

Chemical Analysis Report

NE-DIST-2017-10-13-01

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

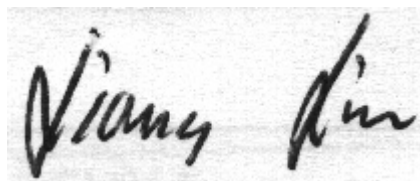
Event Description: **LSJR Coast**
Request ID: **RQ-2017-10-16-10**
Customer: **NE-DIST**
Project ID: **SMP**

Send Reports to:
FL Dept. of Environmental Protection
8800 Baymeadows Way West
Jacksonville, FL 32256-7577
Attn: Jeremy Parrish

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Certified by: Liang Lin, Environmental Administrator

Date Certified: 08-NOV-2017 11:07

A handwritten signature in black ink, appearing to read "Liang Lin", 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 groups are included in this report: Metals, Nutrients and Pesticides.

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: Greenfield Creek @ Wonderwood

Collection Date/Time: 10/12/2017 09:00

Field ID: G2NE1137 10112017

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1936845	EPA 180.1 Rev. 2.0	Turbidity	9.2		NTU	P333466	
	SM 2320 B-97	Total Alkalinity	72		mg CaCO3/L	P333855	
	SM 2540 D-97	TSS	12		mg/L	P333936	
	SM 4500 F-C-97	Fluoride	0.29		mg F/L	P333861	
1936848	EPA 350.1 Rev. 2.0	Ammonia-N	0.090		mg N/L	P333616	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.94		mg N/L	P333732	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.14		mg N/L	P333769	
	EPA 365.1 Rev. 2.0	Total-P	0.10		mg P/L	P333607	
	SM 5310 B-00	Organic Carbon	16		mg C/L	P333687	
1936851	EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	0.061		mg P/L	P333370	

Ref. Method and Comment:

SM 2540 D-97: Batch relative percent difference is unavailable because of low analyte concentration in the QC sample.

Sample Location: Sherman Creek @ A1A bridge

Collection Date/Time: 10/12/2017 09:20

Field ID: G2NE1141 10112017

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1936846	EPA 180.1 Rev. 2.0	Turbidity	8.0		NTU	P333466	
	SM 2320 B-97	Total Alkalinity	98		mg CaCO3/L	P333537	
	SM 2540 D-97	TSS	8	I	mg/L	P333936	
	SM 4500 F-C-97	Fluoride	0.38		mg F/L	P333743	
1936849	EPA 350.1 Rev. 2.0	Ammonia-N	0.084		mg N/L	P333616	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.94		mg N/L	P333732	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.096		mg N/L	P333769	
	EPA 365.1 Rev. 2.0	Total-P	0.21		mg P/L	P333607	
	SM 5310 B-00	Organic Carbon	17		mg C/L	P333687	
1936852	EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	0.15		mg P/L	P333370	

Ref. Method and Comment:

SM 2540 D-97: Batch relative percent difference is unavailable because of low analyte concentration in the QC sample.

Sample Location: St Johns R @ Little Jetties Pier

Collection Date/Time: 10/12/2017 09:35

Field ID: G2NE0745 10112017

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1936854	EPA 180.1 Rev. 2.0	Turbidity	9.5	A	NTU	P333467	
	SM 2320 B-97	Total Alkalinity	63		mg CaCO3/L	P333855	
	SM 2540 D-97	TSS	15		mg/L	P333937	
	SM 4500 F-C-97	Fluoride	0.25		mg F/L	P333861	
1936855	EPA 350.1 Rev. 2.0	Ammonia-N	0.013		mg N/L	P333616	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.77		mg N/L	P333732	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.23		mg N/L	P333769	
	EPA 365.1 Rev. 2.0	Total-P	0.050		mg P/L	P333608	
	SM 5310 B-00	Organic Carbon	18		mg C/L	P333687	
1936856	EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	0.056		mg P/L	P333370	

Field ID: G2NE0745 10112017

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1936880	EPA 200.7 Rev. 4.4	Iron	710		ug/L	P333433	
		Zinc	5.0	U	ug/L	P333433	
	EPA 200.8 Rev. 5.4	Arsenic	1.89		ug/L	P333433	
		Cadmium	0.020	U	ug/L	P333433	
		Chromium	1.1	I	ug/L	P333433	
		Copper	1.18		ug/L	P333433	
		Lead	0.87		ug/L	P333433	
		Nickel	0.56	I	ug/L	P333433	
		Silver	0.010	U	ug/L	P333433	

Ref. Method and Comment:

SM 2540 D-97: Batch relative percent difference is unavailable because of low analyte concentration in the QC sample.

Sample Location: St Johns R @ Little Jetties Pier

Collection Date/Time: 10/12/2017 09:35

Field ID: G2NE0745 10112017

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1936872	EPA 8321B	Glyphosate**	1.4	I	ug/L	P333126	
		Pyraclostrobin**	0.0020	U	ug/L	P333125	
		Sucralose**	0.19		ug/L	P333231	
	USGS O-2060-01	2,4-D	0.013		ug/L	P333480	
		Diuron	0.010		ug/L	P334168	
		Fenuron	0.0080	U	ug/L	P334168	
		Imidacloprid	0.069		ug/L	P334168	
		Bentazon	0.0029	I	ug/L	P333480	MS
		Linuron	0.0040	U	ug/L	P334168	
		Acetaminophen**	0.0080	U	ug/L	P334168	
		MCP	0.0020	U	ug/L	P333480	
		Carbamazepine**	0.0010	I	ug/L	P334168	
		Triclopyr**	0.0040	U	ug/L	P333480	
		Primidone**	0.0040	U	ug/L	P334168	
		Fluridone**	0.0017		ug/L	P334168	
	EPA 8270D	Aldrin	4.3	U	ng/L	P333416	
		Alpha-BHC	2.1	U	ng/L	P333416	
		Beta-BHC	4.3	U	ng/L	P333416	
		Delta-BHC	4.3	U	ng/L	P333416	
		Gamma-BHC	4.3	U	ng/L	P333416	
		Carbophenothion	4.3	U	ng/L	P333416	
		Chlorothalonil	2.1	U	ng/L	P333416	
		Cypermethrin	21	U	ng/L	P333416	
		DDD-p,p'	3.2	U	ng/L	P333416	
		DDE-p,p'	3.2	U	ng/L	P333416	
		DDT-p,p'	3.2	U	ng/L	P333416	
		Dieldrin	4.3	U	ng/L	P333416	
		Endosulfan I	4.3	U	ng/L	P333416	
		Endosulfan II	4.3	U	ng/L	P333416	
		Endosulfan Sulfate	2.1	U	ng/L	P333416	

Field ID: G2NE0745 10112017

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1936878	EPA 8270D	Endrin	2.1	U	ng/L	P333416	
		Endrin Aldehyde	2.1	U	ng/L	P333416	
		Heptachlor	1.6	U	ng/L	P333416	
		Heptachlor Epoxide	2.1	U	ng/L	P333416	
		Methoxychlor	4.3	U	ng/L	P333416	
		Mirex	2.1	U	ng/L	P333416	
		Permethrin	11	U	ng/L	P333416	
		Trifluralin	1.1	U	ng/L	P333416	
		Alpha-Chlordane	1.1	U	ng/L	P333416	
		Gamma-Chlordane	1.1	U	ng/L	P333416	
		Endrin Ketone	2.1	U	ng/L	P333416	
		Dicofol	32	U	ng/L	P333416	
	EPA 8276	Chlordane**	2.7	U	ng/L	P333416	
		Toxaphene**	13	U	ng/L	P333416	
1936879	EPA 8270D	Alachlor	0.25	U	ng/L	P333326	
		Ametryn	0.32	U	ng/L	P333326	
		Atrazine	9.0		ng/L	P333326	
		Atrazine Desethyl	1.5	U	ng/L	P333326	
		Azinphos Methyl	2.2	U	ng/L	P333326	
		Bromacil	0.49	U	ng/L	P333326	
		Butylate	0.39	U	ng/L	P333326	
		Chlorpyrifos Ethyl	0.25	I	ng/L	P333326	
		Chlorpyrifos Methyl	0.098	U	ng/L	P333326	
		Demeton	2.0	U	ng/L	P333326	
		Diazinon	0.12	U	ng/L	P333326	
		Disulfoton	0.49	U	ng/L	P333326	
		EPTC	1.2	UJ	ng/L	P333326	RPD
		Ethion	0.15	U	ng/L	P333326	
		Ethoprop	0.098	U	ng/L	P333326	
		Fenamiphos	0.25	U	ng/L	P333326	
		Fipronil	0.41	I	ng/L	P333326	
		Fipronil Sulfide	0.30	I	ng/L	P333326	
		Fipronil Sulfone	0.48	I	ng/L	P333326	
		Hexazinone	1.4	I	ng/L	P333326	
		Malathion	0.34	U	ng/L	P333326	
		Metribuzin	5.6	J	ng/L	P333326	MS
		Mevinphos	0.49	U	ng/L	P333326	
		Molinate	0.30	U	ng/L	P333326	
		Norflurazon	0.49	U	ng/L	P333326	
		Pendimethalin	0.98	U	ng/L	P333326	
		Phorate	0.25	U	ng/L	P333326	
		Prometon	0.89	U	ng/L	P333326	
		Prometryn	0.20	U	ng/L	P333326	
		Simazine	9.8		ng/L	P333326	
		Terbufos	0.098	U	ng/L	P333326	

Field ID: G2NE0745 10112017

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1936879	EPA 8270D	Terbutylazine	0.42	U	ng/L	P333326	
		Fonofos	0.20	U	ng/L	P333326	
		Metolaxyl	0.20	U	ng/L	P333326	
		Metolachlor	5.3		ng/L	P333326	
		Acetochlor	0.25	U	ng/L	P333326	
		Cyanazine	0.49	UJ	ng/L	P333326	CCV, LCS, MS
		Parathion Ethyl	0.25	U	ng/L	P333326	
		Parathion Methyl	0.25	U	ng/L	P333326	

Ref. Method and Comment:

EPA 8321B: Results confirmed in re-extraction.

USGS O-2060-01: MS accuracy for imidacloprid and fluridone could not be assessed due to high concentration of parameter in the spiked sample.

EPA 8270D: Refer to the narrative for an explanation of QC Codes. MS accuracy for Atrazine and Simazine not assessed due to high content of this parameter in the sample spiked.

Sample Location: ICW @ Isle of Palms Boat Ramp

Collection Date/Time: 10/12/2017 10:35

Field ID: G2NE1136 10112017

Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1936842	EPA 180.1 Rev. 2.0	Turbidity	15		NTU	P333466	
	EPA 300.0 Rev. 2.1	Sulfate	510		mg SO4/L	P333469	
	SM 2320 B-97	Total Alkalinity	73		mg CaCO3/L	P333855	
	SM 2540 D-97	TSS	32		mg/L	P333936	
	SM 4500 F-C-97	Fluoride	0.33		mg F/L	P334022	
1936843	EPA 350.1 Rev. 2.0	Ammonia-N	0.037		mg N/L	P333616	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	1.0		mg N/L	P333732	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.13		mg N/L	P333844	
	EPA 365.1 Rev. 2.0	Total-P	0.12		mg P/L	P333607	
	SM 5310 B-00	Organic Carbon	16		mg C/L	P333991	
1936844	EPA 365.1 Rev. 2.0	O-Phosphate-P	0.063		mg P/L	P333373	
1936871	EPA 8321B	Sucralose**	0.14		ug/L	P333231	
	USGS O-2060-01	2,4-D	0.0075	I	ug/L	P333253	
		Diuron	0.013		ug/L	P333253	
		Fenuron	0.0080	U	ug/L	P333253	
		Imidacloprid	0.052		ug/L	P333253	
		Bentazon	0.011		ug/L	P333253	
		Linuron	0.0040	U	ug/L	P333253	
		Acetaminophen**	0.0080	U	ug/L	P333253	
		MCP	0.0020	U	ug/L	P333253	
		Carbamazepine**	9.3E-04	I	ug/L	P333253	
		Triclopyr**	0.0040	U	ug/L	P333253	
		Primidone**	0.0040	U	ug/L	P333253	
		Fluridone**	0.0087		ug/L	P333253	

Ref. Method and Comment:

SM 2540 D-97: Batch relative percent difference is unavailable because of low analyte concentration in the QC sample.

USGS O-2060-01: MS accuracy for 2,4-D and bentazon could not be assessed due to high concentration of parameter in the spiked sample.

USGS O-2060-01: MS accuracy for imidacloprid and fluridone could not be assessed due to high concentration of parameter in the spiked sample.

Sample Location: Open Creek @ San Pablo Rd

Collection Date/Time: 10/12/2017 10:50

Field ID: G2NE0703 10112017

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1936847	EPA 180.1 Rev. 2.0	Turbidity	3.1		NTU	P333466	
	SM 2320 B-97	Total Alkalinity	54		mg CaCO3/L	P333739	
	SM 2540 D-97	TSS	3	IA	mg/L	P333937	
	SM 4500 F-C-97	Fluoride	0.081	I	mg F/L	P333742	
1936850	EPA 350.1 Rev. 2.0	Ammonia-N	0.052		mg N/L	P333617	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.62		mg N/L	P333733	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.15		mg N/L	P334094	
	EPA 365.1 Rev. 2.0	Total-P	0.050		mg P/L	P333601	
	SM 5310 B-00	Organic Carbon	14		mg C/L	P333687	
1936853	EPA 365.1 Rev. 2.0	O-Phosphate-P dissolved	0.019		mg P/L	P333373	

Ref. Method and Comment:

SM 2540 D-97: 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: P333466

Component	Result	Code	Units
Turbidity	0.10	U	NTU

Reference Method: EPA 180.1 Rev. 2.0

Batch ID: P333467

Component	Result	Code	Units
Turbidity	0.10	U	NTU

Reference Method: EPA 200.7 Rev. 4.4

Batch ID: P333433

Component	Result	Code	Units
Iron	30	U	ug/L
Zinc	5.0	U	ug/L

Reference Method: EPA 200.8 Rev. 5.4

Batch ID: P333433

Component	Result	Code	Units
Arsenic	0.050	U	ug/L
Cadmium	0.020	U	ug/L
Chromium	0.40	U	ug/L
Copper	0.20	U	ug/L
Lead	0.050	U	ug/L
Nickel	0.20	U	ug/L
Silver	0.010	U	ug/L

Reference Method: EPA 300.0 Rev. 2.1

Batch ID: P333469

Component	Result	Code	Units
Sulfate	0.20	U	mg SO4/L

Quality Assurance Report Method Blank Results

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P333616

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

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P333617

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P333732

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P333733

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

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P333769

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

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P333844

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

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P334094

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

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P333601

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

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P333607

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

Quality Assurance Report

Method Blank Results

Reference Method: EPA 365.1 Rev. 2.0
 Batch ID: P333608

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

Reference Method: EPA 365.1 Rev. 2.0 dissolved
 Batch ID: P333370

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

Reference Method: EPA 365.1 Rev. 2.0 dissolved
 Batch ID: P333373

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

Reference Method: EPA 8270D
 Batch ID: P333326

Component	Result	Code	Units
Acetochlor	0.25	U	ng/L
Alachlor	0.25	U	ng/L
Ametryn	0.32	U	ng/L
Atrazine	0.25	U	ng/L
Atrazine Desethyl	1.5	U	ng/L
Azinphos Methyl	2.2	U	ng/L
Bromacil	0.50	U	ng/L
Butylate	0.40	U	ng/L
Chlorpyrifos Ethyl	0.25	U	ng/L
Chlorpyrifos Methyl	0.10	U	ng/L
Cyanazine	0.50	U	ng/L
Demeton	2.0	U	ng/L
Diazinon	0.12	U	ng/L
Disulfoton	0.50	U	ng/L
EPTC	1.2	U	ng/L
Ethion	0.15	U	ng/L
Ethoprop	0.10	U	ng/L
Fenamiphos	0.25	U	ng/L
Fipronil	0.25	U	ng/L
Fipronil Sulfide	0.15	U	ng/L
Fipronil Sulfone	0.15	U	ng/L
Fonofos	0.20	U	ng/L
Hexazinone	0.50	U	ng/L
Malathion	0.35	U	ng/L
Metalaxyl	0.20	U	ng/L
Metolachlor	0.25	U	ng/L
Metribuzin	0.20	U	ng/L
Mevinphos	0.50	U	ng/L
Molinate	0.30	U	ng/L
Norflurazon	0.50	U	ng/L
Parathion Ethyl	0.25	U	ng/L
Parathion Methyl	0.25	U	ng/L
Pendimethalin	1.0	U	ng/L
Phorate	0.25	U	ng/L

Quality Assurance Report Method Blank Results

Reference Method: EPA 8270D
Batch ID: P333326

Component	Result	Code	Units
Prometon	0.90	U	ng/L
Prometryn	0.20	U	ng/L
Simazine	0.50	U	ng/L
Terbufos	0.10	U	ng/L
Terbutylazine	0.42	U	ng/L

Reference Method: EPA 8270D
Batch ID: P333416

Component	Result	Code	Units
Aldrin	4.0	U	ng/L
Alpha-BHC	2.0	U	ng/L
Alpha-Chlordane	1.0	U	ng/L
Beta-BHC	4.0	U	ng/L
Carbophenothion	4.0	U	ng/L
Chlorothalonil	2.0	U	ng/L
Cypermethrin	20	U	ng/L
DDD-p,p'	3.0	U	ng/L
DDE-p,p'	3.0	U	ng/L
DDT-p,p'	3.0	U	ng/L
Delta-BHC	4.0	U	ng/L
Dicofol	30	U	ng/L
Dieldrin	4.0	U	ng/L
Endosulfan I	4.0	U	ng/L
Endosulfan II	4.0	U	ng/L
Endosulfan Sulfate	2.0	U	ng/L
Endrin	2.0	U	ng/L
Endrin Aldehyde	2.0	U	ng/L
Endrin Ketone	2.0	U	ng/L
Gamma-BHC	4.0	U	ng/L
Gamma-Chlordane	1.0	U	ng/L
Heptachlor	1.5	U	ng/L
Heptachlor Epoxide	2.0	U	ng/L
Methoxychlor	4.0	U	ng/L
Mirex	2.0	U	ng/L
Permethrin	10	U	ng/L
Trifluralin	1.0	U	ng/L

Reference Method: EPA 8276
Batch ID: P333416

Component	Result	Code	Units
Chlordane	2.5	U	ng/L
Toxaphene	12	U	ng/L

Reference Method: EPA 8321B
Batch ID: P333125

Component	Result	Code	Units
Pyraclostrobin	0.0020	U	ug/L

Quality Assurance Report Method Blank Results

Reference Method: EPA 8321B
Batch ID: P333126

Component	Result	Code	Units
Glyphosate	0.50	U	ug/L

Reference Method: EPA 8321B
Batch ID: P333231

Component	Result	Code	Units
Sucralose	0.010	U	ug/L

Reference Method: SM 2320 B-97
Batch ID: P333537

Component	Result	Code	Units
Total Alkalinity	0.65	U	mg CaCO3/L

Reference Method: SM 2320 B-97
Batch ID: P333739

Component	Result	Code	Units
Total Alkalinity	0.65	U	mg CaCO3/L

Reference Method: SM 2320 B-97
Batch ID: P333855

Component	Result	Code	Units
Total Alkalinity	0.65	U	mg CaCO3/L

Reference Method: SM 2540 D-97
Batch ID: P333936

Component	Result	Code	Units
TSS	2	U	mg/L

Reference Method: SM 2540 D-97
Batch ID: P333937

Component	Result	Code	Units
TSS	2	U	mg/L

Reference Method: SM 4500 F-C-97
Batch ID: P333742

Component	Result	Code	Units
Fluoride	0.035	U	mg F/L

Reference Method: SM 4500 F-C-97
Batch ID: P333743

Component	Result	Code	Units
Fluoride	0.035	U	mg F/L

Quality Assurance Report Method Blank Results

Reference Method: SM 4500 F-C-97
Batch ID: P333861

Component	Result	Code	Units
Fluoride	0.035	U	mg F/L

Reference Method: SM 4500 F-C-97
Batch ID: P334022

Component	Result	Code	Units
Fluoride	0.035	U	mg F/L

Reference Method: SM 5310 B-00
Batch ID: P333687

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

Reference Method: SM 5310 B-00
Batch ID: P333991

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

Reference Method: USGS O-2060-01
Batch ID: P333253

Component	Result	Code	Units
2,4-D	0.0020	U	ug/L
Acetaminophen	0.0080	U	ug/L
Bentazon	8.0E-04	U	ug/L
Carbamazepine	4.0E-04	U	ug/L
Diuron	8.0E-04	U	ug/L
Fenuron	0.0080	U	ug/L
Fluridone	4.0E-04	U	ug/L
Imidacloprid	8.0E-04	U	ug/L
Linuron	0.0040	U	ug/L
MCP	0.0020	U	ug/L
Primidone	0.0040	U	ug/L
Triclopyr	0.0040	U	ug/L

Reference Method: USGS O-2060-01
Batch ID: P333480

Component	Result	Code	Units
2,4-D	0.0020	U	ug/L
Bentazon	8.0E-04	U	ug/L
MCP	0.0020	U	ug/L
Triclopyr	0.0040	U	ug/L

Reference Method: USGS O-2060-01
Batch ID: P334168

Component	Result	Code	Units
Acetaminophen	0.0080	U	ug/L
Carbamazepine	4.0E-04	U	ug/L

Quality Assurance Report Method Blank Results

Reference Method: USGS O-2060-01
Batch ID: P334168

Component	Result	Code	Units
Diuron	8.0E-04	U	ug/L
Fenuron	0.0080	U	ug/L
Fluridone	4.0E-04	U	ug/L
Imidacloprid	8.0E-04	U	ug/L
Linuron	0.0040	U	ug/L
Primidone	0.0040	U	ug/L

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: EPA 200.7 Rev. 4.4
Batch ID: P333433

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Iron	104		P	85 - 115
Zinc	98.5		P	85 - 115

Reference Method: EPA 200.8 Rev. 5.4
Batch ID: P333433

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Arsenic	102		P	85 - 115
Cadmium	106		P	85 - 115
Chromium	103		P	85 - 115
Copper	98.5		P	85 - 115
Lead	99.6		P	85 - 115
Nickel	101		P	85 - 115
Silver	100		P	85 - 115

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P333469

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Sulfate	95.0		P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P333616

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

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P333617

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P333732

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P333732

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P333733

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Kjeldahl Nitrogen	96.3		P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P333769

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

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P333844

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

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P334094

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: P333601

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Total-P	94.4		P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P333607

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

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P333608

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Total-P	97.2		P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Batch ID: P333370

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

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: EPA 365.1 Rev. 2.0 dissolved
 Batch ID: P333373

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

Reference Method: EPA 8270D
 Batch ID: P333326

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Acetochlor	92.3	93.2	P/P	78 - 118
Alachlor	101	95.4	P/P	77 - 119
Ametryn	93.3	87.9	P/P	61 - 136
Atrazine	105	108	P/P	73 - 120
Atrazine Desethyl	101	91.4	P/P	16 - 122
Azinphos Methyl	140	129	P/P	69 - 186
Bromacil	83.4	78.8	P/P	40 - 125
Butylate	60.4	46.6	P/P	32 - 87.0
Chlorpyrifos Ethyl	105	101	P/P	53 - 110
Chlorpyrifos Methyl	106	107	P/P	31 - 119
Cyanazine	280	213	F/P	36 - 224
Demeton	98.3	98.6	P/P	39 - 122
Diazinon	107	101	P/P	75 - 119
Disulfoton	115	105	P/P	42 - 139
EPTC	55.0	37.8	P/P	33 - 96.0
Ethion	103	102	P/P	63 - 127
Ethoprop	91.8	88.9	P/P	65 - 107
Fenamiphos	99.3	98.5	P/P	64 - 137
Fipronil	104	108	P/P	60 - 126
Fipronil Sulfide	91.3	92.3	P/P	58 - 124
Fipronil Sulfone	86.3	87.6	P/P	57 - 126
Fonofos	89.5	88.5	P/P	65 - 111
Hexazinone	92.3	94.8	P/P	46 - 151
Malathion	95.5	99.8	P/P	68 - 132
Metaxyl	93.6	95.3	P/P	51 - 132
Metolachlor	92.1	91.5	P/P	78 - 119
Metribuzin	142	128	P/P	58 - 148
Mevinphos	90.4	74.3	P/P	34 - 128
Molinate	63.7	56.8	P/P	44 - 101
Norflurazon	98.1	96.1	P/P	63 - 129
Parathion Ethyl	93.2	96.2	P/P	80 - 109
Parathion Methyl	111	105	P/P	74 - 125
Pendimethalin	96.7	91.5	P/P	48 - 134
Phorate	97.9	88.7	P/P	52 - 119
Prometon	94.1	96.0	P/P	69 - 124
Prometryn	97.6	99.0	P/P	66 - 124
Simazine	93.3	106	P/P	61 - 134
Terbufos	102	98.2	P/P	58 - 115
Terbutylazine	92.4	94.8	P/P	77 - 113

Reference Method: EPA 8270D
 Batch ID: P333416

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Aldrin	45.9	45.4	P/P	26 - 88.0
Alpha-BHC	94.6	93.9	P/P	63 - 114

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: EPA 8270D

Batch ID: P333416

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Alpha-Chlordane	107	102	P/P	56 - 117
Beta-BHC	89.3	85.6	P/P	57 - 138
Carbophenothion	140	126	P/P	36 - 148
Chlorothalonil	76.1	67.9	P/P	26 - 173
Cypermethrin	107	101	P/P	42 - 159
DDD-p,p'	118	114	P/P	62 - 126
DDE-p,p'	108	105	P/P	53 - 115
DDT-p,p'	103	104	P/P	54 - 117
Delta-BHC	91.2	98.1	P/P	68 - 158
Dicofol	72.1	68.4	P/P	25 - 114
Dieldrin	107	101	P/P	59 - 126
Endosulfan I	103	95.4	P/P	62 - 138
Endosulfan II	103	95.9	P/P	61 - 150
Endosulfan Sulfate	117	108	P/P	63 - 132
Endrin	115	105	P/P	49 - 148
Endrin Aldehyde	103	99.7	P/P	50 - 144
Endrin Ketone	106	100	P/P	66 - 122
Gamma-BHC	87.5	80.1	P/P	60 - 137
Gamma-Chlordane	105	99.9	P/P	54 - 113
Heptachlor	91.3	85.9	P/P	43 - 104
Heptachlor Epoxide	108	101	P/P	64 - 118
Methoxychlor	110	100	P/P	63 - 129
Mirex	89.2	85.3	P/P	39 - 93.0
Permethrin	106	97.5	P/P	51 - 123
Trifluralin	90.1	85.7	P/P	35 - 187

Reference Method: EPA 8276

Batch ID: P333416

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Chlordane	69.2	79.2	P/P	48 - 121
Toxaphene	84.4	96.2	P/P	43 - 135

Reference Method: EPA 8321B

Batch ID: P333125

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Pyraclostrobin	95.2		P	40 - 150

Reference Method: EPA 8321B

Batch ID: P333126

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Glyphosate	115		P	40 - 150

Reference Method: EPA 8321B

Batch ID: P333231

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Sucralose	91.6		P	40 - 150

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: SM 2320 B-97
Batch ID: P333537

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Total Alkalinity	102		P	95 - 108

Reference Method: SM 2320 B-97
Batch ID: P333739

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Total Alkalinity	102		P	95 - 108

Reference Method: SM 2320 B-97
Batch ID: P333855

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Total Alkalinity	103		P	95 - 108

Reference Method: SM 4500 F-C-97
Batch ID: P333742

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Fluoride	96.0		P	92 - 103

Reference Method: SM 4500 F-C-97
Batch ID: P333743

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Fluoride	100		P	92 - 103

Reference Method: SM 4500 F-C-97
Batch ID: P333861

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Fluoride	96.8		P	92 - 103

Reference Method: SM 4500 F-C-97
Batch ID: P334022

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Fluoride	96.0		P	92 - 103

Reference Method: SM 5310 B-00
Batch ID: P333687

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Organic Carbon	98.4		P	85 - 115

Reference Method: SM 5310 B-00
Batch ID: P333991

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Organic Carbon	96.2		P	85 - 115

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: USGS O-2060-01
Batch ID: P333253

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2,4-D	88.8		P	40 - 150
Acetaminophen	125		P	30 - 150
Bentazon	80.3		P	30 - 150
Carbamazepine	126		P	40 - 150
Diuron	114		P	40 - 150
Fenuron	116		P	40 - 150
Fluridone	119		P	40 - 150
Imidacloprid	102		P	40 - 160
Linuron	120		P	40 - 150
MCP	82.8		P	40 - 150
Primidone	108		P	40 - 150
Triclopyr	77.2		P	40 - 150

Reference Method: USGS O-2060-01
Batch ID: P333480

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2,4-D	64.6		P	40 - 150
Bentazon	31.0		P	30 - 150
MCP	63.8		P	40 - 150
Triclopyr	65.2		P	40 - 150

Reference Method: USGS O-2060-01
Batch ID: P334168

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Acetaminophen	132		P	30 - 150
Carbamazepine	148		P	40 - 150
Diuron	73.4		P	40 - 150
Fenuron	109		P	40 - 150
Fluridone	87.9		P	40 - 150
Imidacloprid	116		P	40 - 160
Linuron	109		P	40 - 150
Primidone	91.6		P	40 - 150

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 200.7 Rev. 4.4
Batch ID: P333433

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936345	Iron	97.6		P	80 - 120
1936345	Zinc	98.9		P	80 - 120
1936735	Iron	108		P	80 - 120
1936735	Zinc	98.1	99.4	P/P	80 - 120

Reference Method: EPA 200.8 Rev. 5.4
Batch ID: P333433

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

Reference Method: EPA 200.8 Rev. 5.4
Batch ID: P333433

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936345	Arsenic	102		P	80 - 120
1936345	Cadmium	107		P	80 - 120
1936345	Chromium	98.9		P	80 - 120
1936345	Copper	97.8		P	80 - 120
1936345	Lead	98.7		P	80 - 120
1936345	Nickel	98.2		P	80 - 120
1936345	Silver	99.2		P	80 - 120
1936735	Arsenic	106	106	P/P	80 - 120
1936735	Cadmium	108	109	P/P	80 - 120
1936735	Chromium	102	103	P/P	80 - 120
1936735	Copper	98.4	99.0	P/P	80 - 120
1936735	Lead	102	102	P/P	80 - 120
1936735	Nickel	101	103	P/P	80 - 120
1936735	Silver	101	115	P/P	80 - 120

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P333469

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936799	Sulfate	98.8		P	90 - 110
1936916	Sulfate	98.1		P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P333616

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936843	Ammonia-N	106	105	P/P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P333617

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936814	Ammonia-N	99.3	95.1	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P333732

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936774	Kjeldahl Nitrogen	92.7	92.0	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P333733

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936817	Kjeldahl Nitrogen	94.5	98.3	P/P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P333769

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936848	NO2NO3-N	103	103	P/P	90 - 110

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P333844

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936843	NO2NO3-N	104	102	P/P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P334094

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936850	NO2NO3-N	101	102	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P333601

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936899	Total-P	96.1	96.0	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P333607

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1937000	Total-P	99.0	93.6	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P333608

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1937128	Total-P	95.3	97.7	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Batch ID: P333370

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936721	O-Phosphate-P	98.8	94.5	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Batch ID: P333373

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936821	O-Phosphate-P	95.8	98.9	P/P	90 - 110

Reference Method: EPA 8270D
Batch ID: P333326

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936879	Acetochlor	99.3	97.4	P/P	74 - 123
1936879	Alachlor	97.3	92.3	P/P	73 - 124
1936879	Ametryn	111	108	P/P	56 - 149
1936879	Atrazine Desethyl	94.6	92.6	P/P	12 - 103
1936879	Azinphos Methyl	140	129	P/P	60 - 202
1936879	Bromacil	94.8	84.4	P/P	42 - 133
1936879	Butylate	25.5	29.4	P/P	10 - 85.0
1936879	Chlorpyrifos Ethyl	92.2	94.7	P/P	53 - 113
1936879	Chlorpyrifos Methyl	94.4	92.2	P/P	40 - 115
1936879	Cyanazine	232	217	F/F	22 - 210

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 8270D

Batch ID: P333326

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936879	Demeton	84.9	80.2	P/P	17 - 149
1936879	Diazinon	107	110	P/P	72 - 124
1936879	Disulfoton	98.8	108	P/P	43 - 139
1936879	EPTC	20.4	24.7	P/P	10 - 86.0
1936879	Ethion	103	97.8	P/P	65 - 131
1936879	Ethoprop	81.6	85.1	P/P	59 - 110
1936879	Fenamiphos	100	88.2	P/P	57 - 138
1936879	Fipronil	114	96.9	P/P	40 - 130
1936879	Fipronil Sulfide	88.3	79.0	P/P	36 - 128
1936879	Fipronil Sulfone	89.1	68.6	P/P	16 - 145
1936879	Fonofos	76.7	84.4	P/P	60 - 112
1936879	Hexazinone	97.5	92.9	P/P	69 - 142
1936879	Malathion	97.3	92.8	P/P	68 - 132
1936879	Metalaxyl	101	92.7	P/P	66 - 118
1936879	Metolachlor	94.6	92.3	P/P	71 - 124
1936879	Metribuzin	151	132	F/P	61 - 140
1936879	Mevinphos	70.7	76.0	P/P	38 - 130
1936879	Molinate	37.8	40.6	P/P	23 - 99.0
1936879	Norflurazon	104	96.8	P/P	39 - 139
1936879	Parathion Ethyl	89.5	86.5	P/P	75 - 111
1936879	Parathion Methyl	100	100	P/P	64 - 130
1936879	Pendimethalin	97.5	94.4	P/P	26 - 173
1936879	Phorate	81.4	74.4	P/P	43 - 127
1936879	Prometon	128	107	P/P	50 - 144
1936879	Prometryn	108	104	P/P	69 - 126
1936879	Terbufos	89.5	89.6	P/P	54 - 125
1936879	Terbutylazine	105	99.9	P/P	76 - 113

Reference Method: EPA 8270D

Batch ID: P333416

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936868	Aldrin	54.4	47.1	P/P	22 - 97.0
1936868	Alpha-BHC	83.6	84.6	P/P	43 - 132
1936868	Alpha-Chlordane	94.6	85.2	P/P	36 - 126
1936868	Beta-BHC	66.5	64.9	P/P	41 - 150
1936868	Carbophenothion	101	82.1	P/P	13 - 196
1936868	Chlorothalonil	110	109	P/P	10 - 266
1936868	Cypermethrin	72.7	61.3	P/P	37 - 161
1936868	DDD-p,p'	91.3	82.4	P/P	44 - 131
1936868	DDE-p,p'	101	96.0	P/P	32 - 127
1936868	DDT-p,p'	105	97.3	P/P	45 - 116
1936868	Delta-BHC	71.1	70.8	P/P	50 - 201
1936868	Dicofol	30.7	32.8	P/P	10 - 100
1936868	Dieldrin	103	84.2	P/P	39 - 142
1936868	Endosulfan I	89.7	78.8	P/P	51 - 139
1936868	Endosulfan II	82.2	72.8	P/P	49 - 155
1936868	Endosulfan Sulfate	93.4	89.3	P/P	54 - 136
1936868	Endrin	87.9	80.0	P/P	38 - 141
1936868	Endrin Aldehyde	82.2	69.8	P/P	14 - 152
1936868	Endrin Ketone	89.0	85.2	P/P	60 - 128
1936868	Gamma-BHC	74.4	73.3	P/P	48 - 157

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 8270D

Batch ID: P333416

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936868	Gamma-Chlordane	89.1	79.7	P/P	35 - 123
1936868	Heptachlor	86.0	75.2	P/P	25 - 112
1936868	Heptachlor Epoxide	99.7	90.6	P/P	48 - 125
1936868	Methoxychlor	98.2	96.1	P/P	52 - 127
1936868	Mirex	86.2	76.7	P/P	25 - 108
1936868	Permethrin	89.4	78.7	P/P	46 - 133
1936868	Trifluralin	87.7	79.7	P/P	29 - 254

Reference Method: EPA 8276

Batch ID: P333416

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936894	Chlordane	70.9	64.5	P/P	44 - 134
1936894	Toxaphene	99.7	93.2	P/P	36 - 147

Reference Method: EPA 8321B

Batch ID: P333125

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1935464	Pyraclostrobin	90.1	93.8	P/P	40 - 150

Reference Method: EPA 8321B

Batch ID: P333126

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1935261	Glyphosate	122	123	P/P	40 - 150

Reference Method: EPA 8321B

Batch ID: P333231

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936514	Sucralose	40.3	41.0	P/P	40 - 150

Reference Method: SM 4500 F-C-97

Batch ID: P333742

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936807	Fluoride	98.8	99.3	P/P	91 - 105

Reference Method: SM 4500 F-C-97

Batch ID: P333743

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936478	Fluoride	96.5	95.8	P/P	91 - 105

Reference Method: SM 4500 F-C-97

Batch ID: P333861

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1938516	Fluoride	96.7	96.2	P/P	91 - 105

Quality Assurance Report Matrix Spike Accuracy

Reference Method: SM 4500 F-C-97
 Batch ID: P334022

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936842	Fluoride	96.7	98.1	P/P	91 - 105

Reference Method: SM 5310 B-00
 Batch ID: P333687

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936801	Organic Carbon	97.0	97.6	P/P	85 - 115

Reference Method: SM 5310 B-00
 Batch ID: P333991

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1935843	Organic Carbon	90.0	89.8	P/P	85 - 115

Reference Method: USGS O-2060-01
 Batch ID: P333253

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1936357	Acetaminophen	113	105	P/P	30 - 150
1936357	Carbamazepine	124	128	P/P	40 - 150
1936357	Diuron	84.3	83.1	P/P	40 - 150
1936357	Fenuron	102	102	P/P	40 - 150
1936357	Linuron	109	108	P/P	40 - 150
1936357	MCP	58.2	57.7	P/P	40 - 150
1936357	Primidone	109	109	P/P	40 - 150
1936357	Triclopyr	67.1	60.8	P/P	40 - 150

Reference Method: USGS O-2060-01
 Batch ID: P333480

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1937156	2,4-D	73.9	76.8	P/P	40 - 150
1937156	Bentazon	25.0	26.6	F/F	30 - 150
1937156	MCP	50.8	48.6	P/P	40 - 150
1937156	Triclopyr	57.4	50.2	P/P	40 - 150

Reference Method: USGS O-2060-01
 Batch ID: P334168

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1937156	Acetaminophen	94.0	89.2	P/P	30 - 150
1937156	Carbamazepine	116	110	P/P	40 - 150
1937156	Diuron	83.7	74.9	P/P	40 - 150
1937156	Fenuron	87.7	87.1	P/P	40 - 150
1937156	Linuron	99.6	93.8	P/P	40 - 150
1937156	Primidone	105	101	P/P	40 - 150

Quality Assurance Report Precision

Quality Assurance Report Precision

Reference Method: EPA 180.1 Rev. 2.0
Batch ID: P333466

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936807	Turbidity	6.90	Sample	P	0 - 20

Reference Method: EPA 180.1 Rev. 2.0
Batch ID: P333467

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936854	Turbidity	7.87	Sample	P	0 - 20

Reference Method: EPA 200.7 Rev. 4.4
Batch ID: P333433

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936735	Iron	0.233	Spike	P	0 - 20
1936735	Zinc	1.26	Spike	P	0 - 20

Reference Method: EPA 200.8 Rev. 5.4
Batch ID: P333433

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936735	Arsenic	0.381	Spike	P	0 - 20
1936735	Cadmium	1.03	Spike	P	0 - 20
1936735	Chromium	1.14	Spike	P	0 - 20
1936735	Copper	0.650	Spike	P	0 - 20
1936735	Lead	0.588	Spike	P	0 - 20
1936735	Nickel	1.07	Spike	P	0 - 20
1936735	Silver	12.8	Spike	P	0 - 20

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P333469

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936799	Sulfate	0.539	Sample	P	0 - 20

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P333616

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936843	Ammonia-N	0.808	Spike	P	0 - 20

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P333617

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936814	Ammonia-N	3.86	Spike	P	0 - 20

Quality Assurance Report Precision

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P333732

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936774	Kjeldahl Nitrogen	0.691	Spike	P	0 - 20

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P333733

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936817	Kjeldahl Nitrogen	3.44	Spike	P	0 - 20

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P333769

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936848	NO2NO3-N	0.0	Spike	P	0 - 20

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P333844

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936843	NO2NO3-N	0.598	Spike	P	0 - 20

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P334094

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936850	NO2NO3-N	0.284	Spike	P	0 - 20

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P333601

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936899	Total-P	0.0937	Spike	P	0 - 20

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P333607

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1937000	Total-P	5.58	Spike	P	0 - 20

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P333608

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1937128	Total-P	2.15	Spike	P	0 - 20

Quality Assurance Report Precision

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Batch ID: P333370

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936721	O-Phosphate-P	4.23	Spike	P	0 - 20

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Batch ID: P333373

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936821	O-Phosphate-P	3.18	Spike	P	0 - 20

Reference Method: EPA 8270D
Batch ID: P333326

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936879	Acetochlor	2.00	Spike	P	0 - 30
1936879	Alachlor	4.86	Spike	P	0 - 30
1936879	Ametryn	2.79	Spike	P	0 - 30
1936879	Atrazine	11.7	Spike	P	0 - 30
1936879	Atrazine Desethyl	2.14	Spike	P	0 - 30
1936879	Azinphos Methyl	8.17	Spike	P	0 - 30
1936879	Bromacil	11.6	Spike	P	0 - 30
1936879	Butylate	14.1	Spike	P	0 - 30
1936879	Chlorpyrifos Ethyl	2.70	Spike	P	0 - 30
1936879	Chlorpyrifos Methyl	2.36	Spike	P	0 - 30
1936879	Cyanazine	6.74	Spike	P	0 - 30
1936879	Demeton	5.69	Spike	P	0 - 30
1936879	Diazinon	3.05	Spike	P	0 - 30
1936879	Disulfoton	8.89	Spike	P	0 - 30
1936879	EPTC	19.2	Spike	P	0 - 30
1936879	Ethion	5.06	Spike	P	0 - 30
1936879	Ethoprop	4.28	Spike	P	0 - 30
1936879	Fenamiphos	13.0	Spike	P	0 - 30
1936879	Fipronil	14.7	Spike	P	0 - 30
1936879	Fipronil Sulfide	9.40	Spike	P	0 - 30
1936879	Fipronil Sulfone	19.9	Spike	P	0 - 30
1936879	Fonofos	9.55	Spike	P	0 - 30
1936879	Hexazinone	4.29	Spike	P	0 - 30
1936879	Malathion	4.69	Spike	P	0 - 30
1936879	Metalaxyl	9.04	Spike	P	0 - 30
1936879	Metolachlor	1.65	Spike	P	0 - 30
1936879	Metribuzin	8.95	Spike	P	0 - 30
1936879	Mevinphos	7.24	Spike	P	0 - 30
1936879	Molinate	7.21	Spike	P	0 - 30
1936879	Norflurazon	7.59	Spike	P	0 - 30
1936879	Parathion Ethyl	3.41	Spike	P	0 - 30
1936879	Parathion Methyl	0.225	Spike	P	0 - 30
1936879	Pendimethalin	3.30	Spike	P	0 - 30
1936879	Phorate	9.01	Spike	P	0 - 30
1936879	Prometon	17.8	Spike	P	0 - 30
1936879	Prometryn	3.16	Spike	P	0 - 30
1936879	Simazine	8.89	Spike	P	0 - 30

Quality Assurance Report Precision

Reference Method: EPA 8270D
Batch ID: P333326

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936879	Terbufos	0.0894	Spike	P	0 - 30
1936879	Terbutylazine	4.77	Spike	P	0 - 30
LFB	Acetochlor	1.04	LCS	P	0 - 30
LFB	Alachlor	5.89	LCS	P	0 - 30
LFB	Ametryn	6.00	LCS	P	0 - 30
LFB	Atrazine	2.69	LCS	P	0 - 30
LFB	Atrazine Desethyl	10.3	LCS	P	0 - 30
LFB	Azinphos Methyl	7.66	LCS	P	0 - 30
LFB	Bromacil	5.73	LCS	P	0 - 30
LFB	Butylate	25.6	LCS	P	0 - 30
LFB	Chlorpyrifos Ethyl	4.12	LCS	P	0 - 30
LFB	Chlorpyrifos Methyl	0.738	LCS	P	0 - 30
LFB	Cyanazine	27.2	LCS	P	0 - 30
LFB	Demeton	0.291	LCS	P	0 - 30
LFB	Diazinon	5.37	LCS	P	0 - 30
LFB	Disulfoton	9.24	LCS	P	0 - 30
LFB	EPTC	37.1	LCS	F	0 - 30
LFB	Ethion	1.08	LCS	P	0 - 30
LFB	Ethoprop	3.20	LCS	P	0 - 30
LFB	Fenamiphos	0.810	LCS	P	0 - 30
LFB	Fipronil	3.64	LCS	P	0 - 30
LFB	Fipronil Sulfide	0.997	LCS	P	0 - 30
LFB	Fipronil Sulfone	1.38	LCS	P	0 - 30
LFB	Fonofos	1.06	LCS	P	0 - 30
LFB	Hexazinone	2.59	LCS	P	0 - 30
LFB	Malathion	4.39	LCS	P	0 - 30
LFB	Metalaxyl	1.79	LCS	P	0 - 30
LFB	Metolachlor	0.628	LCS	P	0 - 30
LFB	Metribuzin	10.4	LCS	P	0 - 30
LFB	Mevinphos	19.5	LCS	P	0 - 30
LFB	Molinate	11.4	LCS	P	0 - 30
LFB	Norflurazon	2.01	LCS	P	0 - 30
LFB	Parathion Ethyl	3.23	LCS	P	0 - 30
LFB	Parathion Methyl	5.23	LCS	P	0 - 30
LFB	Pendimethalin	5.50	LCS	P	0 - 30
LFB	Phorate	9.79	LCS	P	0 - 30
LFB	Prometon	2.08	LCS	P	0 - 30
LFB	Prometryn	1.36	LCS	P	0 - 30
LFB	Simazine	13.0	LCS	P	0 - 30
LFB	Terbufos	3.55	LCS	P	0 - 30
LFB	Terbutylazine	2.53	LCS	P	0 - 30

Reference Method: EPA 8270D
Batch ID: P333416

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936868	Aldrin	14.4	Spike	P	0 - 30
1936868	Alpha-BHC	1.15	Spike	P	0 - 30
1936868	Alpha-Chlordane	10.4	Spike	P	0 - 30
1936868	Beta-BHC	2.38	Spike	P	0 - 30

Quality Assurance Report Precision

Reference Method: EPA 8270D
Batch ID: P333416

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936868	Carbophenothion	20.5	Spike	P	0 - 30
1936868	Chlorothalonil	1.51	Spike	P	0 - 30
1936868	Cypermethrin	17.0	Spike	P	0 - 30
1936868	DDD-p,p'	10.2	Spike	P	0 - 30
1936868	DDE-p,p'	4.89	Spike	P	0 - 30
1936868	DDT-p,p'	7.33	Spike	P	0 - 30
1936868	Delta-BHC	0.311	Spike	P	0 - 30
1936868	Dicofol	6.44	Spike	P	0 - 30
1936868	Dieldrin	15.2	Spike	P	0 - 30
1936868	Endosulfan I	13.0	Spike	P	0 - 30
1936868	Endosulfan II	12.2	Spike	P	0 - 30
1936868	Endosulfan Sulfate	4.53	Spike	P	0 - 30
1936868	Endrin	9.37	Spike	P	0 - 30
1936868	Endrin Aldehyde	16.3	Spike	P	0 - 30
1936868	Endrin Ketone	4.34	Spike	P	0 - 30
1936868	Gamma-BHC	1.46	Spike	P	0 - 30
1936868	Gamma-Chlordane	11.1	Spike	P	0 - 30
1936868	Heptachlor	13.3	Spike	P	0 - 30
1936868	Heptachlor Epoxide	9.59	Spike	P	0 - 30
1936868	Methoxychlor	2.22	Spike	P	0 - 30
1936868	Mirex	11.7	Spike	P	0 - 30
1936868	Permethrin	12.7	Spike	P	0 - 30
1936868	Trifluralin	9.50	Spike	P	0 - 30
LFB	Aldrin	1.07	LCS	P	0 - 30
LFB	Alpha-BHC	0.762	LCS	P	0 - 30
LFB	Alpha-Chlordane	5.27	LCS	P	0 - 30
LFB	Beta-BHC	4.18	LCS	P	0 - 30
LFB	Carbophenothion	10.5	LCS	P	0 - 30
LFB	Chlorothalonil	11.4	LCS	P	0 - 30
LFB	Cypermethrin	5.98	LCS	P	0 - 30
LFB	DDD-p,p'	3.18	LCS	P	0 - 30
LFB	DDE-p,p'	3.00	LCS	P	0 - 30
LFB	DDT-p,p'	1.25	LCS	P	0 - 30
LFB	Delta-BHC	7.29	LCS	P	0 - 30
LFB	Dicofol	5.30	LCS	P	0 - 30
LFB	Dieldrin	5.57	LCS	P	0 - 30
LFB	Endosulfan I	7.89	LCS	P	0 - 30
LFB	Endosulfan II	6.97	LCS	P	0 - 30
LFB	Endosulfan Sulfate	8.19	LCS	P	0 - 30
LFB	Endrin	9.88	LCS	P	0 - 30
LFB	Endrin Aldehyde	2.91	LCS	P	0 - 30
LFB	Endrin Ketone	5.09	LCS	P	0 - 30
LFB	Gamma-BHC	8.74	LCS	P	0 - 30
LFB	Gamma-Chlordane	5.16	LCS	P	0 - 30
LFB	Heptachlor	6.05	LCS	P	0 - 30
LFB	Heptachlor Epoxide	6.15	LCS	P	0 - 30
LFB	Methoxychlor	9.42	LCS	P	0 - 30
LFB	Mirex	4.53	LCS	P	0 - 30
LFB	Permethrin	8.69	LCS	P	0 - 30
LFB	Trifluralin	5.05	LCS	P	0 - 30

Quality Assurance Report Precision

Reference Method: EPA 8276
Batch ID: P333416

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936894	Chlordane	9.35	Spike	P	0 - 30
1936894	Toxaphene	6.70	Spike	P	0 - 30
LFB	Chlordane	13.6	LCS	P	0 - 30
LFB	Toxaphene	13.0	LCS	P	0 - 30

Reference Method: EPA 8321B
Batch ID: P333125

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1935464	Pyraclostrobin	4.02	Spike	P	0 - 30

Reference Method: EPA 8321B
Batch ID: P333126

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1935261	Glyphosate	1.35	Spike	P	0 - 30

Reference Method: EPA 8321B
Batch ID: P333231

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936514	Sucralose	1.76	Spike	P	0 - 30

Reference Method: SM 2320 B-97
Batch ID: P333537

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1935543	Total Alkalinity	0.490	Sample	P	0 - 4.8

Reference Method: SM 2320 B-97
Batch ID: P333739

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936807	Total Alkalinity	1.68	Sample	P	0 - 4.8

Reference Method: SM 2320 B-97
Batch ID: P333855

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1938516	Total Alkalinity	1.14	Sample	P	0 - 4.8

Quality Assurance Report Precision

Reference Method: SM 4500 F-C-97
Batch ID: P333742

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936807	Fluoride	0.472	Spike	P	0 - 3.0

Reference Method: SM 4500 F-C-97
Batch ID: P333743

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936478	Fluoride	0.464	Spike	P	0 - 3.0

Reference Method: SM 4500 F-C-97
Batch ID: P333861

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1938516	Fluoride	0.474	Spike	P	0 - 3.0

Reference Method: SM 4500 F-C-97
Batch ID: P334022

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936842	Fluoride	0.986	Spike	P	0 - 3.0

Reference Method: SM 5310 B-00
Batch ID: P333687

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936801	Organic Carbon	0.464	Spike	P	0 - 20

Reference Method: SM 5310 B-00
Batch ID: P333991

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1935843	Organic Carbon	0.148	Spike	P	0 - 20

Reference Method: USGS O-2060-01
Batch ID: P333253

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936357	2,4-D	1.19	Spike	P	0 - 30
1936357	Acetaminophen	6.83	Spike	P	0 - 30
1936357	Bentazon	1.22	Spike	P	0 - 30
1936357	Carbamazepine	3.34	Spike	P	0 - 30
1936357	Diuron	1.18	Spike	P	0 - 30
1936357	Fenuron	0.0976	Spike	P	0 - 30
1936357	Fluridone	26.5	Spike	P	0 - 30
1936357	Imidacloprid	3.73	Spike	P	0 - 30
1936357	Linuron	0.0737	Spike	P	0 - 30

Quality Assurance Report Precision

Reference Method: USGS O-2060-01
Batch ID: P333253

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1936357	MCP	0.794	Spike	P	0 - 30
1936357	Primidone	0.370	Spike	P	0 - 30
1936357	Triclopyr	9.94	Spike	P	0 - 30

Reference Method: USGS O-2060-01
Batch ID: P333480

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1937156	2,4-D	2.77	Spike	P	0 - 30
1937156	Bentazon	2.17	Spike	P	0 - 30
1937156	MCP	4.43	Spike	P	0 - 30
1937156	Triclopyr	13.3	Spike	P	0 - 30

Reference Method: USGS O-2060-01
Batch ID: P334168

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1937156	Acetaminophen	5.26	Spike	P	0 - 30
1937156	Carbamazepine	5.31	Spike	P	0 - 30
1937156	Diuron	7.56	Spike	P	0 - 30
1937156	Fenuron	0.554	Spike	P	0 - 30
1937156	Fluridone	15.2	Spike	P	0 - 30
1937156	Imidacloprid	1.58	Spike	P	0 - 30
1937156	Linuron	5.98	Spike	P	0 - 30
1937156	Primidone	3.43	Spike	P	0 - 30

* 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 Surrogates

Lab Sample ID: 1936871
Field Sample ID: G2NE1136 10112017

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8321B	Acetaminophen-d4	83.7	P	30 - 160
EPA 8321B	Carbamazepine-d10	141	P	30 - 160
EPA 8321B	Diuron-d6	102	P	30 - 160
EPA 8321B	Primidone-d5	132	P	30 - 160
EPA 8321B	Sucralose-d6	42.6	P	40 - 160
USGS O-2060-01	2,4-D-d3	88.2	P	40 - 160
USGS O-2060-01	Acetaminophen-d4	83.7	P	30 - 160
USGS O-2060-01	Carbamazepine-d10	141	P	30 - 160
USGS O-2060-01	Diuron-d6	102	P	30 - 160
USGS O-2060-01	Primidone-d5	132	P	30 - 160
USGS O-2060-01	Sucralose-d6	42.6	P	40 - 160

Quality Assurance Report Surrogates

Lab Sample ID: 1936872
Field Sample ID: G2NE0745 10112017

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8321B	Acetaminophen-d4	90.0	P	30 - 160
EPA 8321B	Acetaminophen-d4	90.0	P	30 - 160
EPA 8321B	Carbamazepine-d10	132	P	30 - 160
EPA 8321B	Carbamazepine-d10	132	P	30 - 160
EPA 8321B	Diuron-d6	103	P	30 - 160
EPA 8321B	Diuron-d6	90.8	P	30 - 160
EPA 8321B	Diuron-d6	103	P	30 - 160
EPA 8321B	Diuron-d6	90.8	P	30 - 160
EPA 8321B	Glyphosate 13C 15N	95.1	P	40 - 160
EPA 8321B	Primidone-d5	118	P	30 - 160
EPA 8321B	Primidone-d5	118	P	30 - 160
EPA 8321B	Sucralose-d6	45.0	P	40 - 160
EPA 8321B	Sucralose-d6	45.0	P	40 - 160
USGS O-2060-01	2,4-D-d3	72.0	P	40 - 160
USGS O-2060-01	Acetaminophen-d4	90.0	P	30 - 160
USGS O-2060-01	Carbamazepine-d10	132	P	30 - 160
USGS O-2060-01	Diuron-d6	103	P	30 - 160
USGS O-2060-01	Diuron-d6	90.8	P	30 - 160
USGS O-2060-01	Primidone-d5	118	P	30 - 160
USGS O-2060-01	Sucralose-d6	45.0	P	40 - 160

Lab Sample ID: 1936878
Field Sample ID: G2NE0745 10112017

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8270D	Decachlorobiphenyl	84.4	P	39 - 118
EPA 8270D	Tetrachloro-m-xylene	35.6	P	32 - 103
EPA 8276	Decachlorobiphenyl	96.2	P	31 - 100

Lab Sample ID: 1936879
Field Sample ID: G2NE0745 10112017

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8270D	Malathion-d7	84.0	P	53 - 135
EPA 8270D	Simazine-d10	104	P	71 - 126

Quality Assurance Report Calibration Verification

Reference Method: EPA 8321B
Run ID: A79537
Included Lab Sample IDs: 1936872

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Glyphosate	93.1	120	P/P	70 - 160

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Run ID: A79548
Included Lab Sample IDs: 1936844, 1936851, 1936852, 1936853, 1936856

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
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Quality Assurance Report Calibration Verification

Reference Method: EPA 365.1 Rev. 2.0 dissolved

Run ID: A79548

Included Lab Sample IDs: 1936844, 1936851, 1936852, 1936853, 1936856

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
O-Phosphate-P	94.2	96.6	P/P	90 - 110

Reference Method: EPA 8321B

Run ID: A79585

Included Lab Sample IDs: 1936872

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Pyraclostrobin	98.7	99.6	P/P	60 - 150

Reference Method: EPA 180.1 Rev. 2.0

Run ID: A79592

Included Lab Sample IDs: 1936842, 1936845, 1936846, 1936847, 1936854

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Turbidity	100	99.5	P/P	95 - 105
Turbidity	99.0	100	P/P	95 - 105

Reference Method: EPA 300.0 Rev. 2.1

Run ID: A79593

Included Lab Sample IDs: 1936842

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Sulfate	104	107	P/P	90 - 110

Reference Method: EPA 200.7 Rev. 4.4

Run ID: A79619

Included Lab Sample IDs: 1936880

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Iron	102	101	P/P	90 - 110
Zinc	97.5	96.7	P/P	90 - 110

Reference Method: SM 2320 B-97

Run ID: A79625

Included Lab Sample IDs: 1936846

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total Alkalinity	100	103	P/P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0

Run ID: A79639

Included Lab Sample IDs: 1936843, 1936848, 1936849, 1936850, 1936855

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Ammonia-N	102	101	P/P	90 - 110
Ammonia-N	102	101	P/P	90 - 110
Ammonia-N	103	102	P/P	90 - 110

Quality Assurance Report Calibration Verification

Reference Method: EPA 200.8 Rev. 5.4

Run ID: A79650

Included Lab Sample IDs: 1936880

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Arsenic	105	107	P/P	90 - 110
Cadmium	107	106	P/P	90 - 110
Chromium	105	103	P/P	90 - 110
Copper	103	105	P/P	90 - 110
Lead	102	102	P/P	90 - 110
Nickel	102	106	P/P	90 - 110
Silver	101	101	P/P	90 - 110

Reference Method: SM 5310 B-00

Run ID: A79660

Included Lab Sample IDs: 1936848, 1936849, 1936850, 1936855

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Organic Carbon	97.8	98.2	P/P	90 - 110

Reference Method: USGS O-2060-01

Run ID: A79661

Included Lab Sample IDs: 1936871

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
2,4-D	109	95.1	P/P	50 - 150
Acetaminophen	112	106	P/P	60 - 150
Bentazon	127	122	P/P	50 - 150
Carbamazepine	115	116	P/P	60 - 150
Diuron	105	108	P/P	60 - 150
Fenuron	109	105	P/P	60 - 150
Fluridone	116	116	P/P	60 - 160
Imidacloprid	101	106	P/P	60 - 150
Linuron	117	120	P/P	60 - 150
MCPP	99.6	98.4	P/P	50 - 150
Primidone	108	104	P/P	60 - 150
Triclopyr	104	110	P/P	50 - 150

Reference Method: EPA 8321B

Run ID: A79673

Included Lab Sample IDs: 1936871, 1936872

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Sucralose	96.1	91.6	P/P	60 - 150

Reference Method: SM 2320 B-97

Run ID: A79678

Included Lab Sample IDs: 1936847

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total Alkalinity	107	99.5	P/P	90 - 110

Quality Assurance Report Calibration Verification

Reference Method: SM 4500 F-C-97

Run ID: A79678

Included Lab Sample IDs: 1936846, 1936847

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Fluoride	100	98.6	P/P	90 - 110
Fluoride	101	99.1	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A79679

Included Lab Sample IDs: 1936850

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total-P	96.3	96.4	P/P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0

Run ID: A79690

Included Lab Sample IDs: 1936848, 1936849, 1936855

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

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A79696

Included Lab Sample IDs: 1936843, 1936848, 1936849

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total-P	94.7	97.1	P/P	90 - 110
Total-P	97.1	98.2	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A79711

Included Lab Sample IDs: 1936855

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total-P	97.5	99.0	P/P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0

Run ID: A79729

Included Lab Sample IDs: 1936843

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

Reference Method: SM 2320 B-97

Run ID: A79730

Included Lab Sample IDs: 1936842, 1936845, 1936854

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total Alkalinity	102	101	P/P	90 - 110

Reference Method: SM 4500 F-C-97

Run ID: A79730

Included Lab Sample IDs: 1936845, 1936854

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
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Quality Assurance Report Calibration Verification

Reference Method: SM 4500 F-C-97

Run ID: A79730

Included Lab Sample IDs: 1936845, 1936854

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

Reference Method: EPA 351.2 Rev. 2.0

Run ID: A79762

Included Lab Sample IDs: 1936843, 1936848, 1936849, 1936850, 1936855

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Kjeldahl Nitrogen	93.5	94.4	P/P	90 - 110
Kjeldahl Nitrogen	97.2	93.5	P/P	90 - 110

Reference Method: SM 5310 B-00

Run ID: A79779

Included Lab Sample IDs: 1936843

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Organic Carbon	97.4	91.4	P/P	90 - 110

Reference Method: SM 4500 F-C-97

Run ID: A79792

Included Lab Sample IDs: 1936842

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Fluoride	98.1	98.6	P/P	90 - 110

Reference Method: EPA 8276

Run ID: A79820

Included Lab Sample IDs: 1936878

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Chlordane	85.1		P	80 - 120
Toxaphene	114		P	80 - 120

Reference Method: EPA 353.2 Rev. 2.0

Run ID: A79823

Included Lab Sample IDs: 1936850

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
NO2NO3-N	106	99.5	P/P	90 - 110

Reference Method: USGS O-2060-01

Run ID: A79847

Included Lab Sample IDs: 1936872

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
2,4-D	104	100	P/P	50 - 150
Acetaminophen	102	108	P/P	60 - 150
Bentazon	101	94.9	P/P	50 - 150
Carbamazepine	108	111	P/P	60 - 150
Diuron	104	107	P/P	60 - 150
Fenuron	104	106	P/P	60 - 150
Fluridone	108	105	P/P	60 - 160

Quality Assurance Report Calibration Verification

Reference Method: USGS O-2060-01

Run ID: A79847

Included Lab Sample IDs: 1936872

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Imidacloprid	96.4	108	P/P	60 - 150
Linuron	107	110	P/P	60 - 150
MCPP	107	102	P/P	50 - 150
Primidone	99.8	97.8	P/P	60 - 150
Triclopyr	109	107	P/P	50 - 150

Reference Method: EPA 8270D

Run ID: A79860

Included Lab Sample IDs: 1936878

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Aldrin	96.1		P	80 - 120
Alpha-BHC	101		P	80 - 120
Alpha-Chlordane	97.0		P	80 - 120
Beta-BHC	104		P	80 - 120
Carbophenothion	89.2		P	80 - 120
Chlorothalonil	90.4		P	80 - 120
Cypermethrin	94.8		P	80 - 120
DDD-p,p'	89.0		P	80 - 120
DDE-p,p'	99.3		P	80 - 120
DDT-p,p'	108		P	80 - 120
Delta-BHC	100		P	80 - 120
Dicofol	118		P	80 - 120
Dieldrin	102		P	80 - 120
Endosulfan I	95.9		P	80 - 120
Endosulfan II	96.0		P	80 - 120
Endosulfan Sulfate	98.1		P	80 - 120
Endrin	98.7		P	80 - 120
Endrin Aldehyde	94.2		P	80 - 120
Endrin Ketone	97.0		P	80 - 120
Gamma-BHC	102		P	80 - 120
Gamma-Chlordane	98.0		P	80 - 120
Heptachlor	95.1		P	80 - 120
Heptachlor Epoxide	98.0		P	80 - 120
Methoxychlor	105		P	80 - 120
Mirex	101		P	80 - 120
Permethrin	98.5		P	80 - 120
Trifluralin	94.8		P	80 - 120

Reference Method: EPA 8270D

Run ID: A79951

Included Lab Sample IDs: 1936879

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Acetochlor	95.4		P	80 - 120
Alachlor	98.3		P	80 - 120
Ametryn	93.9		P	80 - 120
Atrazine	105		P	80 - 120
Atrazine Desethyl	99.1		P	80 - 120
Azinphos Methyl	111		P	80 - 120
Bromacil	89.5		P	80 - 120

Quality Assurance Report Calibration Verification

Reference Method: EPA 8270D
 Run ID: A79951
 Included Lab Sample IDs: 1936879

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Butylate	93.1		P	80 - 120
Chlorpyrifos Ethyl	98.4		P	80 - 120
Chlorpyrifos Methyl	99.8		P	80 - 120
Cyanazine	79.6*		F	80 - 120
Demeton	93.5		P	80 - 120
Diazinon	95.0		P	80 - 120
Disulfoton	99.0		P	80 - 120
EPTC	88.5		P	80 - 120
Ethion	98.6		P	80 - 120
Ethoprop	99.5		P	80 - 120
Fenamiphos	91.8		P	80 - 120
Fipronil	95.3		P	80 - 120
Fipronil Sulfide	95.4		P	80 - 120
Fipronil Sulfone	92.9		P	80 - 120
Fonofos	99.4		P	80 - 120
Hexazinone	99.3		P	80 - 120
Malathion	105		P	80 - 120
Metalaxyl	99.0		P	80 - 120
Metolachlor	94.6		P	80 - 120
Metribuzin	96.8		P	80 - 120
Mevinphos	98.1		P	80 - 120
Molinate	87.7		P	80 - 120
Norflurazon	97.4		P	80 - 120
Parathion Ethyl	95.2		P	80 - 120
Parathion Methyl	97.9		P	80 - 120
Pendimethalin	88.2		P	80 - 120
Phorate	92.1		P	80 - 120
Prometon	106		P	80 - 120
Prometryn	94.7		P	80 - 120
Simazine	99.4		P	80 - 120
Terbufos	101		P	80 - 120
Terbutylazine	98.6		P	80 - 120

* 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 SMP	MS
					LCS		
EPA 180.1 Rev. 2.0	Turbidity					6.90	
	Turbidity					7.87	
EPA 200.7 Rev. 4.4	Iron	104	97.6	108			0.233
	Zinc	98.5	98.9	98.1	99.4		1.26
EPA 200.8 Rev. 5.4	Arsenic	102	102	106	106		0.381
	Cadmium	106	107	108	109		1.03
	Chromium	103	98.9	102	103		1.14
	Copper	98.5	97.8	98.4	99.0		0.650

Quality Assurance Report Summary

Ref. Method	Analyte	LCS % Recovery		MS % Recovery			LCS	Precision	MS
								SMP	
EPA 200.8 Rev. 5.4	Lead	99.6		98.7	102	102			0.588
	Nickel	101		98.2	101	103			1.07
	Silver	100		99.2	101	115			12.8
EPA 300.0 Rev. 2.1	Sulfate	95.0		98.8	98.1			0.539	
EPA 350.1 Rev. 2.0	Ammonia-N	104		106	105				0.808
	Ammonia-N	103		99.3	95.1				3.86
EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	100		92.7	92.0				0.691
	Kjeldahl Nitrogen	96.3		94.5	98.3				3.44
EPA 353.2 Rev. 2.0	NO2NO3-N	103		103	103				0.0
	NO2NO3-N	103		104	102				0.598
	NO2NO3-N	102		101	102				0.284
EPA 365.1 Rev. 2.0	Total-P	94.4		96.1	96.0				0.0937
	Total-P	99.7		99.0	93.6				5.58
	Total-P	97.2		95.3	97.7				2.15
EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	98.0		98.8	94.5				4.23
	O-Phosphate-P	101		95.8	98.9				3.18
EPA 8270D	Acetochlor	92.3	93.2	99.3	97.4		1.04		2.00
	Alachlor	101	95.4	97.3	92.3		5.89		4.86
	Aldrin	45.9	45.4	47.1	54.4		1.07		14.4
	Alpha-BHC	94.6	93.9	84.6	83.6		0.762		1.15
	Alpha-Chlordane	107	102	94.6	85.2		5.27		10.4
	Ametryn	93.3	87.9	111	108		6.00		2.79
	Atrazine	105	108				2.69		11.7
	Atrazine Desethyl	101	91.4	94.6	92.6		10.3		2.14
	Azinphos Methyl	140	129	140	129		7.66		8.17
	Beta-BHC	89.3	85.6	66.5	64.9		4.18		2.38
	Bromacil	83.4	78.8	94.8	84.4		5.73		11.6
	Butylate	60.4	46.6	25.5	29.4		25.6		14.1
	Carbophenothion	140	126	101	82.1		10.5		20.5
	Chlorothalonil	76.1	67.9	110	109		11.4		1.51
	Chlorpyrifos Ethyl	105	101	92.2	94.7		4.12		2.70
	Chlorpyrifos Methyl	106	107	94.4	92.2		0.738		2.36
	Cyanazine	280	213	232	217		27.2		6.74
	Cypermethrin	107	101	72.7	61.3		5.98		17.0
	DDD-p,p'	118	114	91.3	82.4		3.18		10.2
	DDE-p,p'	108	105	96.0	101		3.00		4.89
	DDT-p,p'	103	104	97.3	105		1.25		7.33
	Delta-BHC	91.2	98.1	71.1	70.8		7.29		0.311
	Demeton	98.3	98.6	84.9	80.2		0.291		5.69
	Diazinon	107	101	107	110		5.37		3.05
	Dicofol	72.1	68.4	30.7	32.8		5.30		6.44
	Dieldrin	107	101	84.2	103		5.57		15.2
	Disulfoton	115	105	98.8	108		9.24		8.89
	Endosulfan I	103	95.4	78.8	89.7		7.89		13.0
	Endosulfan II	103	95.9	72.8	82.2		6.97		12.2
	Endosulfan Sulfate	117	108	89.3	93.4		8.19		4.53
	Endrin	115	105	80.0	87.9		9.88		9.37
	Endrin Aldehyde	103	99.7	69.8	82.2		2.91		16.3
	Endrin Ketone	106	100	89.0	85.2		5.09		4.34
	EPTC	55.0	37.8	20.4	24.7		37.1		19.2
	Ethion	103	102	103	97.8		1.08		5.06
	Ethoprop	91.8	88.9	81.6	85.1		3.20		4.28
	Fenamiphos	99.3	98.5	100	88.2		0.810		13.0
	Fipronil	104	108	114	96.9		3.64		14.7

Quality Assurance Report Summary

Ref. Method	Analyte	LCS % Recovery		MS % Recovery		Precision	
						LCS	MS
						SMP	
EPA 8270D	Fipronil Sulfide	91.3	92.3	88.3	79.0	0.997	9.40
	Fipronil Sulfone	86.3	87.6	89.1	68.6	1.38	19.9
	Fonofos	89.5	88.5	76.7	84.4	1.06	9.55
	Gamma-BHC	87.5	80.1	74.4	73.3	8.74	1.46
	Gamma-Chlordane	105	99.9	89.1	79.7	5.16	11.1
	Heptachlor	91.3	85.9	75.2	86.0	6.05	13.3
	Heptachlor Epoxide	108	101	90.6	99.7	6.15	9.59
	Hexazinone	92.3	94.8	97.5	92.9	2.59	4.29
	Malathion	95.5	99.8	97.3	92.8	4.39	4.69
	Metalaxyl	93.6	95.3	101	92.7	1.79	9.04
	Methoxychlor	110	100	96.1	98.2	9.42	2.22
	Metolachlor	92.1	91.5	94.6	92.3	0.628	1.65
	Metribuzin	142	128	151	132	10.4	8.95
	Mevinphos	90.4	74.3	70.7	76.0	19.5	7.24
	Mirex	89.2	85.3	76.7	86.2	4.53	11.7
	Molinate	63.7	56.8	37.8	40.6	11.4	7.21
	Norflurazon	98.1	96.1	104	96.8	2.01	7.59
	Parathion Ethyl	93.2	96.2	89.5	86.5	3.23	3.41
	Parathion Methyl	111	105	100	100	5.23	0.225
	Pendimethalin	96.7	91.5	97.5	94.4	5.50	3.30
	Permethrin	106	97.5	89.4	78.7	8.69	12.7
	Phorate	97.9	88.7	81.4	74.4	9.79	9.01
	Prometon	94.1	96.0	128	107	2.08	17.8
	Prometryn	97.6	99.0	108	104	1.36	3.16
	Simazine	93.3	106			13.0	8.89
	Terbufos	102	98.2	89.5	89.6	3.55	0.0894
	Terbuthylazine	92.4	94.8	105	99.9	2.53	4.77
	Trifluralin	90.1	85.7	87.7	79.7	5.05	9.50
EPA 8276	Chlordane	69.2	79.2	70.9	64.5	13.6	9.35
	Toxaphene	84.4	96.2	99.7	93.2	13.0	6.70
EPA 8321B	Glyphosate	115		122	123		1.35
	Pyraclostrobin	95.2		90.1	93.8		4.02
	Sucralose	91.6		40.3	41.0		1.76
SM 2320 B-97	Total Alkalinity	102				0.490	
	Total Alkalinity	102				1.68	
	Total Alkalinity	103				1.14	
SM 4500 F-C-97	Fluoride	96.0		98.8	99.3		0.472
	Fluoride	100		96.5	95.8		0.464
	Fluoride	96.8		96.7	96.2		0.474
	Fluoride	96.0		96.7	98.1		0.986
SM 5310 B-00	Organic Carbon	98.4		97.0	97.6		0.464
	Organic Carbon	96.2		90.0	89.8		0.148
USGS O-2060-01	2,4-D	88.8					1.19
	2,4-D	64.6		73.9	76.8		2.77
	Acetaminophen	125		113	105		6.83
	Acetaminophen	132		94.0	89.2		5.26
	Bentazon	80.3					1.22
	Bentazon	31.0		25.0	26.6		2.17
	Carbamazepine	126		124	128		3.34
	Carbamazepine	148		116	110		5.31
	Diuron	114		84.3	83.1		1.18
	Diuron	73.4		83.7	74.9		7.56
	Fenuron	116		102	102		0.0976
	Fenuron	109		87.7	87.1		0.554

Quality Assurance Report Summary

Ref. Method	Analyte	LCS % Recovery	MS % Recovery		Precision	
					LCS	MS
USGS O-2060-01	Fluridone	119				26.5
	Fluridone	87.9				15.2
	Imidacloprid	102				3.73
	Imidacloprid	116				1.58
	Linuron	120	109	108		0.0737
	Linuron	109	99.6	93.8		5.98
	MCPP	82.8	58.2	57.7		0.794
	MCPP	63.8	50.8	48.6		4.43
	Primidone	108	109	109		0.370
	Primidone	91.6	105	101		3.43
	Triclopyr	77.2	67.1	60.8		9.94
	Triclopyr	65.2	57.4	50.2		13.3

Reference Method Descriptions

Method / DoH Cert #	Description	Associated Samples
EPA 180.1 Rev. 2.0 / E31780	Turbidity in aqueous matrices	1936842, 1936845, 1936846, 1936847, 1936854
EPA 200.7 Rev. 4.4 / E31780	Total Recoverable Metals analysis using ICP emission spectroscopy for aqueous samples supporting Clean Water Act Projects	1936880
EPA 200.8 Rev. 5.4 / E31780	Total Recoverable Metals analysis using ICP-MS for aqueous samples supporting Clean Water Act Projects	1936880
EPA 300.0 Rev. 2.1 / E31780	Sulfate in aqueous matrices	1936842
EPA 350.1 Rev. 2.0 / E31780	Ammonia in aqueous matrices as mg N/L	1936843, 1936848, 1936849, 1936850, 1936855
EPA 351.2 Rev. 2.0 / E31780	Total Kjeldahl Nitrogen in aqueous matrices	1936843, 1936848, 1936849, 1936850, 1936855
EPA 353.2 Rev. 2.0 / E31780	Nitrite/Nitrate in aqueous matrices as mg N/L	1936843, 1936848, 1936849, 1936850, 1936855
EPA 365.1 Rev. 2.0 / E31780	Total Phosphorus in aqueous matrices as mg P/L	1936843, 1936848, 1936849, 1936850, 1936855
EPA 365.1 Rev. 2.0 dissolved / E31780	Ortho-phosphate, dissolved, in filtered, aqueous matrices as mg P/L	1936844, 1936851, 1936852, 1936853, 1936856
EPA 8270D / E31780	Organochlorine pesticides in water matrices by GC/MS-SIM	1936878
EPA 8270D / E31780	Organonitrogen and phosphorus pesticides (ultra trace level) in water matrices by GC/MS/MS	1936879
EPA 8276 / E31780	Organochlorine pesticides in water matrices by GC/MS with Negative Chemical Ionization	1936878
EPA 8321B / E31780	Analysis of sucralose in water matrices by HPLC/MS/MS	1936871, 1936872
EPA 8321B / E31780	Glyphosate in water matrices by HPLC/MS/MS	1936872
EPA 8321B / E31780	Pyraclostrobin in water matrices by HPLC/MS/MS	1936872
SM 2320 B-97 / E31780	Alkalinity in aqueous matrices as mg CaCO ₃ /L	1936842, 1936845, 1936846, 1936847, 1936854
SM 2540 D-97 / E31780	Total Suspended Solids in aqueous matrices	1936842, 1936845, 1936846, 1936847, 1936854
SM 4500 F-C-97 / E31780	Fluoride in aqueous matrices, without distillation (not valid for NPDES monitoring)	1936842, 1936845, 1936846, 1936847, 1936854
SM 5310 B-00 / E31780	Nonpurgeable Organic Carbon in aqueous matrices	1936843, 1936848, 1936849, 1936850, 1936855
USGS O-2060-01 / E31780	Chlorinated (phenoxy acid) herbicides in water matrices by HPLC/MS/MS	1936871, 1936872
USGS O-2060-01 / E31780	Urea herbicides and other chemicals in water matrices by HPLC/MS/MS	1936871, 1936872

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	10/13/2017			10/13/2017 15:53	Blanca Fach	1936842, 1936845, 1936846, 1936847, 1936854
EPA 200.7 Rev. 4.4	10/13/2017	10/16/2017	Elliott D. Healy	10/17/2017	Betina Topolski	1936880
EPA 200.8 Rev. 5.4	10/13/2017	10/16/2017	Elliott D. Healy	10/18/2017	Nadine Brooks	1936880
EPA 300.0 Rev. 2.1	10/13/2017			10/17/2017	Julia Storbeck	1936842
EPA 350.1 Rev. 2.0	10/13/2017			10/18/2017	Sofia Elnemr	1936843, 1936848, 1936849, 1936850, 1936855
EPA 351.2 Rev. 2.0	10/13/2017	10/20/2017	Adrian Shelby	10/23/2017	Joseph Suarez	1936843, 1936848, 1936849, 1936850, 1936855
EPA 353.2 Rev. 2.0	10/13/2017			10/20/2017	Beverly Y. Sanders	1936848, 1936849, 1936855
	10/13/2017			10/23/2017	Beverly Y. Sanders	1936843
	10/13/2017			10/26/2017	Beverly Y. Sanders	1936850
EPA 365.1 Rev. 2.0	10/13/2017	10/18/2017	Sima Feizi	10/19/2017	Lipi Saha	1936850
	10/13/2017	10/18/2017	Sima Feizi	10/20/2017	Lipi Saha	1936843, 1936848, 1936849, 1936855
EPA 365.1 Rev. 2.0 dissolved	10/13/2017			10/13/2017 14:10	Megan Treadwell	1936844
	10/13/2017			10/13/2017 14:11	Megan Treadwell	1936851
	10/13/2017			10/13/2017 14:12	Megan Treadwell	1936852
	10/13/2017			10/13/2017 14:13	Megan Treadwell	1936853
	10/13/2017			10/13/2017 14:14	Megan Treadwell	1936856
EPA 8270D	10/13/2017	10/13/2017	John Kaba	10/27/2017	Vandana T. Nagar	1936879
	10/13/2017	10/17/2017	Fe-Val Siddell	10/23/2017	Marek Topolski	1936878
EPA 8276	10/13/2017	10/17/2017	Fe-Val Siddell	10/25/2017	John P. Burgos	1936878
EPA 8321B	10/13/2017	10/13/2017	Julie Michelle Frank	10/13/2017	Juyoung Kim	1936872
	10/13/2017	10/16/2017	Mohammad Ghaffari	10/16/2017	Juyoung Kim	1936872
	10/13/2017	10/18/2017	Juyoung Kim	10/19/2017	Juyoung Kim	1936871, 1936872
SM 2320 B-97	10/13/2017			10/17/2017	Dale L. Simmons	1936846
	10/13/2017			10/20/2017	Dale L. Simmons	1936847
	10/13/2017			10/21/2017	Dale L. Simmons	1936842, 1936845, 1936854
SM 2540 D-97	10/13/2017			10/18/2017	Yijie Li	1936842, 1936845, 1936846, 1936847, 1936854
SM 4500 F-C-97	10/13/2017			10/20/2017	Dale L. Simmons	1936846, 1936847
	10/13/2017			10/21/2017	Dale L. Simmons	1936845, 1936854
	10/13/2017			10/24/2017	Dale L. Simmons	1936842
SM 5310 B-00	10/13/2017			10/19/2017	Ping Hua	1936848, 1936849, 1936850, 1936855
	10/13/2017			10/24/2017	Ping Hua	1936843
USGS O-2060-01	10/13/2017	10/16/2017	Hoor Shaik	10/20/2017	Julie Michelle Frank	1936871
	10/13/2017	10/18/2017	Hoor Shaik	10/24/2017	Julie Michelle Frank	1936872