroheptanoic acid (PFHpA)	<0.39		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluorohexanesulfonic acid (PFHxS)	<0.32		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluorohexanoic acid (PFHxA)	<0.46		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluorononanoic acid (PFNA)	<0.40		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluorooctanesulfonic acid (PFOS)	<0.43		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluorooctanoic acid (PFOA)	<0.38		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluoroundecanoic acid (PFUnA)	<0.42		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluorobutanoic acid (PFBA)	<0.69		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<0.38		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<0.37		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<0.48		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<0.47		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<0.25		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<0.46		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<0.15		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluoropentanoic acid (PFPeA)	<0.38		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluoroheptanesulfonic acid (PFHpS)	<0.36		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1
Perfluoropentanesulfonic acid (PFPeS)	<0.39		2.0	ng/L		10/17/25 16:13	10/19/25 16:09	1

Isotope Dilution	MBL %Recovery	MBL Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C3 HFPO-DA	95		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C6 PFDA	107		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C5 PFHxA	104		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C4 PFHpA	110		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C8 PFOA	106		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C9 PFNA	109		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C7 PFUnA	103		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C2 PFDoA	108		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C4 PFBA	112		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C5 PFPeA	106		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C3 PFBS	106		50 - 200	10/17/25 16:13	10/19/25 16:09	1

Eurofins Eaton Analytical Pomona

QC Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method: 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Lab Sample ID: MBL 380-180587/20-A
Matrix: Water
Analysis Batch: 180703

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 180587

<i>Isotope Dilution</i>	<i>MBL</i>	<i>MBL</i>	<i>Limits</i>	<i>Prepared</i>	<i>Analyzed</i>	<i>Dil Fac</i>
	%Recovery	Qualifier				
13C3 PFHxS	113		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C8 PFOS	111		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C2-4:2-FTS	111		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C2-6:2-FTS	108		50 - 200	10/17/25 16:13	10/19/25 16:09	1
13C2-8:2-FTS	102		50 - 200	10/17/25 16:13	10/19/25 16:09	1

Lab Sample ID: LCS 380-180587/22-A
Matrix: Water
Analysis Batch: 180703

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 180587

<i>Analyte</i>	<i>Spike</i>	<i>LCS</i>	<i>LCS</i>	<i>Unit</i>	<i>D</i>	<i>%Rec</i>	<i>%Rec</i>
	Added	Result	Qualifier				Limits
11-Chloroeicosfluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	60.2	61.0		ng/L		101	70 - 130
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	60.2	59.4		ng/L		99	70 - 130
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	60.2	61.7		ng/L		102	70 - 130
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	60.2	59.0		ng/L		98	70 - 130
Perfluorobutanesulfonic acid (PFBS)	60.2	63.6		ng/L		106	70 - 130
Perfluorodecanoic acid (PFDA)	60.2	63.1		ng/L		105	70 - 130
Perfluorododecanoic acid (PFDoA)	60.2	60.4		ng/L		100	70 - 130
Perfluoroheptanoic acid (PFHpA)	60.2	62.6		ng/L		104	70 - 130
Perfluorohexanesulfonic acid (PFHxS)	60.2	58.4		ng/L		97	70 - 130
Perfluorohexanoic acid (PFHxA)	60.2	60.4		ng/L		100	70 - 130
Perfluorononanoic acid (PFNA)	60.2	62.2		ng/L		103	70 - 130
Perfluorooctanesulfonic acid (PFOS)	60.2	58.5		ng/L		97	70 - 130
Perfluorooctanoic acid (PFOA)	60.2	59.1		ng/L		98	70 - 130
Perfluoroundecanoic acid (PFUnA)	60.2	62.4		ng/L		104	70 - 130
Perfluorobutanoic acid (PFBA)	60.2	58.4		ng/L		97	70 - 130
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	60.2	63.5		ng/L		105	70 - 130
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	60.2	61.4		ng/L		102	70 - 130
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	60.2	61.8		ng/L		103	70 - 130
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	60.2	60.9		ng/L		101	70 - 130
Perfluoro (2-ethoxyethane) sulfonic acid (PFEESA)	60.2	65.1		ng/L		108	70 - 130
Perfluoro-3-methoxypropanoic acid (PFMPA)	60.2	55.2		ng/L		92	70 - 130
Perfluoro-4-methoxybutanoic acid (PFMBA)	60.2	61.8		ng/L		103	70 - 130
Perfluoropentanoic acid (PFPeA)	60.2	65.7		ng/L		109	70 - 130

Eurofins Eaton Analytical Pomona

QC Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method: 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Lab Sample ID: LCS 380-180587/22-A
Matrix: Water
Analysis Batch: 180703

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 180587

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Perfluoroheptanesulfonic acid (PFHpS)	60.2	61.8		ng/L		103	70 - 130
Perfluoropentanesulfonic acid (PFPeS)	60.2	56.7		ng/L		94	70 - 130
		LCS LCS					
Isotope Dilution	%Recovery	Qualifier	Limits				
13C3 HFPO-DA	93		50 - 200				
13C6 PFDA	103		50 - 200				
13C5 PFHxA	99		50 - 200				
13C4 PFHpA	102		50 - 200				
13C8 PFOA	104		50 - 200				
13C9 PFNA	106		50 - 200				
13C7 PFUnA	100		50 - 200				
13C2 PFDoA	106		50 - 200				
13C4 PFBA	112		50 - 200				
13C5 PFPeA	105		50 - 200				
13C3 PFBS	111		50 - 200				
13C3 PFHxS	116		50 - 200				
13C8 PFOS	113		50 - 200				
13C2-4:2-FTS	107		50 - 200				
13C2-6:2-FTS	108		50 - 200				
13C2-8:2-FTS	108		50 - 200				

Lab Sample ID: MRL 380-180587/21-A
Matrix: Water
Analysis Batch: 180703

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 180587

Analyte	Spike Added	MRL Result	MRL Qualifier	Unit	D	%Rec	%Rec Limits
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	2.01	2.25	J	ng/L		112	50 - 150
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	2.01	2.22	J	ng/L		111	50 - 150
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	2.01	2.21	J	ng/L		110	50 - 150
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	2.01	2.00	J	ng/L		99	50 - 150
Perfluorobutanesulfonic acid (PFBS)	2.01	2.22	J	ng/L		110	50 - 150
Perfluorodecanoic acid (PFDA)	2.01	2.24	J	ng/L		111	50 - 150
Perfluorododecanoic acid (PFDoA)	2.01	2.33	J	ng/L		116	50 - 150
Perfluoroheptanoic acid (PFHpA)	2.01	2.32	J	ng/L		116	50 - 150
Perfluorohexanesulfonic acid (PFHxS)	2.01	2.18	J	ng/L		109	50 - 150
Perfluorohexanoic acid (PFHxA)	2.01	2.23	J	ng/L		111	50 - 150
Perfluorononanoic acid (PFNA)	2.01	2.25	J	ng/L		112	50 - 150
Perfluorooctanesulfonic acid (PFOS)	2.01	2.30	J	ng/L		114	50 - 150
Perfluorooctanoic acid (PFOA)	2.01	2.41	J	ng/L		120	50 - 150

Eurofins Eaton Analytical Pomona

QC Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method: 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Lab Sample ID: MRL 380-180587/21-A
Matrix: Water
Analysis Batch: 180703

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 180587

Analyte	Spike Added	MRL Result	MRL Qualifier	Unit	D	%Rec	%Rec Limits
Perfluoroundecanoic acid (PFUnA)	2.01	2.33	J	ng/L		116	50 - 150
Perfluorobutanoic acid (PFBA)	2.01	2.17	J	ng/L		108	50 - 150
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	2.01	2.26	J	ng/L		113	50 - 150
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	2.01	2.48	J	ng/L		123	50 - 150
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	2.01	2.31	J	ng/L		115	50 - 150
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	2.01	2.25	J	ng/L		112	50 - 150
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	2.01	2.16	J	ng/L		107	50 - 150
Perfluoro-3-methoxypropanoic acid (PFMPA)	2.01	2.09	J	ng/L		104	50 - 150
Perfluoro-4-methoxybutanoic acid (PFMBA)	2.01	2.15	J	ng/L		107	50 - 150
Perfluoropentanoic acid (PFPeA)	2.01	2.02	J	ng/L		100	50 - 150
Perfluoroheptanesulfonic acid (PFHpS)	2.01	2.24	J	ng/L		111	50 - 150
Perfluoropentanesulfonic acid (PFPeS)	2.01	1.97	J	ng/L		98	50 - 150

Isotope Dilution	MRL %Recovery	MRL Qualifier	Limits
13C3 HFPO-DA	96		50 - 200
13C6 PFDA	102		50 - 200
13C5 PFHxA	104		50 - 200
13C4 PFHpA	104		50 - 200
13C8 PFOA	104		50 - 200
13C9 PFNA	103		50 - 200
13C7 PFUnA	103		50 - 200
13C2 PFDoA	104		50 - 200
13C4 PFBA	104		50 - 200
13C5 PFPeA	105		50 - 200
13C3 PFBS	114		50 - 200
13C3 PFHxS	114		50 - 200
13C8 PFOS	113		50 - 200
13C2-4:2-FTS	107		50 - 200
13C2-6:2-FTS	108		50 - 200
13C2-8:2-FTS	107		50 - 200

Lab Sample ID: 380-177071-1 MS
Matrix: Drinking Water
Analysis Batch: 180703

Client Sample ID: MOANALUA WELLS (331-223-TP202)
Prep Type: Total/NA
Prep Batch: 180587

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
11-Chloroeicosfluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		121	118		ng/L		98	70 - 130

QC Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method: 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Lab Sample ID: 380-177071-1 MS

Matrix: Drinking Water

Analysis Batch: 180703

Client Sample ID: MOANALUA WELLS (331-223-TP202)

Prep Type: Total/NA

Prep Batch: 180587

Analyte	Sample	Sample	Spike	MS	MS	Unit	D	%Rec	%Rec Limits
	Result	Qualifier	Added	Result	Qualifier				
9-Chlorohexadecafluoro-3-oxanone-1-sulfonic acid(9Cl-PF3ONS)	<2.0		121	118		ng/L		98	70 - 130
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		121	113		ng/L		93	70 - 130
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		121	119		ng/L		99	70 - 130
Perfluorobutanesulfonic acid (PFBS)	<2.0		121	115		ng/L		95	70 - 130
Perfluorodecanoic acid (PFDA)	<2.0		121	121		ng/L		100	70 - 130
Perfluorododecanoic acid (PFDoA)	<2.0		121	117		ng/L		97	70 - 130
Perfluoroheptanoic acid (PFHpA)	<2.0		121	116		ng/L		96	70 - 130
Perfluorohexanesulfonic acid (PFHxS)	<2.0		121	114		ng/L		93	70 - 130
Perfluorohexanoic acid (PFHxA)	<2.0		121	120		ng/L		98	70 - 130
Perfluorononanoic acid (PFNA)	<2.0		121	118		ng/L		98	70 - 130
Perfluorooctanesulfonic acid (PFOS)	<2.0		121	119		ng/L		97	70 - 130
Perfluorooctanoic acid (PFOA)	<2.0		121	123		ng/L		101	70 - 130
Perfluoroundecanoic acid (PFUnA)	<2.0		121	118		ng/L		98	70 - 130
Perfluorobutanoic acid (PFBA)	<2.0		121	118		ng/L		97	70 - 130
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		121	119		ng/L		99	70 - 130
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		121	117		ng/L		97	70 - 130
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		121	120		ng/L		99	70 - 130
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		121	117		ng/L		97	70 - 130
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<2.0		121	114		ng/L		94	70 - 130
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		121	109		ng/L		90	70 - 130
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		121	115		ng/L		95	70 - 130
Perfluoropentanoic acid (PFPeA)	<2.0		121	126		ng/L		104	70 - 130
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		121	120		ng/L		99	70 - 130
Perfluoropentanesulfonic acid (PFPeS)	<2.0		121	108		ng/L		90	70 - 130

Isotope Dilution	MS	MS	Limits
	%Recovery	Qualifier	
13C3 HFPO-DA	89		50 - 200
13C6 PFDA	95		50 - 200
13C5 PFHxA	87		50 - 200
13C4 PFHpA	91		50 - 200
13C8 PFOA	91		50 - 200
13C9 PFNA	96		50 - 200
13C7 PFUnA	101		50 - 200
13C2 PFDoA	107		50 - 200

QC Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method: 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Lab Sample ID: 380-177071-1 MS
Matrix: Drinking Water
Analysis Batch: 180703

Client Sample ID: MOANALUA WELLS (331-223-TP202)
Prep Type: Total/NA
Prep Batch: 180587

Isotope Dilution	MS MS		Limits
	%Recovery	Qualifier	
13C4 PFBA	96		50 - 200
13C5 PFPeA	90		50 - 200
13C3 PFBS	118		50 - 200
13C3 PFHxS	120		50 - 200
13C8 PFOS	114		50 - 200
13C2-4:2-FTS	110		50 - 200
13C2-6:2-FTS	108		50 - 200
13C2-8:2-FTS	109		50 - 200

Lab Sample ID: 380-177071-1 MSD
Matrix: Drinking Water
Analysis Batch: 180703

Client Sample ID: MOANALUA WELLS (331-223-TP202)
Prep Type: Total/NA
Prep Batch: 180587

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD MSD		Unit	D	%Rec	%Rec		RPD	Limit
				Result	Qualifier				Limits	RPD		
11-Chloroeicosfluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		120	115		ng/L		95	70 - 130	3	30	
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		120	116		ng/L		96	70 - 130	2	30	
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		120	119		ng/L		99	70 - 130	5	30	
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		120	119		ng/L		98	70 - 130	0	30	
Perfluorobutanesulfonic acid (PFBS)	<2.0		120	112		ng/L		92	70 - 130	3	30	
Perfluorodecanoic acid (PFDA)	<2.0		120	120		ng/L		100	70 - 130	1	30	
Perfluorododecanoic acid (PFDoA)	<2.0		120	123		ng/L		102	70 - 130	5	30	
Perfluoroheptanoic acid (PFHpA)	<2.0		120	123		ng/L		101	70 - 130	5	30	
Perfluorohexanesulfonic acid (PFHxS)	<2.0		120	119		ng/L		97	70 - 130	4	30	
Perfluorohexanoic acid (PFHxA)	<2.0		120	121		ng/L		100	70 - 130	1	30	
Perfluorononanoic acid (PFNA)	<2.0		120	114		ng/L		95	70 - 130	3	30	
Perfluorooctanesulfonic acid (PFOS)	<2.0		120	116		ng/L		95	70 - 130	2	30	
Perfluorooctanoic acid (PFOA)	<2.0		120	123		ng/L		101	70 - 130	0	30	
Perfluoroundecanoic acid (PFUnA)	<2.0		120	128		ng/L		106	70 - 130	8	30	
Perfluorobutanoic acid (PFBA)	<2.0		120	121		ng/L		99	70 - 130	3	30	
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<2.0		120	121		ng/L		101	70 - 130	1	30	
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<2.0		120	115		ng/L		96	70 - 130	1	30	
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<2.0		120	116		ng/L		96	70 - 130	3	30	
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<2.0		120	110		ng/L		92	70 - 130	6	30	
Perfluoro (2-ethoxyethane) sulfonic acid (PFEEESA)	<2.0		120	118		ng/L		98	70 - 130	3	30	
Perfluoro-3-methoxypropanoic acid (PFMPA)	<2.0		120	111		ng/L		92	70 - 130	2	30	

QC Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method: 533 - Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water (Continued)

Lab Sample ID: 380-177071-1 MSD

Client Sample ID: MOANALUA WELLS (331-223-TP202)

Matrix: Drinking Water

Prep Type: Total/NA

Analysis Batch: 180703

Prep Batch: 180587

Analyte	Sample	Sample	Spike	MSD	MSD	Unit	D	%Rec	%Rec	RPD	Limit
	Result	Qualifier	Added	Result	Qualifier						
Perfluoro-4-methoxybutanoic acid (PFMBA)	<2.0		120	116		ng/L		96	70 - 130	1	30
Perfluoropentanoic acid (PFPeA)	<2.0		120	121		ng/L		99	70 - 130	5	30
Perfluoroheptanesulfonic acid (PFHpS)	<2.0		120	115		ng/L		96	70 - 130	4	30
Perfluoropentanesulfonic acid (PFPeS)	<2.0		120	114		ng/L		94	70 - 130	5	30
MSD MSD											
Isotope Dilution	%Recovery	Qualifier	Limits								
13C3 HFPO-DA	70		50 - 200								
13C6 PFDA	59		50 - 200								
13C5 PFHxA	69		50 - 200								
13C4 PFHpA	66		50 - 200								
13C8 PFOA	62		50 - 200								
13C9 PFNA	60		50 - 200								
13C7 PFUnA	65		50 - 200								
13C2 PFDoA	72		50 - 200								
13C4 PFBA	76		50 - 200								
13C5 PFPeA	73		50 - 200								
13C3 PFBS	108		50 - 200								
13C3 PFHxS	109		50 - 200								
13C8 PFOS	111		50 - 200								
13C2-4:2-FTS	109		50 - 200								
13C2-6:2-FTS	105		50 - 200								
13C2-8:2-FTS	108		50 - 200								

Method: 537.1 - Perfluorinated Alkyl Acids (LC/MS)

Lab Sample ID: MBL 380-180534/22-A

Client Sample ID: Method Blank

Matrix: Water

Prep Type: Total/NA

Analysis Batch: 180688

Prep Batch: 180534

Analyte	MBL	MBL	RL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier						
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<1.0		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Perfluorooctanesulfonic acid (PFOS)	<0.43		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Perfluoroundecanoic acid (PFUnA)	<0.42		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<0.58		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<0.42		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Perfluorohexanoic acid (PFHxA)	<0.46		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Perfluorododecanoic acid (PFDoA)	<0.54		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Perfluorooctanoic acid (PFOA)	<0.38		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Perfluorodecanoic acid (PFDA)	<0.31		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Perfluorohexanesulfonic acid (PFHxS)	<0.32		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Perfluorobutanesulfonic acid (PFBS)	<0.37		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Perfluoroheptanoic acid (PFHpA)	<0.39		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Perfluorononanoic acid (PFNA)	<0.40		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Perfluorotetradecanoic acid (PFTA)	<0.54		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1

Eurofins Eaton Analytical Pomona

QC Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method: 537.1 - Perfluorinated Alkyl Acids (LC/MS) (Continued)

Lab Sample ID: MBL 380-180534/22-A
Matrix: Water
Analysis Batch: 180688

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 180534

Analyte	MBL	MBL	RL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier						
Perfluorotridecanoic acid (PFTTrDA)	<0.36		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<0.30		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
11-Chloroeicosfluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<0.30		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<0.60		2.0	ng/L		10/17/25 10:56	10/18/25 17:42	1
Surrogate	%Recovery	MBL Qualifier	Limits			Prepared	Analyzed	Dil Fac
d5-NEtFOSAA	114		70 - 130			10/17/25 10:56	10/18/25 17:42	1
13C2 PFHxA	110		70 - 130			10/17/25 10:56	10/18/25 17:42	1
13C2 PFDA	115		70 - 130			10/17/25 10:56	10/18/25 17:42	1
13C3-GenX	108		70 - 130			10/17/25 10:56	10/18/25 17:42	1

Lab Sample ID: LCS 380-180534/24-A
Matrix: Water
Analysis Batch: 180688

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 180534

Analyte	Spike Added	LCS	LCS	Unit	D	%Rec	%Rec Limits
		Result	Qualifier				
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	25.1	23.7		ng/L		95	70 - 130
Perfluorooctanesulfonic acid (PFOS)	25.1	26.5		ng/L		106	70 - 130
Perfluoroundecanoic acid (PFUnA)	25.1	27.0		ng/L		108	70 - 130
N-methylperfluorooctanesulfonamide-1,1-diacetic acid (NMeFOSAA)	25.1	25.4		ng/L		101	70 - 130
N-ethylperfluorooctanesulfonamide-1,1-diacetic acid (NEtFOSAA)	25.1	25.4		ng/L		101	70 - 130
Perfluorohexanoic acid (PFHxA)	25.1	25.0		ng/L		100	70 - 130
Perfluorododecanoic acid (PFDoA)	25.1	27.0		ng/L		108	70 - 130
Perfluorooctanoic acid (PFOA)	25.1	26.3		ng/L		105	70 - 130
Perfluorodecanoic acid (PFDA)	25.1	27.1		ng/L		108	70 - 130
Perfluorohexanesulfonic acid (PFHxS)	25.1	27.0		ng/L		108	70 - 130
Perfluorobutanesulfonic acid (PFBS)	25.1	25.6		ng/L		102	70 - 130
Perfluoroheptanoic acid (PFHpA)	25.1	25.7		ng/L		103	70 - 130
Perfluorononanoic acid (PFNA)	25.1	26.0		ng/L		104	70 - 130
Perfluorotetradecanoic acid (PFTA)	25.1	25.9		ng/L		104	70 - 130
Perfluorotridecanoic acid (PFTTrDA)	25.1	26.6		ng/L		106	70 - 130
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	25.1	26.6		ng/L		106	70 - 130
11-Chloroeicosfluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	25.1	25.6		ng/L		102	70 - 130
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	25.1	24.6		ng/L		98	70 - 130

Eurofins Eaton Analytical Pomona

QC Sample Results

Client: City & County of Honolulu
 Project/Site: RED-HILL

Job ID: 380-177071-1
 SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
 P1/P2, Aiea Wells Pumps 1&2

Method: 537.1 - Perfluorinated Alkyl Acids (LC/MS) (Continued)

Surrogate	LCS LCS		Limits
	%Recovery	Qualifier	
d5-NEtFOSAA	105		70 - 130
13C2 PFHxA	107		70 - 130
13C2 PFDA	112		70 - 130
13C3-GenX	101		70 - 130

Lab Sample ID: MRL 380-180534/23-A
Matrix: Water
Analysis Batch: 180688

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 180534

Analyte	Spike Added	MRL MRL		Unit	D	%Rec	%Rec Limits
		Result	Qualifier				
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	2.01	2.09	J	ng/L		104	50 - 150
Perfluorooctanesulfonic acid (PFOS)	2.01	2.32	J	ng/L		116	50 - 150
Perfluoroundecanoic acid (PFUnA)	2.01	2.24	J	ng/L		111	50 - 150
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	2.01	2.17	J	ng/L		108	50 - 150
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	2.01	2.14	J	ng/L		106	50 - 150
Perfluorohexanoic acid (PFHxA)	2.01	2.11	J	ng/L		105	50 - 150
Perfluorododecanoic acid (PFDoA)	2.01	2.30	J	ng/L		114	50 - 150
Perfluorooctanoic acid (PFOA)	2.01	2.35	J	ng/L		117	50 - 150
Perfluorodecanoic acid (PFDA)	2.01	2.29	J	ng/L		114	50 - 150
Perfluorohexanesulfonic acid (PFHxS)	2.01	2.33	J	ng/L		116	50 - 150
Perfluorobutanesulfonic acid (PFBS)	2.01	2.23	J	ng/L		111	50 - 150
Perfluoroheptanoic acid (PFHpA)	2.01	2.11	J	ng/L		105	50 - 150
Perfluorononanoic acid (PFNA)	2.01	2.14	J	ng/L		106	50 - 150
Perfluorotetradecanoic acid (PFTA)	2.01	2.25	J	ng/L		112	50 - 150
Perfluorotridecanoic acid (PFTrDA)	2.01	2.24	J	ng/L		111	50 - 150
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid (9Cl-PF3ONS)	2.01	2.20	J	ng/L		109	50 - 150
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	2.01	2.17	J	ng/L		108	50 - 150
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	2.01	2.05	J	ng/L		102	50 - 150

Surrogate	MRL MRL		Limits
	%Recovery	Qualifier	
d5-NEtFOSAA	112		70 - 130
13C2 PFHxA	115		70 - 130
13C2 PFDA	119		70 - 130
13C3-GenX	112		70 - 130

QC Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method: 537.1 - Perfluorinated Alkyl Acids (LC/MS) (Continued)

Lab Sample ID: 380-177016-J-1-A MS
Matrix: Water
Analysis Batch: 180688

Client Sample ID: Matrix Spike
Prep Type: Total/NA
Prep Batch: 180534

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		25.1	24.2		ng/L		97	70 - 130
Perfluorooctanesulfonic acid (PFOS)	<2.0		25.1	27.1		ng/L		108	70 - 130
Perfluoroundecanoic acid (PFUnA)	<2.0		25.1	25.9		ng/L		103	70 - 130
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<2.0		25.1	25.7		ng/L		103	70 - 130
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<2.0		25.1	26.0		ng/L		104	70 - 130
Perfluorohexanoic acid (PFHxA)	<2.0		25.1	24.6		ng/L		98	70 - 130
Perfluorododecanoic acid (PFDoA)	<2.0		25.1	26.4		ng/L		105	70 - 130
Perfluorooctanoic acid (PFOA)	<2.0		25.1	26.4		ng/L		106	70 - 130
Perfluorodecanoic acid (PFDA)	<2.0		25.1	26.3		ng/L		105	70 - 130
Perfluorohexanesulfonic acid (PFHxS)	<2.0		25.1	27.2		ng/L		109	70 - 130
Perfluorobutanesulfonic acid (PFBS)	<2.0		25.1	26.7		ng/L		107	70 - 130
Perfluoroheptanoic acid (PFHpA)	<2.0		25.1	25.5		ng/L		102	70 - 130
Perfluorononanoic acid (PFNA)	<2.0		25.1	25.9		ng/L		103	70 - 130
Perfluorotetradecanoic acid (PFTA)	<2.0		25.1	25.3		ng/L		101	70 - 130
Perfluorotridecanoic acid (PFTrDA)	<2.0		25.1	25.9		ng/L		103	70 - 130
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid(9Cl-PF3ONS)	<2.0		25.1	26.8		ng/L		107	70 - 130
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		25.1	25.7		ng/L		103	70 - 130
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		25.1	24.6		ng/L		98	70 - 130

Surrogate	MS %Recovery	MS Qualifier	MS Limits
d5-NEtFOSAA	106		70 - 130
13C2 PFHxA	110		70 - 130
13C2 PFDA	109		70 - 130
13C3-GenX	104		70 - 130

Lab Sample ID: 380-177016-K-1-A MSD
Matrix: Water
Analysis Batch: 180688

Client Sample ID: Matrix Spike Duplicate
Prep Type: Total/NA
Prep Batch: 180534

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA/GenX)	<2.0		25.1	25.0		ng/L		100	70 - 130	3	30
Perfluorooctanesulfonic acid (PFOS)	<2.0		25.1	27.5		ng/L		110	70 - 130	1	30
Perfluoroundecanoic acid (PFUnA)	<2.0		25.1	26.7		ng/L		106	70 - 130	3	30

Eurofins Eaton Analytical Pomona

QC Sample Results

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method: 537.1 - Perfluorinated Alkyl Acids (LC/MS) (Continued)

Lab Sample ID: 380-177016-K-1-A MSD

Matrix: Water

Analysis Batch: 180688

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 180534

Analyte	Sample	Sample	Spike	MSD	MSD	Unit	D	%Rec	%Rec	RPD	Limit
	Result	Qualifier	Added	Result	Qualifier				Limits		
N-methylperfluorooctanesulfonamide acetic acid (NMeFOSAA)	<2.0		25.1	25.6		ng/L		102	70 - 130	1	30
N-ethylperfluorooctanesulfonamide acetic acid (NEtFOSAA)	<2.0		25.1	25.6		ng/L		102	70 - 130	1	30
Perfluorohexanoic acid (PFHxA)	<2.0		25.1	24.6		ng/L		98	70 - 130	0	30
Perfluorododecanoic acid (PFDoA)	<2.0		25.1	26.6		ng/L		106	70 - 130	1	30
Perfluorooctanoic acid (PFOA)	<2.0		25.1	26.3		ng/L		105	70 - 130	0	30
Perfluorodecanoic acid (PFDA)	<2.0		25.1	27.1		ng/L		108	70 - 130	3	30
Perfluorohexanesulfonic acid (PFHxS)	<2.0		25.1	26.5		ng/L		106	70 - 130	3	30
Perfluorobutanesulfonic acid (PFBS)	<2.0		25.1	25.7		ng/L		102	70 - 130	4	30
Perfluoroheptanoic acid (PFHpA)	<2.0		25.1	25.7		ng/L		103	70 - 130	1	30
Perfluorononanoic acid (PFNA)	<2.0		25.1	25.9		ng/L		103	70 - 130	0	30
Perfluorotetradecanoic acid (PFTA)	<2.0		25.1	25.9		ng/L		104	70 - 130	3	30
Perfluorotridecanoic acid (PFTrDA)	<2.0		25.1	26.5		ng/L		106	70 - 130	2	30
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid (9Cl-PF3ONS)	<2.0		25.1	26.7		ng/L		106	70 - 130	0	30
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid (11Cl-PF3OUdS)	<2.0		25.1	25.2		ng/L		101	70 - 130	2	30
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<2.0		25.1	24.5		ng/L		98	70 - 130	0	30
Surrogate		MSD	MSD								
		%Recovery	Qualifier	Limits							
d5-NEtFOSAA		110		70 - 130							
13C2 PFHxA		111		70 - 130							
13C2 PFDA		115		70 - 130							
13C3-GenX		108		70 - 130							

QC Association Summary

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

LCMS

Prep Batch: 180534

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
380-177071-1	MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	537.1 DW	
380-177071-2	FB: MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	537.1 DW	
380-177071-3	HALAWA WELLS UNITS 1 & 2 P1 (331-206-TP01)	Total/NA	Drinking Water	537.1 DW	
380-177071-4	FB: HALAWA WELLS UNITS 1 & 2 (331-206-TPC)	Total/NA	Drinking Water	537.1 DW	
380-177071-5	AIEA GULCH WELLS PUMP 1 (331-201-TP071)	Total/NA	Drinking Water	537.1 DW	
380-177071-7	AIEA GULCH WELLS PUMP 2 (331-202-TP072)	Total/NA	Drinking Water	537.1 DW	
380-177071-8	FB: AIEA GULCH WELLS PUMP 2 (331-202-TPC)	Total/NA	Drinking Water	537.1 DW	
380-177071-9	AIEA WELLS PUMPS 1&2 P2 (260) (331-203-TP)	Total/NA	Drinking Water	537.1 DW	
380-177071-10	FB: AIEA WELLS PUMPS 1&2 (260) (331-203-TF)	Total/NA	Drinking Water	537.1 DW	
MBL 380-180534/22-A	Method Blank	Total/NA	Water	537.1 DW	
LCS 380-180534/24-A	Lab Control Sample	Total/NA	Water	537.1 DW	
MRL 380-180534/23-A	Lab Control Sample	Total/NA	Water	537.1 DW	
380-177016-J-1-A MS	Matrix Spike	Total/NA	Water	537.1 DW	
380-177016-K-1-A MSD	Matrix Spike Duplicate	Total/NA	Water	537.1 DW	

Prep Batch: 180587

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
380-177071-1	MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	533	
380-177071-2	FB: MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	533	
380-177071-3	HALAWA WELLS UNITS 1 & 2 P1 (331-206-TP01)	Total/NA	Drinking Water	533	
380-177071-4	FB: HALAWA WELLS UNITS 1 & 2 (331-206-TPC)	Total/NA	Drinking Water	533	
380-177071-5	AIEA GULCH WELLS PUMP 1 (331-201-TP071)	Total/NA	Drinking Water	533	
380-177071-6	FB: AIEA GULCH WELLS PUMP 1 (331-201-TPC)	Total/NA	Drinking Water	533	
380-177071-7	AIEA GULCH WELLS PUMP 2 (331-202-TP072)	Total/NA	Drinking Water	533	
380-177071-8	FB: AIEA GULCH WELLS PUMP 2 (331-202-TPC)	Total/NA	Drinking Water	533	
380-177071-9	AIEA WELLS PUMPS 1&2 P2 (260) (331-203-TP)	Total/NA	Drinking Water	533	
380-177071-10	FB: AIEA WELLS PUMPS 1&2 (260) (331-203-TF)	Total/NA	Drinking Water	533	
MBL 380-180587/20-A	Method Blank	Total/NA	Water	533	
LCS 380-180587/22-A	Lab Control Sample	Total/NA	Water	533	
MRL 380-180587/21-A	Lab Control Sample	Total/NA	Water	533	
380-177071-1 MS	MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	533	
380-177071-1 MSD	MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	533	

Analysis Batch: 180688

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
380-177071-1	MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	537.1	180534
380-177071-2	FB: MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	537.1	180534
380-177071-3	HALAWA WELLS UNITS 1 & 2 P1 (331-206-TP01)	Total/NA	Drinking Water	537.1	180534
380-177071-4	FB: HALAWA WELLS UNITS 1 & 2 (331-206-TPC)	Total/NA	Drinking Water	537.1	180534
380-177071-5	AIEA GULCH WELLS PUMP 1 (331-201-TP071)	Total/NA	Drinking Water	537.1	180534
380-177071-7	AIEA GULCH WELLS PUMP 2 (331-202-TP072)	Total/NA	Drinking Water	537.1	180534
380-177071-8	FB: AIEA GULCH WELLS PUMP 2 (331-202-TPC)	Total/NA	Drinking Water	537.1	180534
380-177071-9	AIEA WELLS PUMPS 1&2 P2 (260) (331-203-TP)	Total/NA	Drinking Water	537.1	180534
380-177071-10	FB: AIEA WELLS PUMPS 1&2 (260) (331-203-TF)	Total/NA	Drinking Water	537.1	180534
MBL 380-180534/22-A	Method Blank	Total/NA	Water	537.1	180534
LCS 380-180534/24-A	Lab Control Sample	Total/NA	Water	537.1	180534
MRL 380-180534/23-A	Lab Control Sample	Total/NA	Water	537.1	180534
380-177016-J-1-A MS	Matrix Spike	Total/NA	Water	537.1	180534
380-177016-K-1-A MSD	Matrix Spike Duplicate	Total/NA	Water	537.1	180534

QC Association Summary

Client: City & County of Honolulu
 Project/Site: RED-HILL

Job ID: 380-177071-1
 SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
 P1/P2, Aiea Wells Pumps 1&2

LCMS

Analysis Batch: 180703

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
380-177071-1	MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	533	180587
380-177071-2	FB: MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	533	180587
380-177071-3	HALAWA WELLS UNITS 1 & 2 P1 (331-206-TP01)	Total/NA	Drinking Water	533	180587
380-177071-4	FB: HALAWA WELLS UNITS 1 & 2 (331-206-TPC)	Total/NA	Drinking Water	533	180587
380-177071-5	AIEA GULCH WELLS PUMP 1 (331-201-TP071)	Total/NA	Drinking Water	533	180587
380-177071-6	FB: AIEA GULCH WELLS PUMP 1 (331-201-TPC)	Total/NA	Drinking Water	533	180587
380-177071-7	AIEA GULCH WELLS PUMP 2 (331-202-TP072)	Total/NA	Drinking Water	533	180587
380-177071-8	FB: AIEA GULCH WELLS PUMP 2 (331-202-TPC)	Total/NA	Drinking Water	533	180587
380-177071-9	AIEA WELLS PUMPS 1&2 P2 (260) (331-203-TP)	Total/NA	Drinking Water	533	180587
380-177071-10	FB: AIEA WELLS PUMPS 1&2 (260) (331-203-TF)	Total/NA	Drinking Water	533	180587
MBL 380-180587/20-A	Method Blank	Total/NA	Water	533	180587
LCS 380-180587/22-A	Lab Control Sample	Total/NA	Water	533	180587
MRL 380-180587/21-A	Lab Control Sample	Total/NA	Water	533	180587
380-177071-1 MS	MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	533	180587
380-177071-1 MSD	MOANALUA WELLS (331-223-TP202)	Total/NA	Drinking Water	533	180587

Lab Chronicle

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: MOANALUA WELLS (331-223-TP202)

Lab Sample ID: 380-177071-1

Date Collected: 10/13/25 10:03

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	533			180587	N8NE	EA POM	10/17/25 16:13
Total/NA	Analysis	533		1	180703	SZ9R	EA POM	10/19/25 16:38
Total/NA	Prep	537.1 DW			180534	E9PK	EA POM	10/17/25 10:56
Total/NA	Analysis	537.1		1	180688	M7ML	EA POM	10/18/25 19:59

Client Sample ID: FB: MOANALUA WELLS (331-223-TP202)

Lab Sample ID: 380-177071-2

Date Collected: 10/13/25 10:03

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	533			180587	N8NE	EA POM	10/17/25 16:13
Total/NA	Analysis	533		1	180703	SZ9R	EA POM	10/19/25 17:55
Total/NA	Prep	537.1 DW			180534	E9PK	EA POM	10/17/25 10:56
Total/NA	Analysis	537.1		1	180688	M7ML	EA POM	10/18/25 20:20

Client Sample ID: HALAWA WELLS UNITS 1 & 2 P1 (331-206-TP065)

Lab Sample ID: 380-177071-3

Date Collected: 10/13/25 10:28

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	533			180587	N8NE	EA POM	10/17/25 16:13
Total/NA	Analysis	533		1	180703	SZ9R	EA POM	10/19/25 18:04
Total/NA	Prep	537.1 DW			180534	E9PK	EA POM	10/17/25 10:56
Total/NA	Analysis	537.1		1	180688	M7ML	EA POM	10/18/25 20:31

Client Sample ID: FB: HALAWA WELLS UNITS 1 & 2 (331-206-TP065)

Lab Sample ID: 380-177071-4

Date Collected: 10/13/25 10:28

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	533			180587	N8NE	EA POM	10/17/25 16:13
Total/NA	Analysis	533		1	180703	SZ9R	EA POM	10/19/25 18:14
Total/NA	Prep	537.1 DW			180534	E9PK	EA POM	10/17/25 10:56
Total/NA	Analysis	537.1		1	180688	M7ML	EA POM	10/18/25 20:41

Client Sample ID: AIEA GULCH WELLS PUMP 1 (331-201-TP071)

Lab Sample ID: 380-177071-5

Date Collected: 10/13/25 10:57

Matrix: Drinking Water

Date Received: 10/15/25 10:27

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	533			180587	N8NE	EA POM	10/17/25 16:13
Total/NA	Analysis	533		1	180703	SZ9R	EA POM	10/19/25 18:23

Eurofins Eaton Analytical Pomona

Lab Chronicle

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: AIEA GULCH WELLS PUMP 1 (331-201-TP071)

Lab Sample ID: 380-177071-5

Date Collected: 10/13/25 10:57
Date Received: 10/15/25 10:27

Matrix: Drinking Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	537.1 DW			180534	E9PK	EA POM	10/17/25 10:56
Total/NA	Analysis	537.1		1	180688	M7ML	EA POM	10/18/25 20:51

Client Sample ID: FB: AIEA GULCH WELLS PUMP 1 (331-201-TP071)

Lab Sample ID: 380-177071-6

Date Collected: 10/13/25 10:57
Date Received: 10/15/25 10:27

Matrix: Drinking Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	533			180587	N8NE	EA POM	10/17/25 16:13
Total/NA	Analysis	533		1	180703	SZ9R	EA POM	10/19/25 18:42

Client Sample ID: AIEA GULCH WELLS PUMP 2 (331-202-TP072)

Lab Sample ID: 380-177071-7

Date Collected: 10/13/25 11:16
Date Received: 10/15/25 10:27

Matrix: Drinking Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	533			180587	N8NE	EA POM	10/17/25 16:13
Total/NA	Analysis	533		1	180703	SZ9R	EA POM	10/19/25 18:52
Total/NA	Prep	537.1 DW			180534	E9PK	EA POM	10/17/25 10:56
Total/NA	Analysis	537.1		1	180688	M7ML	EA POM	10/18/25 21:10

Client Sample ID: FB: AIEA GULCH WELLS PUMP 2 (331-202-TP072)

Lab Sample ID: 380-177071-8

Date Collected: 10/13/25 11:16
Date Received: 10/15/25 10:27

Matrix: Drinking Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	533			180587	N8NE	EA POM	10/17/25 16:13
Total/NA	Analysis	533		1	180703	SZ9R	EA POM	10/19/25 19:02
Total/NA	Prep	537.1 DW			180534	E9PK	EA POM	10/17/25 10:56
Total/NA	Analysis	537.1		1	180688	M7ML	EA POM	10/18/25 21:20

Client Sample ID: AIEA WELLS PUMPS 1&2 P2 (260) (331-203-TP400)

Lab Sample ID: 380-177071-9

Date Collected: 10/13/25 11:31
Date Received: 10/15/25 10:27

Matrix: Drinking Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	533			180587	N8NE	EA POM	10/17/25 16:13
Total/NA	Analysis	533		1	180703	SZ9R	EA POM	10/19/25 19:11

Lab Chronicle

Client: City & County of Honolulu
 Project/Site: RED-HILL

Job ID: 380-177071-1
 SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
 P1/P2, Aiea Wells Pumps 1&2

Client Sample ID: AIEA WELLS PUMPS 1&2 P2 (260)
(331-203-TP400)

Lab Sample ID: 380-177071-9

Date Collected: 10/13/25 11:31
Date Received: 10/15/25 10:27

Matrix: Drinking Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	537.1 DW			180534	E9PK	EA POM	10/17/25 10:56
Total/NA	Analysis	537.1		1	180688	M7ML	EA POM	10/18/25 21:29

Client Sample ID: FB: AIEA WELLS PUMPS 1&2 (260)
(331-203-TP400)

Lab Sample ID: 380-177071-10

Date Collected: 10/13/25 11:31
Date Received: 10/15/25 10:27

Matrix: Drinking Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	533			180587	N8NE	EA POM	10/17/25 16:13
Total/NA	Analysis	533		1	180703	SZ9R	EA POM	10/19/25 19:21
Total/NA	Prep	537.1 DW			180534	E9PK	EA POM	10/17/25 10:56
Total/NA	Analysis	537.1		1	180688	M7ML	EA POM	10/18/25 21:39

Laboratory References:

EA POM = Eurofins Eaton Analytical Pomona, 941 Corporate Center Drive, Pomona, CA 91768-2642, TEL (626)386-1100

Accreditation/Certification Summary

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Laboratory: Eurofins Eaton Analytical Pomona

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

Authority	Program	Identification Number	Expiration Date
Hawaii	State	CA00006	01-31-26

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14
- 15
- 16
- 17

Method Summary

Client: City & County of Honolulu
Project/Site: RED-HILL

Job ID: 380-177071-1
SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells
P1/P2, Aiea Wells Pumps 1&2

Method	Method Description	Protocol	Laboratory
533	Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water	EPA	EA POM
537.1	Perfluorinated Alkyl Acids (LC/MS)	EPA	EA POM
533	Extraction of Perfluorinated and Polyfluorinated Alkyl Acids	EPA	EA POM
537.1 DW	Extraction of Perfluorinated Alkyl Acids	EPA	EA POM

Protocol References:

EPA = US Environmental Protection Agency

Laboratory References:

EA POM = Eurofins Eaton Analytical Pomona, 941 Corporate Center Drive, Pomona, CA 91768-2642, TEL (626)386-1100



Sample Summary

Client: City & County of Honolulu
 Project/Site: RED-HILL

Job ID: 380-177071-1
 SDG: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch
 Wells P1/P2, Aiea Wells Pumps 1&2

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Sample Origin
380-177071-1	MOANALUA WELLS (331-223-TP202)	Drinking Water	10/13/25 10:03	10/15/25 10:27	Hawaii
380-177071-2	FB: MOANALUA WELLS (331-223-TP202)	Drinking Water	10/13/25 10:03	10/15/25 10:27	Hawaii
380-177071-3	HALAWA WELLS UNITS 1 & 2 P1 (331-206-TP065)	Drinking Water	10/13/25 10:28	10/15/25 10:27	Hawaii
380-177071-4	FB: HALAWA WELLS UNITS 1 & 2 (331-206-TP065)	Drinking Water	10/13/25 10:28	10/15/25 10:27	Hawaii
380-177071-5	AIEA GULCH WELLS PUMP 1 (331-201-TP071)	Drinking Water	10/13/25 10:57	10/15/25 10:27	Hawaii
380-177071-6	FB: AIEA GULCH WELLS PUMP 1 (331-201-TP071)	Drinking Water	10/13/25 10:57	10/15/25 10:27	Hawaii
380-177071-7	AIEA GULCH WELLS PUMP 2 (331-202-TP072)	Drinking Water	10/13/25 11:16	10/15/25 10:27	Hawaii
380-177071-8	FB: AIEA GULCH WELLS PUMP 2 (331-202-TP072)	Drinking Water	10/13/25 11:16	10/15/25 10:27	Hawaii
380-177071-9	AIEA WELLS PUMPS 1&2 P2 (260) (331-203-TP400)	Drinking Water	10/13/25 11:31	10/15/25 10:27	Hawaii
380-177071-10	FB: AIEA WELLS PUMPS 1&2 (260) (331-203-TP400)	Drinking Water	10/13/25 11:31	10/15/25 10:27	Hawaii

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14
- 15
- 16
- 17

Login Sample Receipt Checklist

Client: City & County of Honolulu

Job Number: 380-177071-1

SDG Number: PFAS: Moanalua Wells, Halawa Wells, Aiea Gulch Wells P1/P2, Aiea Wells Pumps 1&2

Login Number: 177071

List Source: Eurofins Eaton Analytical Pomona

List Number: 1

Creator: Sanchez, Joseph G

Question	Answer	Comment
The coolers custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
Samples were received on ice.	True	
Cooler(s) Temperature is acceptable.	True	
Cooler(s) Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and is legible.	True	
COC is filled out with all pertinent information.	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
CIO4 headspace requirement met (>50% for CA, >30% for other states).	N/A	
Samples do not require splitting or compositing.	True	
Container provided by EEA	True	

