eurofins | Environment Testing

ANALYTICAL REPORT

PREPARED FOR

Attn: Jesse LeBoeuf
Cobb County Water System
680 South Cobb Drive
Marietta, Georgia 30060

Generated 8/29/2023 3:38:55 PM

JOB DESCRIPTION

UCMR5 - GA0670003 - SE1 -Cobb County

JOB NUMBER

810-72815-1

Eurofins Eaton Analytical South Bend
110 S Hill Street
South Bend IN 46617

See page two for job notes and contact information.

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 will 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.

Authorization

Generated
8/29/2023 3:38:55 PM

Authorized for release by
Pamela Brown, Project Manager
Pamela.Brown@et.eurofinsus.com
(574)233-4777

Table of Contents

Definitions/Glossary

Client: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

Qualifiers

LCMS

Qualifier	Qualifier Description
>M	Blank result is greater than MDL but less than 1/3 RL

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: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

Job ID: 810-72815-1

Laboratory: Eurofins Eaton Analytical South Bend

Narrative

Job Narrative
810-72815-1

Receipt
The sample was received on 8/8/2023 9:00 AM. Unless otherwise noted below, the sample arrived in good condition, and, where required, properly preserved and on ice.

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

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

Detection Summary

Client: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

Client Sample ID: 3602 Cobb Pkwy/ Cobb COunty Water System
Lab Sample ID: 810-72815-1
PWSID Number: GA0670003

Analyte	Result	Qualifier	RL		Unit	Dil Fac	D	Method	Prep Type
Perfluorobutanoic acid (PFBA)	0.0065		0.0050		ug/L	1		533	Total/NA
Perfluorobutanesulfonic acid (PFBS)	0.0031		0.0030		ug/L	1		533	Total/NA

Client Sample ID: 3602 Cobb Pkwy/ Cobb COunty Water System
Lab Sample ID: 810-72815-1FRB
PWSID Number: GA0670003

Analyte	Result	Qualifier	RL		Unit	Dil Fac	D	Method	Prep Type
Perfluorooctanesulfonic acid (PFOS)	0.0012	>M	0.0040		ug/L	1		533	Total/NA

This Detection Summary does not include radiochemical test results.

Client Sample ID: 3602 Cobb Pkwy/ Cobb COunty Water System
Lab Sample ID: 810-72815-1
Date Collected: 08/07/23 10:22
Matrix: Drinking Water
Date Received: 08/08/23 09:00
PWSID Number: GA0670003

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	**0.0065**		0.0050		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluoropentanoic acid (PFPeA)	<0.0030		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluorohexanoic acid (PFHxA)	<0.0030		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluoroheptanoic acid (PFHpA)	<0.0030		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluorooctanoic acid (PFOA)	<0.0040		0.0040		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluorononanoic acid (PFNA)	<0.0040		0.0040		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluorodecanoic acid (PFDA)	<0.0030		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluoroundecanoic acid (PFUnA)	<0.0020		0.0020		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluorododecanoic acid (PFDoA)	<0.0030		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<0.0030		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluorobutanesulfonic acid (PFBS)	**0.0031**		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluorohexanesulfonic acid (PFHxS)	<0.0030		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluoroheptanesulfonic acid (PFHpS)	<0.0030		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluorooctanesulfonic acid (PFOS)	<0.0040		0.0040		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluoropentanesulfonic acid (PFPeS)	<0.0040		0.0040		ug/L		08/18/23 06:19	08/22/23 23:20	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA)	<0.0050		0.0050		ug/L		08/18/23 06:19	08/22/23 23:20	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid	<0.0020		0.0020		ug/L		08/18/23 06:19	08/22/23 23:20	1
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid	<0.0050		0.0050		ug/L		08/18/23 06:19	08/22/23 23:20	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<0.0030		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<0.0050		0.0050		ug/L		08/18/23 06:19	08/22/23 23:20	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<0.0050		0.0050		ug/L		08/18/23 06:19	08/22/23 23:20	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<0.0200		0.0200		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<0.0040		0.0040		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<0.0030		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEESA)	<0.0030		0.0030		ug/L		08/18/23 06:19	08/22/23 23:20	1

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C3 HFPO-DA	*90*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C4 PFBA	*92*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C3 PFBS	*94*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C5 PFPeA	*95*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C5 PFHxA	*94*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C4 PFHpA	*90*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C8 PFOA	*94*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C9 PFNA	*103*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C6 PFDA	*94*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C7 PFUnA	*83*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C2 PFDoA	*86*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*

Client Sample ID: 3602 Cobb Pkwy/ Cobb COunty Water System
Lab Sample ID: 810-72815-1

Date Collected: 08/07/23 10:22
Matrix: Drinking Water
Date Received: 08/08/23 09:00
PWSID Number: GA0670003

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

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C8 PFOS	*92*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C3 PFHxS	*92*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C2-4:2-FTS	*89*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C2-6:2-FTS	*96*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*
13C2-8:2-FTS	*95*		*50 - 200*	*08/18/23 06:19*	*08/22/23 23:20*	*1*

Method: EPA 537.1 UCMR5 - Perfluorinated Alkyl Acids (LC/MS)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<0.0047		0.0047	ug/L		08/15/23 08:24	08/16/23 03:11	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<0.0056		0.0056	ug/L		08/15/23 08:24	08/16/23 03:11	1
Perfluorotetradecanoic acid (PFTA)	<0.0075		0.0075	ug/L		08/15/23 08:24	08/16/23 03:11	1
Perfluorotridecanoic acid (PFTrDA)	<0.0065		0.0065	ug/L		08/15/23 08:24	08/16/23 03:11	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
d5-NEtFOSAA	*107*		*70 - 130*	*08/15/23 08:24*	*08/16/23 03:11*	*1*
13C2 PFHxA	*100*		*70 - 130*	*08/15/23 08:24*	*08/16/23 03:11*	*1*
13C2 PFDA	*119*		*70 - 130*	*08/15/23 08:24*	*08/16/23 03:11*	*1*
13C3 HFPO-DA	*104*		*70 - 130*	*08/15/23 08:24*	*08/16/23 03:11*	*1*

Method: EPA 200.7 UCMR5 - Metals (ICP)

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Lithium	<9.00		9.00	ug/L		08/11/23 12:20	08/14/23 12:47	1

Client Sample ID: 3602 Cobb Pkwy/ Cobb COunty Water System
Lab Sample ID: 810-72815-1FRB

Date Collected: 08/07/23 10:22
Matrix: Drinking Water
Date Received: 08/08/23 09:00
PWSID Number: GA0670003

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

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	<0.0005		0.0050	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluoropentanoic acid (PFPeA)	<0.0004		0.0030	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluorohexanoic acid (PFHxA)	<0.0004		0.0030	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluoroheptanoic acid (PFHpA)	<0.0004		0.0030	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluorooctanoic acid (PFOA)	<0.0004		0.0040	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluorononanoic acid (PFNA)	<0.0004		0.0040	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluorodecanoic acid (PFDA)	<0.0004		0.0030	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluoroundecanoic acid (PFUnA)	<0.0004		0.0020	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluorododecanoic acid (PFDoA)	<0.0004		0.0030	ug/L		08/24/23 07:44	08/26/23 06:07	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<0.0004		0.0030	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluorobutanesulfonic acid (PFBS)	<0.0004		0.0030	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluorohexanesulfonic acid (PFHxS)	<0.0004		0.0030	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluoroheptanesulfonic acid (PFHpS)	<0.0004		0.0030	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluorooctanesulfonic acid (PFOS)	**0.0012**	**>M**	0.0040	ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluoropentanesulfonic acid (PFPeS)	<0.0004		0.0040	ug/L		08/24/23 07:44	08/26/23 06:07	1

Client: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

Client Sample ID: 3602 Cobb Pkwy/ Cobb COunty Water System
Lab Sample ID: 810-72815-1FRB
Date Collected: 08/07/23 10:22
Matrix: Drinking Water
Date Received: 08/08/23 09:00
PWSID Number: GA0670003

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA)	<0.0005		0.0050		ug/L		08/24/23 07:44	08/26/23 06:07	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid	<0.0005		0.0020		ug/L		08/24/23 07:44	08/26/23 06:07	1
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid	<0.0005		0.0050		ug/L		08/24/23 07:44	08/26/23 06:07	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<0.0006		0.0030		ug/L		08/24/23 07:44	08/26/23 06:07	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<0.0007		0.0050		ug/L		08/24/23 07:44	08/26/23 06:07	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<0.0006		0.0050		ug/L		08/24/23 07:44	08/26/23 06:07	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<0.0009		0.0200		ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<0.0003		0.0040		ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<0.0004		0.0030		ug/L		08/24/23 07:44	08/26/23 06:07	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEESA)	<0.0005		0.0030		ug/L		08/24/23 07:44	08/26/23 06:07	1

Isotope Dilution	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C3 HFPO-DA	*113*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C4 PFBA	*119*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C3 PFBS	*117*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C5 PFPeA	*119*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C5 PFHxA	*122*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C4 PFHpA	*118*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C8 PFOA	*122*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C9 PFNA	*129*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C6 PFDA	*121*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C7 PFUnA	*123*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C2 PFDoA	*119*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C8 PFOS	*120*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C3 PFHxS	*116*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C2-4:2-FTS	*128*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C2-6:2-FTS	*143*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*
13C2-8:2-FTS	*130*		*50 - 200*	*08/24/23 07:44*	*08/26/23 06:07*	*1*

Surrogate Summary

Client: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

Method: 537.1 UCMR5 - Perfluorinated Alkyl Acids (LC/MS)

Matrix: Drinking Water
Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)			
		d5NEFOS	PFHxA	PFDA	HFPODA
Lab Sample ID	Client Sample ID	(70-130)	(70-130)	(70-130)	(70-130)
810-72815-1	3602 Cobb Pkwy/ Cobb COunty	107	100	119	104
LLCS 810-69647/2-A	Lab Control Sample	112	108	118	106
MBL 810-69647/1-A	Method Blank	106	123	123	115

Surrogate Legend

d5NEFOS = d5-NEtFOSAA
PFHxA = 13C2 PFHxA
PFDA = 13C2 PFDA
HFPODA = 13C3 HFPO-DA

Isotope Dilution Summary

Client: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

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

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

		Percent Isotope Dilution Recovery (Acceptance Limits)							
Lab Sample ID	Client Sample ID	HFPODA (50-200)	PFBA (50-200)	C3PFBS (50-200)	PFPeA (50-200)	13C5PHA (50-200)	C4PFHA (50-200)	C8PFOA (50-200)	C9PFNA (50-200)
810-72815-1	3602 Cobb Pkwy/ Cobb COunty	90	92	94	95	94	90	94	103
810-72815-1 LMS	3602 Cobb Pkwy/ Cobb COunty Water System	83	94	95	98	94	91	95	104
810-72815-1 LMSD	3602 Cobb Pkwy/ Cobb COunty Water System	86	93	92	96	93	89	94	103
810-72815-1FRB	FRB	113	119	117	119	122	118	122	129
LLCS 810-70210/2-A	Lab Control Sample	91	96	96	91	98	91	95	104
MBL 810-70210/1-A	Method Blank	83	94	95	91	97	89	95	102

		Percent Isotope Dilution Recovery (Acceptance Limits)							
Lab Sample ID	Client Sample ID	C6PFDA (50-200)	13C7PUA (50-200)	PFDoA (50-200)	C8PFOS (50-200)	C3PFHS (50-200)	42FTS (50-200)	62FTS (50-200)	82FTS (50-200)
810-72815-1	3602 Cobb Pkwy/ Cobb COunty	94	83	86	92	92	89	96	95
810-72815-1 LMS	3602 Cobb Pkwy/ Cobb COunty Water System	93	84	85	93	92	89	97	93
810-72815-1 LMSD	3602 Cobb Pkwy/ Cobb COunty Water System	91	82	83	91	91	87	94	90
810-72815-1FRB	FRB	121	123	119	120	116	128	143	130
LLCS 810-70210/2-A	Lab Control Sample	94	85	88	93	93	81	91	92
MBL 810-70210/1-A	Method Blank	92	83	86	91	92	83	91	90

Surrogate Legend

HFPODA = 13C3 HFPO-DA
PFBA = 13C4 PFBA
C3PFBS = 13C3 PFBS
PFPeA = 13C5 PFPeA
13C5PHA = 13C5 PFHxA
C4PFHA = 13C4 PFHpA
C8PFOA = 13C8 PFOA
C9PFNA = 13C9 PFNA
C6PFDA = 13C6 PFDA
13C7PUA = 13C7 PFUnA
PFDoA = 13C2 PFDoA
C8PFOS = 13C8 PFOS
C3PFHS = 13C3 PFHxS
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

Lab Sample ID: MBL 810-70210/1-A
Matrix: Drinking Water
Analysis Batch: 70442

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 70210

Analyte	MBL Result	MBL Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Perfluorobutanoic acid (PFBA)	<0.0005		0.0050		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluoropentanoic acid (PFPeA)	<0.0004		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluorohexanoic acid (PFHxA)	<0.0004		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluoroheptanoic acid (PFHpA)	<0.0004		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluorooctanoic acid (PFOA)	<0.0004		0.0040		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluorononanoic acid (PFNA)	<0.0004		0.0040		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluorodecanoic acid (PFDA)	<0.0004		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluoroundecanoic acid (PFUnA)	<0.0004		0.0020		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluorododecanoic acid (PFDoA)	<0.0004		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<0.0004		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluorobutanesulfonic acid (PFBS)	<0.0004		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluorohexanesulfonic acid (PFHxS)	<0.0004		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluoroheptanesulfonic acid (PFHpS)	<0.0004		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluorooctanesulfonic acid (PFOS)	<0.0004		0.0040		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluoropentanesulfonic acid (PFPeS)	<0.0004		0.0040		ug/L		08/18/23 06:19	08/22/23 22:53	1
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA)	<0.0005		0.0050		ug/L		08/18/23 06:19	08/22/23 22:53	1
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid	<0.0005		0.0020		ug/L		08/18/23 06:19	08/22/23 22:53	1
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid	<0.0005		0.0050		ug/L		08/18/23 06:19	08/22/23 22:53	1
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<0.0006		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<0.0007		0.0050		ug/L		08/18/23 06:19	08/22/23 22:53	1
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<0.0006		0.0050		ug/L		08/18/23 06:19	08/22/23 22:53	1
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<0.0009		0.0200		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluoro-3-methoxypropanoic acid (PFMPA)	<0.0003		0.0040		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluoro-4-methoxybutanoic acid (PFMBA)	<0.0004		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1
Perfluoro (2-ethoxyethane) sulfonic acid (PFEESA)	<0.0005		0.0030		ug/L		08/18/23 06:19	08/22/23 22:53	1

Isotope Dilution	*MBL %Recovery*	*MBL Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
13C3 HFPO-DA	*83*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*
13C4 PFBA	*94*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*
13C3 PFBS	*95*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*
13C5 PFPeA	*91*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*
13C5 PFHxA	*97*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*
13C4 PFHpA	*89*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*
13C8 PFOA	*95*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*
13C9 PFNA	*102*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*
13C6 PFDA	*92*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*
13C7 PFUnA	*83*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*
13C2 PFDoA	*86*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*
13C8 PFOS	*91*		*50 - 200*	*08/18/23 06:19*	*08/22/23 22:53*	*1*

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

Lab Sample ID: MBL 810-70210/1-A
Matrix: Drinking Water
Analysis Batch: 70442

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 70210

Isotope Dilution	MBL %Recovery	MBL Qualifier	Limits	Prepared	Analyzed	Dil Fac
13C3 PFHxS	92		50 - 200	08/18/23 06:19	08/22/23 22:53	1
13C2-4:2-FTS	83		50 - 200	08/18/23 06:19	08/22/23 22:53	1
13C2-6:2-FTS	91		50 - 200	08/18/23 06:19	08/22/23 22:53	1
13C2-8:2-FTS	90		50 - 200	08/18/23 06:19	08/22/23 22:53	1

Lab Sample ID: LLCS 810-70210/2-A
Matrix: Drinking Water
Analysis Batch: 70442

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 70210

Analyte	Spike Added	LLCS Result	LLCS Qualifier	Unit	D	%Rec	%Rec Limits
Perfluorobutanoic acid (PFBA)	0.00200	0.0018		ug/L		91	50 - 150
Perfluoropentanoic acid (PFPeA)	0.00200	0.0018		ug/L		88	50 - 150
Perfluorohexanoic acid (PFHxA)	0.00200	0.0017		ug/L		85	50 - 150
Perfluoroheptanoic acid (PFHpA)	0.00200	0.0018		ug/L		88	50 - 150
Perfluorooctanoic acid (PFOA)	0.00200	0.0018		ug/L		91	50 - 150
Perfluorononanoic acid (PFNA)	0.00200	0.0017		ug/L		86	50 - 150
Perfluorodecanoic acid (PFDA)	0.00200	0.0018		ug/L		88	50 - 150
Perfluoroundecanoic acid (PFUnA)	0.00200	0.0017		ug/L		85	50 - 150
Perfluorododecanoic acid (PFDoA)	0.00200	0.0019		ug/L		94	50 - 150
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	0.00189	0.0016		ug/L		87	50 - 150
Perfluorobutanesulfonic acid (PFBS)	0.00178	0.0015		ug/L		86	50 - 150
Perfluorohexanesulfonic acid (PFHxS)	0.00183	0.0015		ug/L		83	50 - 150
Perfluoroheptanesulfonic acid (PFHpS)	0.00191	0.0017		ug/L		91	50 - 150
Perfluorooctanesulfonic acid (PFOS)	0.00186	0.0016		ug/L		85	50 - 150
Perfluoropentanesulfonic acid (PFPeS)	0.00188	0.0017		ug/L		88	50 - 150
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA)	0.00200	0.0017		ug/L		86	50 - 150
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid	0.00187	0.0015		ug/L		80	50 - 150
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid	0.00189	0.0016		ug/L		84	50 - 150
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	0.00188	0.0019		ug/L		99	50 - 150
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	0.00190	0.0018		ug/L		97	50 - 150
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	0.00192	0.0019		ug/L		97	50 - 150
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	0.00200	0.0011		ug/L		54	50 - 150
Perfluoro-3-methoxypropanoic acid (PFMPA)	0.00200	0.0016		ug/L		79	50 - 150
Perfluoro-4-methoxybutanoic acid (PFMBA)	0.00200	0.0017		ug/L		86	50 - 150
Perfluoro (2-ethoxyethane) sulfonic acid (PFEESA)	0.00178	0.0015		ug/L		86	50 - 150

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

Isotope Dilution	LLCS %Recovery	LLCS Qualifier	Limits
13C3 HFPO-DA	91		50 - 200
13C4 PFBA	96		50 - 200
13C3 PFBS	96		50 - 200
13C5 PFPeA	91		50 - 200
13C5 PFHxA	98		50 - 200
13C4 PFHpA	91		50 - 200
13C8 PFOA	95		50 - 200
13C9 PFNA	104		50 - 200
13C6 PFDA	94		50 - 200
13C7 PFUnA	85		50 - 200
13C2 PFDoA	88		50 - 200
13C8 PFOS	93		50 - 200
13C3 PFHxS	93		50 - 200
13C2-4:2-FTS	81		50 - 200
13C2-6:2-FTS	91		50 - 200
13C2-8:2-FTS	92		50 - 200

Lab Sample ID: 810-72815-1 LMS **Client Sample ID: 3602 Cobb Pkwy/ Cobb COunty Water System**
Matrix: Drinking Water **Prep Type: Total/NA**
Analysis Batch: 70442 **Prep Batch: 70210**

Analyte	Sample Result	Sample Qualifier	Spike Added	LMS Result	LMS Qualifier	Unit	D	%Rec	%Rec Limits
Perfluorobutanoic acid (PFBA)	0.0065		0.00200	0.0079		ug/L		71	
Perfluoropentanoic acid (PFPeA)	<0.0030		0.00200	0.0044		ug/L		80	
Perfluorohexanoic acid (PFHxA)	<0.0030		0.00200	0.0040		ug/L		77	
Perfluoroheptanoic acid (PFHpA)	<0.0030		0.00200	0.0027		ug/L		84	
Perfluorooctanoic acid (PFOA)	<0.0040		0.00200	0.0036		ug/L		80	
Perfluorononanoic acid (PFNA)	<0.0040		0.00200	0.0021		ug/L		105	
Perfluorodecanoic acid (PFDA)	<0.0030		0.00200	0.0019		ug/L		97	
Perfluoroundecanoic acid (PFUnA)	<0.0020		0.00200	0.0018		ug/L		89	
Perfluorododecanoic acid (PFDoA)	<0.0030		0.00200	0.0018		ug/L		90	
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<0.0030		0.00189	0.0016		ug/L		85	
Perfluorobutanesulfonic acid (PFBS)	0.0031		0.00178	0.0045		ug/L		78	
Perfluorohexanesulfonic acid (PFHxS)	<0.0030		0.00183	0.0024		ug/L		82	
Perfluoroheptanesulfonic acid (PFHpS)	<0.0030		0.00191	0.0017		ug/L		91	
Perfluorooctanesulfonic acid (PFOS)	<0.0040		0.00186	0.0034		ug/L		60	
Perfluoropentanesulfonic acid (PFPeS)	<0.0040		0.00188	0.0018		ug/L		96	
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA)	<0.0050		0.00200	0.0018		ug/L		91	
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid	<0.0020		0.00187	0.0014		ug/L		77	
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid	<0.0050		0.00189	0.0015		ug/L		77	
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<0.0030		0.00188	0.0018		ug/L		97	
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<0.0050		0.00190	0.0018		ug/L		95	

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

Lab Sample ID: 810-72815-1 LMS
Client Sample ID: 3602 Cobb Pkwy/ Cobb COunty Water System
Matrix: Drinking Water
Prep Type: Total/NA
Analysis Batch: 70442
Prep Batch: 70210

Analyte	Sample Result	Sample Qualifier	Spike Added	LMS Result	LMS Qualifier	Unit	D	%Rec	%Rec Limits
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<0.0050		0.00192	0.0017		ug/L		89	
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<0.0200		0.00200	0.0020		ug/L		99	
Perfluoro-3-methoxypropanoic acid (PFMPA)	<0.0040		0.00200	0.0018		ug/L		88	
Perfluoro-4-methoxybutanoic acid (PFMBA)	<0.0030		0.00200	0.0017		ug/L		83	
Perfluoro (2-ethoxyethane) sulfonic acid (PFEESA)	<0.0030		0.00178	0.0015		ug/L		85	

Isotope Dilution	*LMS %Recovery*	*LMS Qualifier*	*Limits*
13C3 HFPO-DA	*83*		*50 - 200*
13C4 PFBA	*94*		*50 - 200*
13C3 PFBS	*95*		*50 - 200*
13C5 PFPeA	*98*		*50 - 200*
13C5 PFHxA	*94*		*50 - 200*
13C4 PFHpA	*91*		*50 - 200*
13C8 PFOA	*95*		*50 - 200*
13C9 PFNA	*104*		*50 - 200*
13C6 PFDA	*93*		*50 - 200*
13C7 PFUnA	*84*		*50 - 200*
13C2 PFDoA	*85*		*50 - 200*
13C8 PFOS	*93*		*50 - 200*
13C3 PFHxS	*92*		*50 - 200*
13C2-4:2-FTS	*89*		*50 - 200*
13C2-6:2-FTS	*97*		*50 - 200*
13C2-8:2-FTS	*93*		*50 - 200*

Lab Sample ID: 810-72815-1 LMSD
Client Sample ID: 3602 Cobb Pkwy/ Cobb COunty Water System
Matrix: Drinking Water
Prep Type: Total/NA
Analysis Batch: 70442
Prep Batch: 70210

Analyte	Sample Result	Sample Qualifier	Spike Added	LMSD Result	LMSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Perfluorobutanoic acid (PFBA)	0.0065		0.00200	0.0085		ug/L		103		8	
Perfluoropentanoic acid (PFPeA)	<0.0030		0.00200	0.0044		ug/L		79		1	
Perfluorohexanoic acid (PFHxA)	<0.0030		0.00200	0.0041		ug/L		84		4	
Perfluoroheptanoic acid (PFHpA)	<0.0030		0.00200	0.0027		ug/L		83		1	
Perfluorooctanoic acid (PFOA)	<0.0040		0.00200	0.0037		ug/L		82		1	
Perfluorononanoic acid (PFNA)	<0.0040		0.00200	0.0021		ug/L		104		1	
Perfluorodecanoic acid (PFDA)	<0.0030		0.00200	0.0020		ug/L		100		2	
Perfluoroundecanoic acid (PFUnA)	<0.0020		0.00200	0.0018		ug/L		90		2	
Perfluorododecanoic acid (PFDoA)	<0.0030		0.00200	0.0017		ug/L		87		3	
4,8-Dioxa-3H-perfluorononanoic acid (ADONA)	<0.0030		0.00189	0.0016		ug/L		84		1	
Perfluorobutanesulfonic acid (PFBS)	0.0031		0.00178	0.0046		ug/L		84		2	
Perfluorohexanesulfonic acid (PFHxS)	<0.0030		0.00183	0.0024		ug/L		81		1	

Client: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

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

Lab Sample ID: 810-72815-1 LMSD
Client Sample ID: 3602 Cobb Pkwy/ Cobb COunty Water System
Matrix: Drinking Water
Prep Type: Total/NA
Analysis Batch: 70442
Prep Batch: 70210

Analyte	Sample Result	Sample Qualifier	Spike Added	LMSD Result	LMSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Perfluoroheptanesulfonic acid (PFHpS)	<0.0030		0.00191	0.0018		ug/L		92		1	
Perfluorooctanesulfonic acid (PFOS)	<0.0040		0.00186	0.0032		ug/L		51		5	
Perfluoropentanesulfonic acid (PFPeS)	<0.0040		0.00188	0.0019		ug/L		100		3	
Hexafluoropropylene Oxide Dimer Acid (HFPO-DA)	<0.0050		0.00200	0.0019		ug/L		94		3	
9-Chlorohexadecafluoro-3-oxanonane-1-sulfonic acid	<0.0020		0.00187	0.0014		ug/L		75		3	
11-Chloroeicosafluoro-3-oxaundecane-1-sulfonic acid	<0.0050		0.00189	0.0014		ug/L		75		2	
1H,1H,2H,2H-Perfluorohexane sulfonic acid (4:2 FTS)	<0.0030		0.00188	0.0018		ug/L		95		2	
1H,1H,2H,2H-Perfluorooctane sulfonic acid (6:2 FTS)	<0.0050		0.00190	0.0018		ug/L		94		1	
1H,1H,2H,2H-Perfluorodecane sulfonic acid (8:2 FTS)	<0.0050		0.00192	0.0018		ug/L		93		4	
Nonafluoro-3,6-dioxaheptanoic acid (NFDHA)	<0.0200		0.00200	0.0019		ug/L		94		5	
Perfluoro-3-methoxypropanoic acid (PFMPA)	<0.0040		0.00200	0.0018		ug/L		89		1	
Perfluoro-4-methoxybutanoic acid (PFMBA)	<0.0030		0.00200	0.0017		ug/L		86		3	
Perfluoro (2-ethoxyethane) sulfonic acid (PFEESA)	<0.0030		0.00178	0.0016		ug/L		89		5	

Isotope Dilution	*LMSD %Recovery*	*LMSD Qualifier*	*Limits*
13C3 HFPO-DA	*86*		*50 - 200*
13C4 PFBA	*93*		*50 - 200*
13C3 PFBS	*92*		*50 - 200*
13C5 PFPeA	*96*		*50 - 200*
13C5 PFHxA	*93*		*50 - 200*
13C4 PFHpA	*89*		*50 - 200*
13C8 PFOA	*94*		*50 - 200*
13C9 PFNA	*103*		*50 - 200*
13C6 PFDA	*91*		*50 - 200*
13C7 PFUnA	*82*		*50 - 200*
13C2 PFDoA	*83*		*50 - 200*
13C8 PFOS	*91*		*50 - 200*
13C3 PFHxS	*91*		*50 - 200*
13C2-4:2-FTS	*87*		*50 - 200*
13C2-6:2-FTS	*94*		*50 - 200*
13C2-8:2-FTS	*90*		*50 - 200*

Method: 537.1 UCMR5 - Perfluorinated Alkyl Acids (LC/MS)

Lab Sample ID: MBL 810-69647/1-A
Matrix: Drinking Water
Analysis Batch: 69735

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 69647

Analyte	MBL Result	MBL Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)	<0.0005		0.0050		ug/L		08/15/23 08:24	08/16/23 00:21	1
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)	<0.0006		0.0060		ug/L		08/15/23 08:24	08/16/23 00:21	1
Perfluorotetradecanoic acid (PFTA)	<0.0007		0.0080		ug/L		08/15/23 08:24	08/16/23 00:21	1
Perfluorotridecanoic acid (PFTrDA)	<0.0006		0.0070		ug/L		08/15/23 08:24	08/16/23 00:21	1

Surrogate	*MBL %Recovery*	*MBL Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
d5-NEtFOSAA	*106*		*70 - 130*	*08/15/23 08:24*	*08/16/23 00:21*	*1*
13C2 PFHxA	*123*		*70 - 130*	*08/15/23 08:24*	*08/16/23 00:21*	*1*
13C2 PFDA	*123*		*70 - 130*	*08/15/23 08:24*	*08/16/23 00:21*	*1*
13C3 HFPO-DA	*115*		*70 - 130*	*08/15/23 08:24*	*08/16/23 00:21*	*1*

Lab Sample ID: LLCS 810-69647/2-A
Matrix: Drinking Water
Analysis Batch: 69735

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 69647

Analyte			Spike Added	LLCS Result	LLCS Qualifier	Unit	D	%Rec	%Rec Limits		
N-ethylperfluorooctanesulfonamidoacetic acid (NEtFOSAA)			0.00200	0.0020		ug/L		102	50 - 150		
N-methylperfluorooctanesulfonamidoacetic acid (NMeFOSAA)			0.00200	0.0019		ug/L		93	50 - 150		
Perfluorotetradecanoic acid (PFTA)			0.00200	0.0013		ug/L		63	50 - 150		
Perfluorotridecanoic acid (PFTrDA)			0.00200	0.0019		ug/L		94	50 - 150		

Surrogate	*LLCS %Recovery*	*LLCS Qualifier*	*Limits*
d5-NEtFOSAA	*112*		*70 - 130*
13C2 PFHxA	*108*		*70 - 130*
13C2 PFDA	*118*		*70 - 130*
13C3 HFPO-DA	*106*		*70 - 130*

Method: 200.7 UCMR5 - Metals (ICP)

Lab Sample ID: MBL 810-69368/1-A
Matrix: Drinking Water
Analysis Batch: 69538

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 69368

Analyte	MBL Result	MBL Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Lithium	<0.520		9.00		ug/L		08/11/23 12:20	08/14/23 12:02	1

Lab Sample ID: LLCS 810-69368/2-A
Matrix: Drinking Water
Analysis Batch: 69538

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 69368

Analyte			Spike Added	LLCS Result	LLCS Qualifier	Unit	D	%Rec	%Rec Limits		
Lithium			9.00	9.51		ug/L		106	50 - 150		

QC Association Summary

Client: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

LCMS

Prep Batch: 69647

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
810-72815-1	3602 Cobb Pkwy/ Cobb COunty Water System	Total/NA	Drinking Water	537.1 DW	
MBL 810-69647/1-A	Method Blank	Total/NA	Drinking Water	537.1 DW	
LLCS 810-69647/2-A	Lab Control Sample	Total/NA	Drinking Water	537.1 DW	

Analysis Batch: 69735

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
810-72815-1	3602 Cobb Pkwy/ Cobb COunty Water System	Total/NA	Drinking Water	537.1 UCMR5	69647
MBL 810-69647/1-A	Method Blank	Total/NA	Drinking Water	537.1 UCMR5	69647
LLCS 810-69647/2-A	Lab Control Sample	Total/NA	Drinking Water	537.1 UCMR5	69647

Prep Batch: 70210

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
810-72815-1	3602 Cobb Pkwy/ Cobb COunty Water System	Total/NA	Drinking Water	533	
MBL 810-70210/1-A	Method Blank	Total/NA	Drinking Water	533	
LLCS 810-70210/2-A	Lab Control Sample	Total/NA	Drinking Water	533	
810-72815-1 LMS	3602 Cobb Pkwy/ Cobb COunty Water System	Total/NA	Drinking Water	533	
810-72815-1 LMSD	3602 Cobb Pkwy/ Cobb COunty Water System	Total/NA	Drinking Water	533	

Analysis Batch: 70442

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
810-72815-1	3602 Cobb Pkwy/ Cobb COunty Water System	Total/NA	Drinking Water	533	70210
MBL 810-70210/1-A	Method Blank	Total/NA	Drinking Water	533	70210
LLCS 810-70210/2-A	Lab Control Sample	Total/NA	Drinking Water	533	70210
810-72815-1 LMS	3602 Cobb Pkwy/ Cobb COunty Water System	Total/NA	Drinking Water	533	70210
810-72815-1 LMSD	3602 Cobb Pkwy/ Cobb COunty Water System	Total/NA	Drinking Water	533	70210

Prep Batch: 70933

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
810-72815-1FRB	FRB	Total/NA	Drinking Water	533	

Analysis Batch: 71019

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
810-72815-1FRB	FRB	Total/NA	Drinking Water	533	70933

Metals

Prep Batch: 69368

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
810-72815-1	3602 Cobb Pkwy/ Cobb COunty Water System	Total/NA	Drinking Water	200.7 UCMR5	
MBL 810-69368/1-A	Method Blank	Total/NA	Drinking Water	200.7 UCMR5	
LLCS 810-69368/2-A	Lab Control Sample	Total/NA	Drinking Water	200.7 UCMR5	

Analysis Batch: 69538

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
810-72815-1	3602 Cobb Pkwy/ Cobb COunty Water System	Total/NA	Drinking Water	200.7 UCMR5	69368
MBL 810-69368/1-A	Method Blank	Total/NA	Drinking Water	200.7 UCMR5	69368
LLCS 810-69368/2-A	Lab Control Sample	Total/NA	Drinking Water	200.7 UCMR5	69368

Lab Chronicle

Client: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

Client Sample ID: 3602 Cobb Pkwy/ Cobb COunty Water System

Lab Sample ID: 810-72815-1

Date Collected: 08/07/23 10:22
Matrix: Drinking Water
Date Received: 08/08/23 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	533			70210	TK	EA SB	08/18/23 06:19
Total/NA	Analysis	533		1	70442	KB	EA SB	08/22/23 23:20
Total/NA	Prep	537.1 DW			69647	SS	EA SB	08/15/23 08:24
Total/NA	Analysis	537.1 UCMR5		1	69735	PP	EA SB	08/16/23 03:11
Total/NA	Prep	200.7 UCMR5			69368	NB	EA SB	08/11/23 12:20
Total/NA	Analysis	200.7 UCMR5		1	69538	NB	EA SB	08/14/23 12:47

Laboratory References:

EA SB = Eurofins Eaton Analytical South Bend, 110 S Hill Street, South Bend, IN 46617, TEL (574)233-4777

Accreditation/Certification Summary

Client: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

Laboratory: Eurofins Eaton Analytical South Bend

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

Authority	Program	Identification Number	Expiration Date
Georgia (DW)	State	929	06-30-24

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

Analysis Method	Prep Method	Matrix	Analyte
200.7 UCMR5	200.7 UCMR5	Drinking Water	Lithium

Method Summary

Client: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

Method	Method Description	Protocol	Laboratory
533	Perfluorinated and Polyfluorinated Alkyl Substances in Drinking Water	EPA	EA SB
537.1 UCMR5	Perfluorinated Alkyl Acids (LC/MS)	EPA	EA SB
200.7 UCMR5	Metals (ICP)	EPA	EA SB
200.7 UCMR5	Preparation, Total Recoverable Metals	EPA	EA SB
533	Extraction of Perfluorinated and Polyfluorinated Alkyl Acids	EPA	EA SB
537.1 DW	Extraction of Perfluorinated Alkyl Acids	EPA	EA SB

Protocol References:

EPA = US Environmental Protection Agency

Laboratory References:

EA SB = Eurofins Eaton Analytical South Bend, 110 S Hill Street, South Bend, IN 46617, TEL (574)233-4777

Sample Summary

Client: Cobb County Water System
Job ID: 810-72815-1
Project/Site: UCMR5 - GA0670003 - SE1 -Cobb County

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	PWSID Number
810-72815-1	3602 Cobb Pkwy/ Cobb COunty Water System	Drinking Water	08/07/23 10:22	08/08/23 09:00	GA0670003
810-72815-1FRB	3602 Cobb Pkwy/ Cobb COunty Water System	Drinking Water	08/07/23 10:22	08/08/23 09:00	GA0670003

South Bend, IN
110 S Hill Street
South Bend, IN 46617
Phone (574) 233-4777; Phone (574) 233-8207

UCMR 5 Sampling Form for Single Collection Site
(Separate form is needed for each collection site)

eurofins | Environment Testing America

Company Contact: Jesse LeBoeuf
Company Name: Cobb County Water System
Company Address: 680 South Cobb Drive
Marietta, GA 30060
Phone: 770-419-6361
Email: Jesse.LeBoeuf@cobbcounty.org
Purchase Order:

Lab PM(name): Pamela Brown
PM Email:
EEA Project: 81005692

PWSID: GA0670003
FacID:
SPID:
FacName: Cobb County Water System
SPName:
Sampling Event: UCMR5 - 1st Sample

Water System Name: Cobb County Water System
Collection Location: 3002 Cobb Pkwy.
Scheduled Collection Date: 8/7/2023

PJ# 81005692

Sampler Name (Print): Jesse LeBoeuf

Date/Time Sampled: 8/7/2023 1422 Time taken from both 2 on 8/8/23

Client Storage temp, if > 2 days from collection: N/A

AREA BELOW FOR LAB US

For UCMR 5 specific criteria see: REC-WI55108 Guidance Document for UCMR 5 Sample ... UCMR 5 QAPP

IR Gun#: 29 | Ice: Wet / Blue

Method	Type	# Bot	Temp °C (10°C within 2 days of collection, 6°C for > 2 days) Initial / Corrected	pH* value	✓if receipt pH acceptable	✓if pH needs adjustment	Cl (P/A) **	Sample Comments	✓if sample is invalid
200.7	FS	1	[redacted]				[redacted]		
200.7	FS	2	[redacted]				[redacted]		
533	FS	1	1.2 / 1.4		✓		A		
533	FS	2	/		✓		A		
533	FS	3	/		✓		A		
533	FRB	1	1.4 / 1.6		✓		A		
537.1	FS	1	1.8 / 1.0		✓	[redacted]	A		
537.1	FS	2	/		✓		A		
537.1	FS	3	/		✓		A		
537.1	FRB	1	1.2 / 1.4		✓		A		

* pH <2 for 200.7. pH 6-8 for 533 & 537.1. *Note: 200.7 & 533 pH may be adjusted upon receipt.*
** A = Absent if Free Cl <0.1 mg/L; P = Chlorine is present

Received By [signature] **Date/Time** 8/8/23 0900

Login Sample Receipt Checklist

Client: Cobb County Water System

Job Number: 810-72815-1

Login Number: 72815
List Number: 1
Creator: Moore, Gary

List Source: Eurofins Eaton Analytical South Bend

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
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	
Samples do not require splitting or compositing.	True	
Container provided by EEA	True	