

Chemical Analysis Report

NW-DIST-2015-11-17-01

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

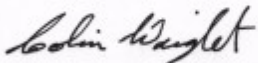
Event Description: **Project Greenshores**
Request ID: **RQ-2015-11-09-11**
Customer: **NW-DIST**
Project ID: **DISTRICT**

Send Reports to:
FL Dept. of Environmental Protection
160 Government Center
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Certified by: Colin Wright, Environmental Administrator

Date Certified: 07-DEC-2015 12:36



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 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: Range Marker E. of Texar

Collection Date/Time: 11/16/2015 10:50

Field ID: 1

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750759	EPA 180.1 Rev. 2.0	Turbidity	2.5		NTU	P294532	
	SM 2120 B	Color (true)	25	A	PCU	P294566	
	SM 2540 D-97	TSS	3	U	mg/L	P294837	
1750775	EPA 350.1 Rev. 2.0	Ammonia-N	0.024		mg N/L	P294635	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.34	I	mg N/L	P294590	MS
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.055		mg N/L	P294699	
	EPA 365.1 Rev. 2.0	Total-P	0.015		mg P/L	P294658	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: 1/2 Bridge and Muscogee

Collection Date/Time: 11/16/2015 11:06

Field ID: 2

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750760	EPA 180.1 Rev. 2.0	Turbidity	2.4		NTU	P294532	
	SM 2120 B	Color (true)	26		PCU	P294566	
	SM 2540 D-97	TSS	3	I	mg/L	P294837	
1750776	EPA 350.1 Rev. 2.0	Ammonia-N	0.028		mg N/L	P294635	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.41		mg N/L	P294759	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.049		mg N/L	P294699	
	EPA 365.1 Rev. 2.0	Total-P	0.017		mg P/L	P294658	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: E.of Primary Stormdrain PGS 1

Collection Date/Time: 11/16/2015 11:15

Field ID: 3

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750761	EPA 180.1 Rev. 2.0	Turbidity	1.4	A	NTU	P294533	
	SM 2120 B	Color (true)	19		PCU	P294566	
	SM 2540 D-97	TSS	3	U	mg/L	P294837	
1750777	EPA 350.1 Rev. 2.0	Ammonia-N	0.037		mg N/L	P294635	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.34	I	mg N/L	P294774	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.062		mg N/L	P294699	
	EPA 365.1 Rev. 2.0	Total-P	0.019		mg P/L	P294658	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: 100 ft S of Stormdrain

Collection Date/Time: 11/16/2015 11:25

Field ID: 4

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750762	EPA 180.1 Rev. 2.0	Turbidity	1.4		NTU	P294533	
	SM 2120 B	Color (true)	20		PCU	P294566	
	SM 2540 D-97	TSS	3	I	mg/L	P294837	
1750778	EPA 350.1 Rev. 2.0	Ammonia-N	0.036		mg N/L	P294635	

Field ID: 4

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750778	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.35	I	mg N/L	P294774	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.064		mg N/L	P294699	
	EPA 365.1 Rev. 2.0	Total-P	0.016		mg P/L	P294658	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: End of Chase St

Collection Date/Time: 11/16/2015 11:43

Field ID: 5

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750763	EPA 180.1 Rev. 2.0	Turbidity	1.2		NTU	P294533	
	SM 2120 B	Color (true)	17		PCU	P294566	
	SM 2540 D-97	TSS	3	U	mg/L	P294837	
1750779	EPA 350.1 Rev. 2.0	Ammonia-N	0.033		mg N/L	P294635	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.35	I	mg N/L	P294774	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.070		mg N/L	P294699	
	EPA 365.1 Rev. 2.0	Total-P	0.014		mg P/L	P294658	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: 1/2 Muscogee and Hawkshaw 400 ft from Shore

Collection Date/Time: 11/16/2015 11:50

Field ID: 6

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750764	EPA 180.1 Rev. 2.0	Turbidity	2.3		NTU	P294533	
	SM 2120 B	Color (true)	20		PCU	P294566	
	SM 2540 D-97	TSS	3	U	mg/L	P294837	
1750780	EPA 350.1 Rev. 2.0	Ammonia-N	0.031		mg N/L	P294635	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.32	I	mg N/L	P294774	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.074		mg N/L	P294699	
	EPA 365.1 Rev. 2.0	Total-P	0.031		mg P/L	P294658	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: 1/2 Bridge and Port

Collection Date/Time: 11/16/2015 12:00

Field ID: 7

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750765	EPA 180.1 Rev. 2.0	Turbidity	2.4		NTU	P294533	
	SM 2120 B	Color (true)	22		PCU	P294566	
	SM 2540 D-97	TSS	3	I	mg/L	P294837	
1750781	EPA 350.1 Rev. 2.0	Ammonia-N	0.029		mg N/L	P294635	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.39	I	mg N/L	P294774	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.055		mg N/L	P294699	
	EPA 365.1 Rev. 2.0	Total-P	0.018		mg P/L	P294658	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: Field Blank @ 1/2 Bridge and Port

Collection Date/Time: 11/16/2015 12:05

Field ID: FB

Matrix: W-FIELD-BK

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750766	EPA 180.1 Rev. 2.0	Turbidity	0.10	U	NTU	P294533	
	SM 2120 B	Color (true)	2.5	U	PCU	P294566	
	SM 2540 D-97	TSS	2	U	mg/L	P294835	
1750782	EPA 350.1 Rev. 2.0	Ammonia-N	0.002	I	mg N/L	P294637	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.080	U	mg N/L	P294773	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.004	U	mg N/L	P294617	
	EPA 365.1 Rev. 2.0	Total-P	0.002	U	mg P/L	P295043	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

EPA 350.1 Rev. 2.0: The result was confirmed on 11/18/2015.

Sample Location: West of Stormdrain Inside Rocks

Collection Date/Time: 11/16/2015 11:33

Field ID: 8

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750767	EPA 180.1 Rev. 2.0	Turbidity	0.95		NTU	P294533	
	SM 2120 B	Color (true)	17		PCU	P294566	
	SM 2540 D-97	TSS	3	U	mg/L	P294837	
1750783	EPA 350.1 Rev. 2.0	Ammonia-N	0.043		mg N/L	P294635	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.33	I	mg N/L	P294774	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.10		mg N/L	P294699	
	EPA 365.1 Rev. 2.0	Total-P	0.016		mg P/L	P294658	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: West end of Hawkshaw 100 ft S.of Outfall

Collection Date/Time: 11/16/2015 12:30

Field ID: 9

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750768	EPA 180.1 Rev. 2.0	Turbidity	1.5		NTU	P294533	
	SM 2120 B	Color (true)	20		PCU	P294566	
	SM 2540 D-97	TSS	3	I	mg/L	P294837	
1750784	EPA 350.1 Rev. 2.0	Ammonia-N	0.035		mg N/L	P294635	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.34	I	mg N/L	P294774	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.054		mg N/L	P294699	
	EPA 365.1 Rev. 2.0	Total-P	0.016		mg P/L	P294658	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: Between Marina and Outfall

Collection Date/Time: 11/16/2015 12:24

Field ID: 10

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750769	EPA 180.1 Rev. 2.0	Turbidity	1.5		NTU	P294533	
	SM 2120 B	Color (true)	20	A	PCU	P294567	
	SM 2540 D-97	TSS	3	U	mg/L	P294838	
1750785	EPA 350.1 Rev. 2.0	Ammonia-N	0.031		mg N/L	P294635	

Field ID: 10

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750785	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.27	I	mg N/L	P294774	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.051		mg N/L	P294700	
	EPA 365.1 Rev. 2.0	Total-P	0.011		mg P/L	P294739	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: Entrance of Marina

Collection Date/Time: 11/16/2015 12:16

Field ID: 11

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750770	EPA 180.1 Rev. 2.0	Turbidity	1.5		NTU	P294533	
	SM 2120 B	Color (true)	21		PCU	P294567	
	SM 2540 D-97	TSS	3	U	mg/L	P294838	
1750786	EPA 350.1 Rev. 2.0	Ammonia-N	0.076		mg N/L	P294636	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.33	I	mg N/L	P294774	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.21		mg N/L	P294700	
	EPA 365.1 Rev. 2.0	Total-P	0.018		mg P/L	P294739	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: 1/4 Between Bridge and Port 400 ft from Shore

Collection Date/Time: 11/16/2015 12:08

Field ID: 12

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750771	EPA 180.1 Rev. 2.0	Turbidity	1.8	A	NTU	P294534	
	SM 2120 B	Color (true)	20		PCU	P294567	
	SM 2540 D-97	TSS	5	I	mg/L	P294838	
1750787	EPA 350.1 Rev. 2.0	Ammonia-N	0.029		mg N/L	P294636	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.26	I	mg N/L	P294774	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.052		mg N/L	P294700	
	EPA 365.1 Rev. 2.0	Total-P	0.014		mg P/L	P294739	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: Inside Hawkshaw Lagoon

Collection Date/Time: 11/16/2015 12:43

Field ID: 13

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750772	EPA 180.1 Rev. 2.0	Turbidity	6.1		NTU	P294534	
	SM 2120 B	Color (true)	16		PCU	P294567	
	SM 2540 D-97	TSS	15		mg/L	P294838	
1750788	EPA 350.1 Rev. 2.0	Ammonia-N	0.022		mg N/L	P294636	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.44		mg N/L	P294851	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.007	I	mg N/L	P294700	
	EPA 365.1 Rev. 2.0	Total-P	0.034		mg P/L	P294739	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: East of Stormdrain inside PGS 2

Collection Date/Time: 11/16/2015 12:55

Field ID: 14

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750773	EPA 180.1 Rev. 2.0	Turbidity	1.2		NTU	P294534	
	SM 2120 B	Color (true)	20		PCU	P294567	
	SM 2540 D-97	TSS	3	I	mg/L	P294838	
1750789	EPA 350.1 Rev. 2.0	Ammonia-N	0.037		mg N/L	P294636	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.29	I	mg N/L	P294851	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.055		mg N/L	P294700	
	EPA 365.1 Rev. 2.0	Total-P	0.01	I	mg P/L	P294739	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Sample Location: East of Stormdrain inside PGS 2

Collection Date/Time: 11/16/2015 12:57

Field ID: 14 DUPLICATE

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1750774	EPA 180.1 Rev. 2.0	Turbidity	1.1		NTU	P294534	
	SM 2120 B	Color (true)	21		PCU	P294567	
	SM 2540 D-97	TSS	4	I	mg/L	P294838	
1750790	EPA 350.1 Rev. 2.0	Ammonia-N	0.037		mg N/L	P294636	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.25	I	mg N/L	P294851	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.053		mg N/L	P294700	
	EPA 365.1 Rev. 2.0	Total-P	0.010		mg P/L	P294739	

Ref. Method and Comment:

SM 2540 D-97: The precision data is unavailable due to the low analyte concentration in the QC sample.

Quality Assurance Report

Method Blank Results

Reference Method: EPA 180.1 Rev. 2.0

Batch ID: P294532

Component	Result	Code	Units
Turbidity	0.10	U	NTU

Reference Method: EPA 180.1 Rev. 2.0

Batch ID: P294533

Component	Result	Code	Units
Turbidity	0.10	U	NTU

Reference Method: EPA 180.1 Rev. 2.0

Batch ID: P294534

Component	Result	Code	Units
Turbidity	0.10	U	NTU

Reference Method: EPA 350.1 Rev. 2.0

Batch ID: P294635

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

Quality Assurance Report Method Blank Results

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294636

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

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294637

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294590

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294759

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294773

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294774

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294851

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

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294617

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

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294699

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

Quality Assurance Report Method Blank Results

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294700

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

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P294658

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

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P294739

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

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P295043

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

Reference Method: SM 2120 B
Batch ID: P294566

Component	Result	Code	Units
Color (true)	2.5	U	PCU

Reference Method: SM 2120 B
Batch ID: P294567

Component	Result	Code	Units
Color (true)	2.5	U	PCU

Reference Method: SM 2540 D-97
Batch ID: P294835

Component	Result	Code	Units
TSS	2	U	mg/L

Reference Method: SM 2540 D-97
Batch ID: P294837

Component	Result	Code	Units
TSS	3	U	mg/L

Reference Method: SM 2540 D-97
Batch ID: P294838

Component	Result	Code	Units
TSS	3	U	mg/L

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294635

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Ammonia-N	99.8		P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294636

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Ammonia-N	99.7		P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294637

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Ammonia-N	98.8		P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294590

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Kjeldahl Nitrogen	92.2		P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294759

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Kjeldahl Nitrogen	109		P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294773

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Kjeldahl Nitrogen	99.0		P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294774

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Kjeldahl Nitrogen	106		P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294851

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

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294617

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
NO2NO3-N	104		P	90 - 110

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294699

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

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294700

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

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P294658

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

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P294739

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Total-P	98.6		P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P295043

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

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294635

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750779	Ammonia-N	102	99.8	P/P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294636

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750788	Ammonia-N	101	99.7	P/P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294637

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750809	Ammonia-N	99.9	98.1	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294590

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
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Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294590

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750146	Kjeldahl Nitrogen	96.8	87.2	P/F	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294759

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750776	Kjeldahl Nitrogen	108	94.7	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294773

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750560	Kjeldahl Nitrogen	106	95.9	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294774

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750777	Kjeldahl Nitrogen	105	93.8	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294851

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750940	Kjeldahl Nitrogen	106	95.2	P/P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294617

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750692	NO2NO3-N	102	103	P/P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294699

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750776	NO2NO3-N	103	103	P/P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294700

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750785	NO2NO3-N	102	103	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P294658

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750155	Total-P	97.4	92.0	P/P	90 - 110

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P294739

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1750785	Total-P	94.5	97.3	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P295043

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1751398	Total-P	97.7	96.9	P/P	90 - 110

Quality Assurance Report Precision

Reference Method: EPA 180.1 Rev. 2.0
Batch ID: P294532

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750670	Turbidity	0.321	Sample	P	0 - 20

Reference Method: EPA 180.1 Rev. 2.0
Batch ID: P294533

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750761	Turbidity	0.702	Sample	P	0 - 20

Reference Method: EPA 180.1 Rev. 2.0
Batch ID: P294534

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750771	Turbidity	1.14	Sample	P	0 - 20

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294635

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750779	Ammonia-N	1.33	Spike	P	0 - 20

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294636

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750788	Ammonia-N	1.02	Spike	P	0 - 20

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294637

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
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Quality Assurance Report Precision

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P294637

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750809	Ammonia-N	1.00	Spike	P	0 - 20

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294590

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750146	Kjeldahl Nitrogen	9.05	Spike	P	0 - 20

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294759

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750776	Kjeldahl Nitrogen	11.5	Spike	P	0 - 20

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294773

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750560	Kjeldahl Nitrogen	6.15	Spike	P	0 - 20

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294774

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750777	Kjeldahl Nitrogen	9.44	Spike	P	0 - 20

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P294851

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750940	Kjeldahl Nitrogen	8.70	Spike	P	0 - 20

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294617

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750692	NO2NO3-N	0.976	Spike	P	0 - 20

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294699

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750776	NO2NO3-N	0.393	Spike	P	0 - 20

Quality Assurance Report Precision

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P294700

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750785	NO2NO3-N	0.390	Spike	P	0 - 20

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P294658

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750155	Total-P	5.51	Spike	P	0 - 20

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P294739

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750785	Total-P	2.82	Spike	P	0 - 20

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P295043

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1751398	Total-P	0.740	Spike	P	0 - 20

Reference Method: SM 2120 B
Batch ID: P294566

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750759	Color (true)	4.01	Sample	P	0 - 20

Reference Method: SM 2120 B
Batch ID: P294567

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1750769	Color (true)	9.15	Sample	P	0 - 20

* Sample, spike and/or laboratory control sample precision (LCS) is reported.
Replicate spike precision may be reported when sample results are below quantifiable levels.

Quality Assurance Report Calibration Verification

Reference Method: EPA 180.1 Rev. 2.0
Run ID: A66138

Included Lab Sample IDs: 1750759, 1750760, 1750761, 1750762, 1750763, 1750764, 1750765, 1750766, 1750767, 1750768, 1750769, 1750770, 1750771, 1750772, 1750773, 1750774

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Turbidity	100	101	P/P	95 - 105
Turbidity	101	100	P/P	95 - 105

Quality Assurance Report Calibration Verification

Reference Method: EPA 180.1 Rev. 2.0

Run ID: A66138

Included Lab Sample IDs: 1750759, 1750760, 1750761, 1750762, 1750763, 1750764, 1750765, 1750766, 1750767, 1750768, 1750769, 1750770, 1750771, 1750772, 1750773, 1750774

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Turbidity	99.5	100	P/P	95 - 105

Reference Method: SM 2120 B

Run ID: A66146

Included Lab Sample IDs: 1750759, 1750760, 1750761, 1750762, 1750763, 1750764, 1750765, 1750766, 1750767, 1750768, 1750769, 1750770, 1750771, 1750772, 1750773, 1750774

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Color (true)	101	100	P/P	90 - 115
Color (true)	101	101	P/P	90 - 115

Reference Method: EPA 353.2 Rev. 2.0

Run ID: A66158

Included Lab Sample IDs: 1750782

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
NO2NO3-N	101	100	P/P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0

Run ID: A66164

Included Lab Sample IDs: 1750775, 1750776, 1750777, 1750778, 1750779, 1750780, 1750781, 1750782, 1750783, 1750784, 1750785, 1750786, 1750787, 1750788, 1750789, 1750790

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Ammonia-N	99.2	99.7	P/P	90 - 110
Ammonia-N	99.3	99.8	P/P	90 - 110
Ammonia-N	99.7	99.3	P/P	90 - 110
Ammonia-N	99.8	100	P/P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0

Run ID: A66187

Included Lab Sample IDs: 1750775, 1750776, 1750777, 1750778, 1750779, 1750780, 1750781, 1750783, 1750784, 1750785, 1750786, 1750787, 1750788, 1750789, 1750790

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
NO2NO3-N	100	99.5	P/P	90 - 110
NO2NO3-N	99.5	99.5	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0

Run ID: A66197

Included Lab Sample IDs: 1750775

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Kjeldahl Nitrogen	102	99.0	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0

Run ID: A66231

Included Lab Sample IDs: 1750776

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Kjeldahl Nitrogen	99.4	101	P/P	90 - 110

Quality Assurance Report Calibration Verification

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A66237

Included Lab Sample IDs: 1750775, 1750776, 1750777, 1750778, 1750779, 1750780, 1750781, 1750784

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total-P	98.5	99.8	P/P	90 - 110
Total-P	99.8	99.8	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0

Run ID: A66238

Included Lab Sample IDs: 1750777, 1750778, 1750779, 1750780, 1750781, 1750782, 1750783, 1750784, 1750785, 1750786, 1750787

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Kjeldahl Nitrogen	101	101	P/P	90 - 110
Kjeldahl Nitrogen	102	97.9	P/P	90 - 110
Kjeldahl Nitrogen	99.7	102	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A66260

Included Lab Sample IDs: 1750783

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total-P	98.8	98.8	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0

Run ID: A66261

Included Lab Sample IDs: 1750788, 1750789, 1750790

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Kjeldahl Nitrogen	97.6	98.5	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A66289

Included Lab Sample IDs: 1750785, 1750786, 1750787, 1750789, 1750790

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total-P	99.2	99.0	P/P	90 - 110
Total-P	99.8	99.2	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A66292

Included Lab Sample IDs: 1750788

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total-P	98.5	99.0	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A66386

Included Lab Sample IDs: 1750782

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total-P	102	101	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	Precision		
				LCS	SMP	MS
EPA 180.1 Rev. 2.0	Turbidity				0.321	
	Turbidity				0.702	
	Turbidity				1.14	
EPA 350.1 Rev. 2.0	Ammonia-N	99.8	102 99.8			1.33
	Ammonia-N	99.7	101 99.7			1.02
	Ammonia-N	98.8	99.9 98.1			1.00
EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	92.2	96.8 87.2			9.05
	Kjeldahl Nitrogen	109	108 94.7			11.5
	Kjeldahl Nitrogen	99.0	106 95.9			6.15
	Kjeldahl Nitrogen	106	105 93.8			9.44
	Kjeldahl Nitrogen	100	106 95.2			8.70
EPA 353.2 Rev. 2.0	NO2NO3-N	104	102 103			0.976
	NO2NO3-N	100	103 103			0.393
	NO2NO3-N	100	102 103			0.390
EPA 365.1 Rev. 2.0	Total-P	103	97.4 92.0			5.51
	Total-P	98.6	94.5 97.3			2.82
	Total-P	101	97.7 96.9			0.740
SM 2120 B	Color (true)				4.01	
	Color (true)				9.15	

Reference Method Descriptions

Method / DoH Cert #	Description	Associated Samples
EPA 180.1 Rev. 2.0 / E31780	Turbidity in aqueous matrices	1750759, 1750760, 1750761, 1750762, 1750763, 1750764, 1750765, 1750766, 1750767, 1750768, 1750769, 1750770, 1750771, 1750772, 1750773, 1750774
EPA 350.1 Rev. 2.0 / E31780	Ammonia in aqueous matrices as mg N/L	1750775, 1750776, 1750777, 1750778, 1750779, 1750780, 1750781, 1750782, 1750783, 1750784, 1750785, 1750786, 1750787, 1750788, 1750789, 1750790
EPA 351.2 Rev. 2.0 / E31780	Total Kjeldahl Nitrogen in aqueous matrices	1750775, 1750776, 1750777, 1750778, 1750779, 1750780, 1750781, 1750782, 1750783, 1750784, 1750785, 1750786, 1750787, 1750788, 1750789, 1750790
EPA 353.2 Rev. 2.0 / E31780	Nitrite/Nitrate in aqueous matrices as mg N/L	1750775, 1750776, 1750777, 1750778, 1750779, 1750780, 1750781, 1750782, 1750783, 1750784, 1750785, 1750786, 1750787, 1750788, 1750789, 1750790
EPA 365.1 Rev. 2.0 / E31780	Total Phosphorus in aqueous matrices as mg P/L	1750775, 1750776, 1750777, 1750778, 1750779, 1750780, 1750781, 1750782, 1750783, 1750784, 1750785, 1750786, 1750787, 1750788, 1750789, 1750790
SM 2120 B / E31780	True Color measured at 450 nm	1750759, 1750760, 1750761, 1750762, 1750763, 1750764, 1750765, 1750766, 1750767, 1750768, 1750769, 1750770, 1750771, 1750772, 1750773, 1750774
SM 2540 D-97 / E31780	Total Suspended Solids in aqueous matrices	1750759, 1750760, 1750761, 1750762, 1750763, 1750764, 1750765, 1750766, 1750767, 1750768, 1750769, 1750770, 1750771, 1750772, 1750773, 1750774

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	11/17/2015			11/17/2015 16:46	Sima Feizi	1750759, 1750760, 1750761, 1750762, 1750763, 1750764, 1750765, 1750766, 1750767, 1750768, 1750769, 1750770, 1750771, 1750772, 1750773, 1750774
EPA 350.1 Rev. 2.0	11/17/2015			11/18/2015	Diana M. Turner	1750775, 1750776, 1750777, 1750778, 1750779, 1750780, 1750781, 1750782, 1750783, 1750784, 1750785, 1750786, 1750787, 1750788, 1750789, 1750790
EPA 351.2 Rev. 2.0	11/17/2015	11/18/2015	Sofia Elnemr	11/19/2015	Christopher Armour	1750775
	11/17/2015	11/20/2015	Sofia Elnemr	11/23/2015	Bryan A. Werth	1750776, 1750777, 1750778, 1750779, 1750780, 1750781, 1750782, 1750783, 1750784, 1750785, 1750786, 1750787
EPA 353.2 Rev. 2.0	11/17/2015	11/23/2015	Sofia Elnemr	11/24/2015	Bryan A. Werth	1750788, 1750789, 1750790
	11/17/2015			11/18/2015	Peter D. Kaus	1750782
	11/17/2015			11/19/2015	Peter D. Kaus	1750775, 1750776, 1750777, 1750778, 1750779, 1750780, 1750781, 1750783, 1750784, 1750785, 1750786, 1750787, 1750788, 1750789, 1750790
EPA 365.1 Rev. 2.0	11/17/2015	11/19/2015	Christopher Armour	11/20/2015	Lipi Saha	1750775, 1750776, 1750777, 1750778, 1750779, 1750780, 1750781, 1750784
	11/17/2015	11/19/2015	Christopher Armour	11/24/2015	Lipi Saha	1750783
	11/17/2015	11/20/2015	Christopher Armour	11/25/2015	Lipi Saha	1750785, 1750786, 1750787, 1750788, 1750789, 1750790
	11/17/2015	11/30/2015	Christopher Armour	12/02/2015	Lipi Saha	1750782
SM 2120 B	11/17/2015			11/17/2015 17:21	Rochelle Y Jackson	1750759, 1750760
	11/17/2015			11/17/2015 17:22	Rochelle Y Jackson	1750761
	11/17/2015			11/17/2015 17:23	Rochelle Y Jackson	1750762
	11/17/2015			11/17/2015 17:24	Rochelle Y Jackson	1750763, 1750764
	11/17/2015			11/17/2015 17:25	Rochelle Y Jackson	1750765
	11/17/2015			11/17/2015 17:26	Rochelle Y Jackson	1750766
	11/17/2015			11/17/2015 17:27	Rochelle Y Jackson	1750767, 1750768
	11/17/2015			11/17/2015 17:31	Rochelle Y Jackson	1750769
	11/17/2015			11/17/2015 17:32	Rochelle Y Jackson	1750770
	11/17/2015			11/17/2015 17:33	Rochelle Y Jackson	1750771, 1750772
	11/17/2015			11/17/2015 17:34	Rochelle Y Jackson	1750773
	11/17/2015			11/17/2015 17:35	Rochelle Y Jackson	1750774
SM 2540 D-97	11/17/2015			11/18/2015	Yijie Li	1750759, 1750760, 1750761, 1750762, 1750763, 1750764, 1750765, 1750766, 1750767, 1750768, 1750769, 1750770, 1750771, 1750772, 1750773, 1750774