

Chemical Analysis Report

SW-DIST-2021-06-03-01

Florida Department of Environmental Protection
Central Laboratory
2600 Blair Stone Road
Tallahassee, FL 32399-2400
DOH Accreditation E31780

Event Description: **LVI Lake Manatees**
Request ID: **RQ-2021-05-31-62**
Customer: **SW-DIST**
Project ID: **SMP**

Send Reports to:
FL Dept. of Environmental Protection
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Certified by: Liang Lin, Environmental Administrator

Date Certified: 28-JUN-2021 10:46

A handwritten signature in black ink, appearing to read "Liang Lin", is shown on a light-colored background.

Case Narrative

Unless otherwise noted, all samples included in this report were received in accordance with protocols referenced in Chapter 62-160, Florida Administrative Code (F.A.C.). Results published in this report pertain only to the samples as submitted to, and received by the laboratory. All times in this report are adjusted to the applicable Eastern Time Zone (EST or EDT).

Results for the following analytical group are included in this report: Nutrients.

Scientific notation may be used in reporting very large or small values. Values reported using scientific notation will take the form of the following example: 1.3E+03, which is equivalent to 1.3×10^3 or 1300.

Unless otherwise noted, analytical values for soil and sediment samples are reported on a dry weight basis, and analytical values for waste and tissue samples are reported on a wet weight basis.

Results for TNI accredited tests met requirements established by The NELAC Institute. A double asterisk (**) is used to indicate an analyte/matrix/method for which the laboratory is not TNI accredited by the Florida Department of Health Environmental Laboratory Certification Program or where accreditation for that field of testing is not applicable.

Any significant anomalies or deviations from established protocols are documented in Non-Conformance Reports, which, where appropriate, are included within this analytical report. Additional comments related to specific analytical tests may be included as remarks following the analytical results for each sample. Such comments and remarks are for informational purposes only and are not intended to convey judgement about the usability of the reported data.

A quality control report on the performance of the test method for the submitted samples is included. Uncertainty associated with the analytical results contained in this report can be estimated from the reported quality assurance results and from published quality control acceptance limits for each analytical test. Matrix quality control results (matrix spike recoveries and matrix sample precision) pertain only to the matrix sample tested and do not necessarily reflect test method performance for other samples.

Typical matrix quality control (QC) measurements may include matrix spike recovery, matrix spike duplicate recovery, matrix spike precision and matrix sample precision. Not all matrix QC results may be available or reportable; where they are not an explanation is provided. Typical reasons for unavailable QC results include, but are not limited to, a) insufficient matrix sample to perform some or all QC measurements; b) analyte concentration in the sample replicated was too low for a meaningful measurement of precision and c) analyte concentration in the matrix sample spiked was too high (relative to the amount of analyte spiked) for a meaningful measurement of recovery. Where matrix QC results are unavailable, other method performance metrics (e.g., LCS recovery, LCS precision, surrogate recovery) may be used to assess performance of the method. Comments explaining any missing QC measurements are not intended to convey any adverse conclusions about the quality of the reported data.

Precision is reported as relative percent difference unless otherwise noted.

Quality Control codes as defined below may be used in this report to indicate results that are associated with one or more quality control elements which did not fall within established test method criteria. Such results may be qualified as estimates using a J qualifier as required by 62-160 F.A.C. Explanations are included in the report for any results that were reported as estimates for other reasons.

QC Codes used in this report may include:

- LCS – Recovery for the batch Laboratory Control Sample (LCS) was outside existing control limits;
- MS – Recovery for the batch matrix spike (MS) was outside existing control limits;
- CCV – Recovery for a continuing calibration verification (CCV) standard was outside existing control limits;
- SUR – Recovery of a surrogate (SUR) for associated analytes was outside existing control limits;
- RPD – The precision, measured as relative percent difference (RPD), of batch replicate measurements was outside existing control limits;
- RSD – The precision, measured as relative standard deviation (RSD), of batch replicate measurements was outside existing control limits;
- SMP – Sample - used precision derived from replicate analyses of a sample;

The following data qualifiers are used, where applicable, in this report as specified in 62-160 F.A.C.

- A - Value reported is the mean of two or more determinations.
- B - Results based on colony counts outside the acceptable range.
- I - The reported value is between the laboratory method detection limit and the laboratory practical quantitation limit.
- J - Estimated value and/or the analysis did not meet established quality control criteria.
- K - Actual value is known to be less than value given.
- L - Actual value is known to be greater than value given.
- N - Presumptive evidence of presence of material.
- O - Sampled, but analysis lost or not performed.
- Q - Sample held beyond normal holding time.
- T - Value reported is less than the criterion of detection.
- U - Material was analyzed for but not detected. The reported value is the method detection limit for the sample analyzed.
- V - Analyte was detected in both sample and method blank.
- X - Too few individuals to calculate SCI value.
- Y - The laboratory analysis was from an unpreserved or improperly preserved sample. The data may not be accurate.
- Z - Colonies were too numerous to count (TNTC).

Quality control information from overflow laboratories may not be included in this report. Please refer to the associated report from the overflow laboratory for additional information.

Sample Location: Lake Manatee Reservoir Below SR 64

Collection Date/Time: 06/02/2021 13:50

Field ID: G2SW0122

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2251977	EPA 180.1 Rev. 2.0	Turbidity	2.0		NTU	P399181	
	EPA 300.0 Rev. 2.1	Chloride	17		mg Cl/L	P399478	
		Sulfate	160		mg SO4/L	P399619	
	SM 2120 B-2011	Color (true)	50	A	PCU	P399179	
	SM 2320 B-2011	Total Alkalinity	56		mg CaCO3/L	P399338	
	SM 2540 C-2011	TDS	332	A	mg/L	P399750	
	SM 2540 D-2011	TSS	3	IA	mg/L	P399647	
	SM 4500 F-C-2011	Fluoride	0.38		mg F/L	P399342	
2251979	EPA 350.1 Rev. 2.0	Ammonia-N	0.006		mg N/L	P399414	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.64		mg N/L	P399232	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.004	U	mg N/L	P399290	
	EPA 365.1 Rev. 2.0	Total-P	0.37		mg P/L	P399438	
	SM 5310 B-2011	Organic Carbon	11		mg C/L	P399730	
2251981	EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	0.29		mg P/L	P399172	

Ref. Method and Comment:

SM 2540 D-2011: Batch relative percent difference is unavailable because of low analyte concentration in the QC sample.

Sample Location: Lake Manatee Reservoir @ Middle

Collection Date/Time: 06/02/2021 12:00

Field ID: G2SW0121

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2251978	EPA 180.1 Rev. 2.0	Turbidity	3.0	A	NTU	P399181	
	EPA 300.0 Rev. 2.1	Chloride	15		mg Cl/L	P399478	
		Sulfate	90		mg SO4/L	P399619	
	SM 2120 B-2011	Color (true)	68		PCU	P399179	
	SM 2320 B-2011	Total Alkalinity	43		mg CaCO3/L	P399338	
	SM 2540 C-2011	TDS	224	A	mg/L	P399751	
	SM 2540 D-2011	TSS	3	IA	mg/L	P399648	
	SM 4500 F-C-2011	Fluoride	0.30		mg F/L	P399342	
2251980	EPA 350.1 Rev. 2.0	Ammonia-N	0.006		mg N/L	P399414	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.67		mg N/L	P399232	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.004	U	mg N/L	P399290	
	EPA 365.1 Rev. 2.0	Total-P	0.30		mg P/L	P399287	
	SM 5310 B-2011	Organic Carbon	12		mg C/L	P399730	
2251982	EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	0.24		mg P/L	P399172	

Ref. Method and Comment:

SM 2540 D-2011: Batch relative percent difference is unavailable because of low analyte concentration in the QC sample.

Quality Assurance Report Method Blank Results

Reference Method: EPA 180.1 Rev. 2.0
Batch ID: P399181

Component	Result	Code	Units
Turbidity	0.10	U	NTU

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P399478

Component	Result	Code	Units
Chloride	0.20	U	mg Cl/L

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P399619

Component	Result	Code	Units
Sulfate	0.20	U	mg SO4/L

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P399414

Component	Result	Code	Units
Ammonia-N	0.002	U	mg N/L

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P399232

Component	Result	Code	Units
Kjeldahl Nitrogen	0.080	U	mg N/L

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P399290

Component	Result	Code	Units
NO2NO3-N	0.004	U	mg N/L

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P399287

Component	Result	Code	Units
Total-P	0.002	U	mg P/L

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P399438

Component	Result	Code	Units
Total-P	0.002	U	mg P/L

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Batch ID: P399172

Component	Result	Code	Units
O-Phosphate-P	0.004	U	mg P/L

Quality Assurance Report

Method Blank Results

Reference Method: SM 2120 B-2011
Batch ID: P399179

Component	Result	Code	Units
Color (true)	2.5	U	PCU

Reference Method: SM 2320 B-2011
Batch ID: P399338

Component	Result	Code	Units
Total Alkalinity	0.65	U	mg CaCO ₃ /L

Reference Method: SM 2540 C-2011
Batch ID: P399750

Component	Result	Code	Units
TDS	15	U	mg/L

Reference Method: SM 2540 C-2011
Batch ID: P399751

Component	Result	Code	Units
TDS	15	U	mg/L

Reference Method: SM 2540 D-2011
Batch ID: P399647

Component	Result	Code	Units
TSS	2	U	mg/L

Reference Method: SM 2540 D-2011
Batch ID: P399648

Component	Result	Code	Units
TSS	2	U	mg/L

Reference Method: SM 4500 F-C-2011
Batch ID: P399342

Component	Result	Code	Units
Fluoride	0.035	U	mg F/L

Reference Method: SM 5310 B-2011
Batch ID: P399730

Component	Result	Code	Units
Organic Carbon	0.50	U	mg C/L

Quality Assurance Report

Laboratory Control Sample Accuracy

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P399478

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Chloride	98.1		P	90 - 110

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P399619

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Sulfate	98.1		P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P399414

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Ammonia-N	100		P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P399232

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Kjeldahl Nitrogen	101		P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P399290

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
NO2NO3-N	102		P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P399287

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Total-P	100		P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P399438

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Total-P	102		P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Batch ID: P399172

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
O-Phosphate-P	98.0		P	90 - 110

Reference Method: SM 2120 B-2011
Batch ID: P399179

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Color (true)	101		P	85 - 115

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: SM 2320 B-2011
Batch ID: P399338

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Total Alkalinity	98.1		P	94 - 106

Reference Method: SM 4500 F-C-2011
Batch ID: P399342

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Fluoride	99.5		P	93 - 104

Reference Method: SM 5310 B-2011
Batch ID: P399730

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Organic Carbon	99.9		P	85 - 115

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P399478

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2251761	Chloride	96.5		P	90 - 110
2251977	Chloride	94.0		P	90 - 110

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P399619

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2253303	Sulfate	98.0		P	90 - 110
2253358	Sulfate	97.2		P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P399414

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2251939	Ammonia-N	100	100	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P399232

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2251924	Kjeldahl Nitrogen	96.5	105	P/P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P399290

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2251979	NO2NO3-N	100	100	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P399287

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2251813	Total-P	105	104	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P399438

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2251805	Total-P	102	101	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Batch ID: P399172

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2251935	O-Phosphate-P	99.4	101	P/P	90 - 110

Reference Method: SM 4500 F-C-2011
Batch ID: P399342

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2251710	Fluoride	98.8	98.8	P/P	92 - 107

Quality Assurance Report

Matrix Spike Accuracy

Reference Method: SM 5310 B-2011
Batch ID: P399730

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2251927	Organic Carbon	98.6	98.7	P/P	85 - 115

Quality Assurance Report Precision

Reference Method: EPA 180.1 Rev. 2.0
Batch ID: P399181

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251978	Turbidity	1.00	Sample	P	0 - 20

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P399478

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251761	Chloride	1.35	Sample	P	0 - 20

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P399619

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2253303	Sulfate	0.0323	Sample	P	0 - 20

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P399414

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251939	Ammonia-N	0.0	Spike	P	0 - 20

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P399232

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251924	Kjeldahl Nitrogen	7.36	Spike	P	0 - 20

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P399290

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251979	NO2NO3-N	0.0	Spike	P	0 - 20

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P399287

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251813	Total-P	0.609	Spike	P	0 - 20

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P399438

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251805	Total-P	1.22	Spike	P	0 - 20

Quality Assurance Report Precision

Reference Method: EPA 365.1 Rev. 2.0 dissolved
 Batch ID: P399172

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251935	O-Phosphate-P	1.20	Spike	P	0 - 20

Reference Method: SM 2120 B-2011
 Batch ID: P399179

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251977	Color (true)	0.343	Sample	P	0 - 20

Reference Method: SM 2320 B-2011
 Batch ID: P399338

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251710	Total Alkalinity	1.18	Sample	P	0 - 5.2

Reference Method: SM 2540 C-2011
 Batch ID: P399750

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251977	TDS	4.82	Sample	P	0 - 10

Reference Method: SM 2540 C-2011
 Batch ID: P399751

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251978	TDS	3.57	Sample	P	0 - 10

Reference Method: SM 4500 F-C-2011
 Batch ID: P399342

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251710	Fluoride	0.0	Spike	P	0 - 2.1

Reference Method: SM 5310 B-2011
 Batch ID: P399730

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2251927	Organic Carbon	0.0454	Spike	P	0 - 20

* Sample, spike and/or laboratory control sample precision (LCS) is reported.

Quality Assurance Report Calibration Verification

Reference Method: EPA 365.1 Rev. 2.0 dissolved

Run ID: A105855

Included Lab Sample IDs: 2251981, 2251982

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
O-Phosphate-P	96.7	98.0	P/P	90 - 110

Reference Method: EPA 180.1 Rev. 2.0

Run ID: A105856

Included Lab Sample IDs: 2251977, 2251978

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Turbidity	100	99.0	P/P	95 - 105

Reference Method: SM 2120 B-2011

Run ID: A105857

Included Lab Sample IDs: 2251977, 2251978

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Color (true)	102	102	P/P	90 - 115

Reference Method: EPA 353.2 Rev. 2.0

Run ID: A105912

Included Lab Sample IDs: 2251979, 2251980

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
NO2NO3-N	102	102	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0

Run ID: A105917

Included Lab Sample IDs: 2251979, 2251980

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Kjeldahl Nitrogen	95.1	104	P/P	90 - 110

Reference Method: SM 2320 B-2011

Run ID: A105930

Included Lab Sample IDs: 2251977, 2251978

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total Alkalinity	98.7	96.1	P/P	90 - 110

Reference Method: SM 4500 F-C-2011

Run ID: A105930

Included Lab Sample IDs: 2251977, 2251978

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Fluoride	102	103	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A105954

Included Lab Sample IDs: 2251980

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total-P	103	101	P/P	90 - 110

Quality Assurance Report Calibration Verification

Reference Method: EPA 300.0 Rev. 2.1

Run ID: A105956

Included Lab Sample IDs: 2251977, 2251978

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Chloride	100	100	P/P	90 - 110
Chloride	100	101	P/P	90 - 110
Sulfate	98.1	99.4	P/P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0

Run ID: A105961

Included Lab Sample IDs: 2251979, 2251980

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Ammonia-N	98.1	97.5	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A105983

Included Lab Sample IDs: 2251979

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total-P	103	104	P/P	85 - 115

Reference Method: SM 5310 B-2011

Run ID: A106083

Included Lab Sample IDs: 2251979, 2251980

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Organic Carbon	101	100	P/P	90 - 110

* Pass/Fail determinations are made for each bracketing calibration verification check.

Control limits for initial calibration checks may be different from those for continuing checks, depending on method requirements.

Where they are different, both control limits are provided.

Quality Assurance Report Summary

Ref. Method	Analyte	LCS % Recovery	MS % Recovery		LCS	Precision	MS
						SMP	
EPA 180.1 Rev. 2.0	Turbidity					1.00	
EPA 300.0 Rev. 2.1	Chloride	98.1	96.5	94.0		1.35	
	Sulfate	98.1	98.0	97.2		0.0323	
EPA 350.1 Rev. 2.0	Ammonia-N	100	100	100			0.0
EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	101	96.5	105			7.36
EPA 353.2 Rev. 2.0	NO ₂ NO ₃ -N	102	100	100			0.0
EPA 365.1 Rev. 2.0	Total-P	100	105	104			0.609
	Total-P	102	102	101			1.22
EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	98.0	99.4	101			1.20
SM 2120 B-2011	Color (true)	101				0.343	
SM 2320 B-2011	Total Alkalinity	98.1				1.18	
SM 2540 C-2011	TDS					4.82	
	TDS					3.57	
SM 4500 F-C-2011	Fluoride	99.5	98.8	98.8			0.0
SM 5310 B-2011	Organic Carbon	99.9	98.6	98.7			0.0454

Reference Method Descriptions

Method	Description	Associated Samples
EPA 180.1 Rev. 2.0	Turbidity in aqueous matrices	2251977, 2251978
EPA 300.0 Rev. 2.1	Chloride in aqueous matrices	2251977, 2251978
EPA 300.0 Rev. 2.1	Sulfate in aqueous matrices	2251977, 2251978
EPA 350.1 Rev. 2.0	Ammonia in aqueous matrices as mg N/L	2251979, 2251980
EPA 351.2 Rev. 2.0	Total Kjeldahl Nitrogen in aqueous matrices	2251979, 2251980
EPA 353.2 Rev. 2.0	Nitrite/Nitrate in aqueous matrices as mg N/L	2251979, 2251980
EPA 365.1 Rev. 2.0	Total Phosphorus in aqueous matrices as mg P/L	2251979, 2251980
EPA 365.1 Rev. 2.0 dissolved	Ortho-phosphate, dissolved, in filtered, aqueous matrices as mg P/L	2251981, 2251982
SM 2120 B-2011	True Color measured at 450 nm (not valid for NPDES monitoring)	2251977, 2251978
SM 2320 B-2011	Alkalinity in aqueous matrices as mg CaCO ₃ /L	2251977, 2251978
SM 2540 C-2011	Total Dissolved Solids in aqueous matrices	2251977, 2251978
SM 2540 D-2011	Total Suspended Solids in aqueous matrices using a maximum of 250 mL of sample	2251977, 2251978
SM 4500 F-C-2011	Fluoride in aqueous matrices, without distillation (not valid for NPDES monitoring)	2251977, 2251978
SM 5310 B-2011	Nonpurgeable Organic Carbon in aqueous matrices	2251979, 2251980

Preparation and Analysis Log

Ref. Method	Received Date	Prep Date/Time	Prepared By	Analysis Date/Time	Analyzed By	Associated Samples
EPA 180.1 Rev. 2.0	06/03/2021			06/03/2021 15:20	Yen Ta	2251977, 2251978
EPA 300.0 Rev. 2.1	06/03/2021			06/09/2021 23:46	Lipi Saha	2251977
	06/03/2021			06/10/2021 02:23	Lipi Saha	2251978
	06/03/2021			06/11/2021 20:56	Lipi Saha	2251977
	06/03/2021			06/11/2021 21:08	Lipi Saha	2251978
EPA 350.1 Rev. 2.0	06/03/2021			06/08/2021 13:26	Ping Hua	2251979
	06/03/2021			06/08/2021 13:27	Ping Hua	2251980
EPA 351.2 Rev. 2.0	06/03/2021	06/04/2021 13:04	Benjamin T. Nordmann	06/07/2021 12:23	Virginia P. Brown	2251979
	06/03/2021	06/04/2021 13:04	Benjamin T. Nordmann	06/07/2021 12:25	Virginia P. Brown	2251980
EPA 353.2 Rev. 2.0	06/03/2021			06/07/2021 10:28	Beverly Y. Sanders	2251979
	06/03/2021			06/07/2021 10:34	Beverly Y. Sanders	2251980
EPA 365.1 Rev. 2.0	06/03/2021	06/07/2021 13:53	Yen Ta	06/07/2021 16:41	Shengyu Ding	2251980
	06/03/2021	06/09/2021 14:02	Yen Ta	06/10/2021 12:22	Shengyu Ding	2251979
EPA 365.1 Rev. 2.0 dissolved	06/03/2021			06/03/2021 15:02	Blanca Fach	2251981
	06/03/2021			06/03/2021 15:03	Blanca Fach	2251982
SM 2120 B-2011	06/03/2021			06/03/2021 15:48	Sarah A Nixon	2251977
	06/03/2021			06/03/2021 15:50	Sarah A Nixon	2251978
SM 2320 B-2011	06/03/2021			06/08/2021 00:58	Dale L. Simmons	2251977
	06/03/2021			06/08/2021 01:11	Dale L. Simmons	2251978
SM 2540 C-2011	06/03/2021			06/08/2021 14:56	Yijie Li	2251977, 2251978
SM 2540 D-2011	06/03/2021			06/08/2021 14:56	Yijie Li	2251977, 2251978
SM 4500 F-C-2011	06/03/2021			06/08/2021 00:58	Dale L. Simmons	2251977
	06/03/2021			06/08/2021 01:11	Dale L. Simmons	2251978
SM 5310 B-2011	06/03/2021			06/15/2021 06:31	Madeline Gruver	2251979
	06/03/2021			06/15/2021 06:44	Madeline Gruver	2251980