

Chemical Analysis Report

CEN-DIST-2018-01-23-02

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

Event Description: **Barber X2 / Bass / Buchanan**
Request ID: **RQ-2018-01-22-36**
Customer: **CEN-DIST**
Project ID: **SMP**

Send Reports to:
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3319 Maguire Blvd., Suite 232
Orlando, FL 32803-3767
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Certified by: Colin Wright, Program Administrator

Date Certified: 13-FEB-2018 10:17

A handwritten signature in black ink, appearing to read "Colin Wright", is displayed on a light gray rectangular 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: Lake Barber West of Center (3136A1)

Collection Date/Time: 01/22/2018 10:23

Field ID: G2CE0152

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1960982	EPA 180.1 Rev. 2.0	Turbidity	2.6		NTU	P338647	
	EPA 300.0 Rev. 2.1	Chloride	16	A	mg Cl/L	P338759	
		Sulfate	16	A	mg SO4/L	P338762	
	SM 2120 B	Color (true)	17		PCU	P338637	
	SM 2320 B-97	Total Alkalinity	24		mg CaCO3/L	P338923	
	SM 2540 C-97	TDS	75		mg/L	P338983	
	SM 2540 D-97	TSS	4	I	mg/L	P338975	
1960984	SM 4500 F-C-97	Fluoride	0.038	I	mg F/L	P339356	
	EPA 350.1 Rev. 2.0	Ammonia-N	0.021		mg N/L	P338945	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.71		mg N/L	P339426	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.042		mg N/L	P338715	
	EPA 365.1 Rev. 2.0	Total-P	0.015		mg P/L	P338796	
1960986	SM 5310 B-00	Organic Carbon	5.7		mg C/L	P339030	
	EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	0.004	U	mg P/L	P338654	
1961028	EPA 200.7 Rev. 4.4	Calcium	13.3		mg/L	P338723	
		Iron	30	U	ug/L	P338723	
		Magnesium	2.59		mg/L	P338723	
		Potassium	3.1		mg/L	P338723	
		Sodium	9.5		mg/L	P338723	
		Zinc	5.0	U	ug/L	P338723	
		Arsenic	3.14		ug/L	P338723	
	EPA 200.8 Rev. 5.4	Cadmium	0.020	U	ug/L	P338723	
		Chromium	0.42	I	ug/L	P338723	
		Copper	0.86		ug/L	P338723	
		Lead	0.11	I	ug/L	P338723	
		Nickel	0.20	U	ug/L	P338723	
		Silver	0.010	U	ug/L	P338723	

Ref. Method and Comment:

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

EPA 200.7 Rev. 4.4: Batch matrix spike recoveries for calcium are unavailable for one of two spiked samples because of high analyte concentration in the QC sample.

Sample Location: Lake Barber West of Center (3136A1)

Collection Date/Time: 01/22/2018 10:23

Field ID: G2CE0152

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1961018	EPA 8321B	Glyphosate**	0.10	U	ug/L	P338691	
		AMPA**	0.10	U	ug/L	P338691	
		Pyraclostrobin**	0.0020	U	ug/L	P338652	
		Sucralose**	0.27		ug/L	P338457	
	USGS O-2060-01	2,4-D	0.014		ug/L	P338652	
		Diuron	0.0020	U	ug/L	P338652	
		Fenuron	0.0080	U	ug/L	P338652	
		Imidacloprid	0.0023	IJ	ug/L	P338652	MS
		Bentazon	0.011		ug/L	P338652	

Field ID: G2CE0152

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1961018	USGS O-2060-01	Linuron	0.0040	U	ug/L	P338652	
		Acetaminophen**	0.0080	U	ug/L	P338652	
		MCP	0.0020	U	ug/L	P338652	
		Carbamazepine**	4.0E-04	U	ug/L	P338652	
		Triclopyr**	0.0040	U	ug/L	P338652	
		Primidone**	0.0040	U	ug/L	P338652	
		Fluridone**	0.048		ug/L	P338652	
1961019	EPA 8321B	Aldicarb	0.020	U	ug/L	P338652	
		Aldicarb Sulfone	0.0020	U	ug/L	P338652	
		Aldicarb Sulfoxide	0.0020	U	ug/L	P338652	
		Carbaryl	0.0020	U	ug/L	P338652	
		Carbofuran	0.0020	U	ug/L	P338652	
		3-Hydroxycarbofuran	0.0020	U	ug/L	P338652	
		Methiocarb	0.0020	U	ug/L	P338652	
		Methomyl	0.0020	U	ug/L	P338652	
		Oxamyl	0.0020	U	ug/L	P338652	
		Propoxur	0.0020	U	ug/L	P338652	
1961025	EPA 8270D	Aldrin	4.3	U	ng/L	P338607	
		Alpha-BHC	2.2	U	ng/L	P338607	
		Beta-BHC	4.3	U	ng/L	P338607	
		Delta-BHC	4.3	U	ng/L	P338607	
		Gamma-BHC	4.3	U	ng/L	P338607	
		Carbophenothion	4.3	U	ng/L	P338607	
		Chlorothalonil	2.2	U	ng/L	P338607	
		Cypermethrin	22	U	ng/L	P338607	
		DDD-p,p'	3.2	U	ng/L	P338607	
		DDE-p,p'	3.2	U	ng/L	P338607	
		DDT-p,p'	3.2	U	ng/L	P338607	
		Dieldrin	4.3	U	ng/L	P338607	
		Endosulfan I	4.3	U	ng/L	P338607	
		Endosulfan II	4.3	U	ng/L	P338607	
		Endosulfan Sulfate	2.2	U	ng/L	P338607	
		Endrin	2.2	U	ng/L	P338607	
		Endrin Aldehyde	2.2	U	ng/L	P338607	
		Heptachlor	1.6	U	ng/L	P338607	
		Heptachlor Epoxide	2.2	U	ng/L	P338607	
		Methoxychlor	4.3	U	ng/L	P338607	
		Mirex	2.2	U	ng/L	P338607	
		Permethrin	11	U	ng/L	P338607	
		Trifluralin	1.1	U	ng/L	P338607	
		Alpha-Chlordane	1.1	U	ng/L	P338607	
		Gamma-Chlordane	1.1	U	ng/L	P338607	
		Endrin Ketone	2.2	U	ng/L	P338607	
		Dicofol	32	U	ng/L	P338607	
		Chlordane**	2.7	U	ng/L	P338607	
	EPA 8276						

Field ID: G2CE0152

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1961025	EPA 8276	Toxaphene**	13	U	ng/L	P338607	
1961026	EPA 8270D	Alachlor	0.25	U	ng/L	P338832	
		Ametryn	0.32	UJ	ng/L	P338832	MS
		Atrazine	20		ng/L	P338832	
		Atrazine Desethyl	3.3	I	ng/L	P338832	
		Azinphos Methyl	2.2	U	ng/L	P338832	
		Bromacil	0.49	U	ng/L	P338832	
		Butylate	0.40	UJ	ng/L	P338832	RPD
		Chlorpyrifos Ethyl	0.25	U	ng/L	P338832	
		Chlorpyrifos Methyl	0.099	U	ng/L	P338832	
		Demeton	2.0	U	ng/L	P338832	
		Diazinon	0.12	U	ng/L	P338832	
		Disulfoton	0.49	U	ng/L	P338832	
		EPTC	1.2	UJ	ng/L	P338832	RPD
		Ethion	0.15	U	ng/L	P338832	
		Ethoprop	0.099	U	ng/L	P338832	
		Fenamiphos	0.25	UJ	ng/L	P338832	LCS, RPD
		Fipronil	0.25	U	ng/L	P338832	
		Fipronil Sulfide	0.19	IJ	ng/L	P338832	RPD
		Fipronil Sulfone	1.6	J	ng/L	P338832	MS, RPD
		Hexazinone	1.2	IJ	ng/L	P338832	LCS
		Malathion	0.35	U	ng/L	P338832	
		Metribuzin	0.20	U	ng/L	P338832	
		Mevinphos	0.49	U	ng/L	P338832	
		Molinate	0.30	UJ	ng/L	P338832	RPD
		Norflurazon	0.49	UJ	ng/L	P338832	RPD
		Pendimethalin	0.99	U	ng/L	P338832	
		Phorate	0.25	U	ng/L	P338832	
		Prometon	0.89	U	ng/L	P338832	
		Prometryn	0.20	U	ng/L	P338832	
		Simazine	0.49	U	ng/L	P338832	
		Terbufos	0.099	U	ng/L	P338832	
		Terbuthylazine	0.42	U	ng/L	P338832	
		Fonofos	0.20	U	ng/L	P338832	
		Metalaxyl	0.25	UJ	ng/L	P338832	LCS, RPD
		Metolachlor	0.25	U	ng/L	P338832	
		Acetochlor	0.25	U	ng/L	P338832	
		Cyanazine	0.49	U	ng/L	P338832	
		Parathion Ethyl	0.25	U	ng/L	P338832	
		Parathion Methyl	0.25	U	ng/L	P338832	

Ref. Method and Comment:

USGS O-2060-01: Refer to the narrative for an explanation of QC Codes.

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

Sample Location: Lake Barber East of Center (3136A1)

Collection Date/Time: 01/22/2018 10:47

Field ID: G2CE0153

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1960983	EPA 180.1 Rev. 2.0	Turbidity	1.8		NTU	P338647	
	EPA 300.0 Rev. 2.1	Chloride	16		mg Cl/L	P338759	
		Sulfate	16		mg SO4/L	P338762	
		Color (true)	15		PCU	P338637	
	SM 2320 B-97	Total Alkalinity	25		mg CaCO3/L	P338923	
	SM 2540 C-97	TDS	78		mg/L	P338983	
	SM 2540 D-97	TSS	3	I	mg/L	P338975	
	SM 4500 F-C-97	Fluoride	0.038	I	mg F/L	P339357	
1960985	EPA 350.1 Rev. 2.0	Ammonia-N	0.021		mg N/L	P338946	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.52		mg N/L	P339100	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.042		mg N/L	P338715	
	EPA 365.1 Rev. 2.0	Total-P	0.014		mg P/L	P338796	
	SM 5310 B-00	Organic Carbon	5.8		mg C/L	P339030	
1960987	EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	0.004	U	mg P/L	P338654	
1961029	EPA 200.7 Rev. 4.4	Calcium	13.3		mg/L	P338723	
		Iron	30	U	ug/L	P338723	
		Magnesium	2.57		mg/L	P338723	
		Potassium	3.1		mg/L	P338723	
		Sodium	9.4		mg/L	P338723	
		Zinc	5.0	U	ug/L	P338723	
	EPA 200.8 Rev. 5.4	Arsenic	3.14		ug/L	P338723	
		Cadmium	0.020	U	ug/L	P338723	
		Chromium	0.40	U	ug/L	P338723	
		Copper	0.81		ug/L	P338723	
		Lead	0.11	I	ug/L	P338723	
		Nickel	0.20	U	ug/L	P338723	
		Silver	0.010	U	ug/L	P338723	

Ref. Method and Comment:

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

EPA 200.7 Rev. 4.4: Batch matrix spike recoveries for calcium are unavailable for one of two spiked samples because of high analyte concentration in the QC sample.

Sample Location: Lake Bass @ Center of lake (3168F)

Collection Date/Time: 01/22/2018 11:36

Field ID: G4CE0147

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1960988	EPA 180.1 Rev. 2.0	Turbidity	6.5		NTU	P338647	
	EPA 300.0 Rev. 2.1	Chloride	20		mg Cl/L	P338759	
		Sulfate	19		mg SO4/L	P338762	
		Color (true)	15		PCU	P338637	
	SM 2320 B-97	Total Alkalinity	47		mg CaCO3/L	P338923	
	SM 2540 C-97	TDS	116		mg/L	P338983	
	SM 2540 D-97	TSS	5	I	mg/L	P338975	
	SM 4500 F-C-97	Fluoride	0.035	U	mg F/L	P339357	
1960990	EPA 350.1 Rev. 2.0	Ammonia-N	0.036		mg N/L	P338946	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	0.88		mg N/L	P339100	

Field ID: G4CE0147

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1960990	EPA 353.2 Rev. 2.0	NO2NO3-N	0.36		mg N/L	P338715	
	EPA 365.1 Rev. 2.0	Total-P	0.050		mg P/L	P338796	
	SM 5310 B-00	Organic Carbon	5.2		mg C/L	P339030	
1960992	EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	0.004	U	mg P/L	P338654	

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: Lake Buchanan @ Center (3169A3)

Collection Date/Time: 01/22/2018 12:37

Field ID: G4CE0146

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
1960989	EPA 180.1 Rev. 2.0	Turbidity	4.5		NTU	P338647	
	EPA 300.0 Rev. 2.1	Chloride	12		mg Cl/L	P338759	
		Sulfate	3.8		mg SO4/L	P338762	
	SM 2120 B	Color (true)	38		PCU	P338637	
	SM 2320 B-97	Total Alkalinity	40		mg CaCO3/L	P338923	
	SM 2540 C-97	TDS	82		mg/L	P338983	
	SM 2540 D-97	TSS	4	I	mg/L	P338975	
	SM 4500 F-C-97	Fluoride	0.065	I	mg F/L	P339357	
1960991	EPA 350.1 Rev. 2.0	Ammonia-N	0.005	I	mg N/L	P338946	
	EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	1.3		mg N/L	P338826	
	EPA 353.2 Rev. 2.0	NO2NO3-N	0.004	U	mg N/L	P338715	
	EPA 365.1 Rev. 2.0	Total-P	0.087		mg P/L	P338796	
	SM 5310 B-00	Organic Carbon	11		mg C/L	P339030	
1960993	EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	0.018		mg P/L	P338654	

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: P338647

Component	Result	Code	Units
Turbidity	0.10	U	NTU

Reference Method: EPA 200.7 Rev. 4.4

Batch ID: P338723

Component	Result	Code	Units
Calcium	0.075	U	mg/L
Iron	30	U	ug/L
Magnesium	0.040	U	mg/L
Potassium	0.30	U	mg/L
Sodium	0.50	U	mg/L
Zinc	5.0	U	ug/L

Quality Assurance Report Method Blank Results

Reference Method: EPA 200.8 Rev. 5.4
Batch ID: P338723

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: P338759

Component	Result	Code	Units
Chloride	0.20	U	mg Cl/L

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P338762

Component	Result	Code	Units
Sulfate	0.20	U	mg SO4/L

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P338945

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

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P338946

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P338826

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P339100

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P339426

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

Quality Assurance Report Method Blank Results

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P338715

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

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P338796

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

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Batch ID: P338654

Component	Result	Code	Units
O-Phosphate-P	0.0040		
O-Phosphate-P	0.004	U	

Reference Method: EPA 8270D
Batch ID: P338607

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 8270D
Batch ID: P338832

Component	Result	Code	Units
Acetochlor	0.25	U	ng/L

Quality Assurance Report

Method Blank Results

Reference Method: EPA 8270D

Batch ID: P338832

Component	Result	Code	Units
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
Metaxyl	0.25	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
Prometon	0.90	U	ng/L
Prometryn	0.20	U	ng/L
Simazine	0.50	U	ng/L
Terbufos	0.10	U	ng/L
Terbuthylazine	0.42	U	ng/L

Reference Method: EPA 8276

Batch ID: P338607

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

Reference Method: EPA 8321B

Batch ID: P338457

Component	Result	Code	Units
Sucralose	0.010	U	ug/L

Quality Assurance Report Method Blank Results

Reference Method: EPA 8321B
Batch ID: P338652

Component	Result	Code	Units
3-Hydroxycarbofuran	0.0020	U	ug/L
Aldicarb	0.020	U	ug/L
Aldicarb Sulfone	0.0020	U	ug/L
Aldicarb Sulfoxide	0.0020	U	ug/L
Carbaryl	0.0020	U	ug/L
Carbofuran	0.0020	U	ug/L
Methiocarb	0.0020	U	ug/L
Methomyl	0.0020	U	ug/L
Oxamyl	0.0020	U	ug/L
Propoxur	0.0020	U	ug/L
Pyraclostrobin	0.0020	U	ug/L

Reference Method: EPA 8321B
Batch ID: P338691

Component	Result	Code	Units
AMPA	0.10	U	ug/L
Glyphosate	0.10	U	ug/L

Reference Method: SM 2120 B
Batch ID: P338637

Component	Result	Code	Units
Color (true)	2.5	U	PCU

Reference Method: SM 2320 B-97
Batch ID: P338923

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

Reference Method: SM 2540 C-97
Batch ID: P338983

Component	Result	Code	Units
TDS	15	U	mg/L

Reference Method: SM 2540 D-97
Batch ID: P338975

Component	Result	Code	Units
TSS	2	U	mg/L

Reference Method: SM 4500 F-C-97
Batch ID: P339356

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: P339357

Component	Result	Code	Units
Fluoride	0.035	U	mg F/L

Reference Method: SM 5310 B-00
 Batch ID: P339030

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

Reference Method: USGS O-2060-01
 Batch ID: P338652

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	0.0020	U	ug/L
Fenuron	0.0080	U	ug/L
Fluridone	4.0E-04	U	ug/L
Imidacloprid	0.0020	U	ug/L
Linuron	0.0040	U	ug/L
MCPP	0.0020	U	ug/L
Primidone	0.0040	U	ug/L
Triclopyr	0.0040	U	ug/L

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: EPA 200.7 Rev. 4.4
 Batch ID: P338723

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Calcium	104		P	85 - 115
Iron	104		P	85 - 115
Magnesium	109		P	85 - 115
Potassium	101		P	85 - 115
Sodium	101		P	85 - 115
Zinc	99.7		P	85 - 115

Reference Method: EPA 200.8 Rev. 5.4
 Batch ID: P338723

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Arsenic	107		P	85 - 115
Cadmium	100		P	85 - 115
Chromium	104		P	85 - 115
Copper	104		P	85 - 115
Lead	101		P	85 - 115
Nickel	106		P	85 - 115
Silver	99.6		P	85 - 115

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P338759

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

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P338762

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

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P338945

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: P338946

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P338826

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Kjeldahl Nitrogen	99.5		P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P339100

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

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P339426

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Kjeldahl Nitrogen	93.9		P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P338715

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
NO ₂ NO ₃ -N	104		P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P338796

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

Quality Assurance Report

Laboratory Control Sample Accuracy

Reference Method: EPA 365.1 Rev. 2.0 dissolved

Batch ID: P338654

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
O-Phosphate-P	97.7		P	90 - 110

Reference Method: EPA 8270D

Batch ID: P338607

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Aldrin	49.1	44.4	P/P	24 - 89.0
Alpha-BHC	66.9	64.8	P/P	58 - 117
Alpha-Chlordane	70.9	66.7	P/P	56 - 115
Beta-BHC	79.9	75.3	P/P	55 - 137
Carbophenothion	52.6	59.2	P/P	37 - 145
Chlorothalonil	67.0	79.6	P/P	26 - 163
Cypermethrin	81.2	76.1	P/P	42 - 156
DDD-p,p'	76.0	74.3	P/P	59 - 129
DDE-p,p'	72.3	67.7	P/P	52 - 117
DDT-p,p'	79.5	72.8	P/P	48 - 128
Delta-BHC	82.0	79.1	P/P	59 - 158
Dicofol	69.2	68.6	P/P	19 - 124
Dieldrin	72.8	68.1	P/P	57 - 126
Endosulfan I	75.5	74.7	P/P	59 - 133
Endosulfan II	71.6	71.9	P/P	58 - 148
Endosulfan Sulfate	72.8	72.8	P/P	56 - 135
Endrin	74.5	69.6	P/P	50 - 140
Endrin Aldehyde	69.5	65.6	P/P	47 - 141
Endrin Ketone	73.8	74.5	P/P	63 - 123
Gamma-BHC	75.5	75.1	P/P	59 - 132
Gamma-Chlordane	73.3	69.3	P/P	55 - 112
Heptachlor	62.9	57.9	P/P	45 - 102
Heptachlor Epoxide	70.2	65.6	P/P	61 - 116
Methoxychlor	81.3	79.3	P/P	60 - 133
Mirex	72.0	69.9	P/P	40 - 98.0
Permethrin	84.6	80.5	P/P	45 - 131
Trifluralin	70.6	66.8	P/P	38 - 179

Reference Method: EPA 8270D

Batch ID: P338832

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Acetochlor	101	104	P/P	74 - 119
Alachlor	105	107	P/P	75 - 118
Ametryn	109	105	P/P	59 - 137
Atrazine	100	109	P/P	73 - 120
Atrazine Desethyl	63.1	66.0	P/P	19 - 129
Azinphos Methyl	98.7	111	P/P	65 - 181
Bromacil	72.9	75.5	P/P	43 - 123
Butylate	66.9	80.9	P/P	28 - 85.0
Chlorpyrifos Ethyl	97.1	112	P/P	55 - 112
Chlorpyrifos Methyl	86.3	101	P/P	35 - 124
Cyanazine	97.1	90.1	P/P	26 - 262
Demeton	62.7	82.2	P/P	43 - 122
Diazinon	101	105	P/P	72 - 120
Disulfoton	60.7	77.6	P/P	45 - 137

Quality Assurance Report

Laboratory Control Sample Accuracy

Reference Method: EPA 8270D

Batch ID: P338832

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
EPTC	66.4	87.4	P/P	28 - 95.0
Ethion	112	121	P/P	63 - 127
Ethoprop	83.7	94.2	P/P	63 - 109
Fenamiphos	50.1	70.3	F/P	66 - 136
Fipronil	105	101	P/P	63 - 126
Fipronil Sulfide	111	108	P/P	59 - 123
Fipronil Sulfone	110	106	P/P	56 - 122
Fonofos	87.9	95.8	P/P	64 - 114
Hexazinone	142	158	P/F	49 - 144
Malathion	115	117	P/P	68 - 131
Metaxyl	33.1	59.5	F/P	57 - 126
Metolachlor	107	111	P/P	75 - 118
Metribuzin	95.2	108	P/P	46 - 169
Mevinphos	81.2	91.7	P/P	34 - 126
Molinate	70.0	88.8	P/P	37 - 101
Norflurazon	92.7	80.2	P/P	63 - 127
Parathion Ethyl	103	103	P/P	78 - 109
Parathion Methyl	101	106	P/P	74 - 123
Pendimethalin	92.3	108	P/P	51 - 130
Phorate	65.3	86.5	P/P	53 - 116
Prometon	98.7	90.5	P/P	66 - 124
Prometryn	102	105	P/P	66 - 124
Simazine	105	110	P/P	62 - 134
Terbufos	81.4	93.1	P/P	59 - 115
Terbutylazine	107	110	P/P	76 - 113

Reference Method: EPA 8276

Batch ID: P338607

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Chlordane	78.7	80.1	P/P	47 - 125
Toxaphene	87.7	82.8	P/P	46 - 147

Reference Method: EPA 8321B

Batch ID: P338457

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Sucralose	97.4		P	40 - 150

Reference Method: EPA 8321B

Batch ID: P338652

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
3-Hydroxycarbofuran	108		P	40 - 150
Aldicarb	131		P	30 - 150
Aldicarb Sulfone	109		P	40 - 150
Aldicarb Sulfoxide	117		P	40 - 150
Carbaryl	79.0		P	40 - 150
Carbofuran	80.6		P	40 - 150
Methiocarb	82.6		P	40 - 150
Methomyl	109		P	40 - 150
Oxamyl	99.7		P	40 - 150

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: EPA 8321B
Batch ID: P338652

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Propoxur	79.3		P	40 - 150
Pyraclostrobin	103		P	40 - 150

Reference Method: EPA 8321B
Batch ID: P338691

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
AMPA	106		P	40 - 150
Glyphosate	105		P	40 - 150

Reference Method: SM 2320 B-97
Batch ID: P338923

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Total Alkalinity	99.5		P	95 - 108

Reference Method: SM 4500 F-C-97
Batch ID: P339356

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

Reference Method: SM 4500 F-C-97
Batch ID: P339357

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Fluoride	97.5		P	92 - 103

Reference Method: SM 5310 B-00
Batch ID: P339030

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Organic Carbon	97.8		P	85 - 115

Reference Method: USGS O-2060-01
Batch ID: P338652

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2,4-D	73.4		P	40 - 150
Acetaminophen	101		P	30 - 150
Bentazon	80.2		P	30 - 150
Carbamazepine	101		P	40 - 150
Diuron	86.8		P	40 - 150
Fenuron	120		P	40 - 150
Fluridone	118		P	40 - 150
Imidacloprid	111		P	40 - 160
Linuron	102		P	40 - 150
MCPP	74.7		P	40 - 150
Primidone	120		P	40 - 150
Triclopyr	77.7		P	40 - 150

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 200.7 Rev. 4.4
Batch ID: P338723

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960974	Iron	101		P	80 - 120
1960974	Magnesium	101		P	80 - 120
1960974	Potassium	99.2		P	80 - 120
1960974	Sodium	99.1		P	80 - 120
1960974	Zinc	98.1		P	80 - 120
1961028	Calcium	100		P	80 - 120
1961028	Iron	103	104	P/P	80 - 120
1961028	Magnesium	103	103	P/P	80 - 120
1961028	Potassium	96.0	95.1	P/P	80 - 120
1961028	Sodium	97.7		P	80 - 120
1961028	Zinc	99.0	100	P/P	80 - 120

Reference Method: EPA 200.8 Rev. 5.4
Batch ID: P338723

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960974	Arsenic	106		P	80 - 120
1960974	Cadmium	101		P	80 - 120
1960974	Chromium	98.8		P	80 - 120
1960974	Copper	98.1		P	80 - 120
1960974	Lead	101		P	80 - 120
1960974	Nickel	98.4		P	80 - 120
1960974	Silver	96.7		P	80 - 120
1961028	Arsenic	103	104	P/P	80 - 120
1961028	Cadmium	101	101	P/P	80 - 120
1961028	Chromium	100	99.5	P/P	80 - 120
1961028	Copper	98.5	98.5	P/P	80 - 120
1961028	Lead	99.7	99.5	P/P	80 - 120
1961028	Nickel	101	101	P/P	80 - 120
1961028	Silver	98.4	98.6	P/P	80 - 120

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P338759

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960982	Chloride	103		P	90 - 110
1960997	Chloride	101		P	90 - 110

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P338762

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960982	Sulfate	101		P	90 - 110
1960997	Sulfate	97.0		P	90 - 110

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P338945

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960463	Ammonia-N	101	102	P/P	90 - 110

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P338946

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960985	Ammonia-N	101	102	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P338826

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960984	Kjeldahl Nitrogen	97.0	96.6	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P339100

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1962820	Kjeldahl Nitrogen	100	101	P/P	90 - 110

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P339426

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1964318	Kjeldahl Nitrogen	92.0	94.5	P/P	90 - 110

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P338715

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960984	NO2NO3-N	105	105	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P338796

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960990	Total-P	101	96.2	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Batch ID: P338654

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960918	O-Phosphate-P	96.8	97.4	P/P	90 - 110

Reference Method: EPA 8270D
Batch ID: P338607

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960221	Aldrin	48.3	54.6	P/P	26 - 96.0
1960221	Alpha-BHC	69.5	77.8	P/P	51 - 123
1960221	Alpha-Chlordane	74.5	75.0	P/P	45 - 120
1960221	Beta-BHC	83.9	83.5	P/P	43 - 146
1960221	Carbophenothion	67.5	73.9	P/P	26 - 179
1960221	Chlorothalonil	95.7	112	P/P	10 - 215
1960221	Cypermethrin	90.5	90.6	P/P	35 - 169
1960221	DDD-p,p'	84.4	75.3	P/P	49 - 131
1960221	DDE-p,p'	74.1	70.8	P/P	39 - 127
1960221	DDT-p,p'	81.2	82.0	P/P	49 - 120

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 8270D

Batch ID: P338607

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960221	Delta-BHC	106	108	P/P	49 - 187
1960221	Dicofol	76.3	73.9	P/P	10 - 129
1960221	Dieldrin	74.0	72.6	P/P	46 - 132
1960221	Endosulfan I	76.8	82.0	P/P	57 - 130
1960221	Endosulfan II	85.2	88.8	P/P	52 - 148
1960221	Endosulfan Sulfate	76.5	81.1	P/P	55 - 129
1960221	Endrin	74.6	75.4	P/P	45 - 133
1960221	Endrin Aldehyde	52.3	41.4	P/P	26 - 140
1960221	Endrin Ketone	80.2	75.4	P/P	60 - 125
1960221	Gamma-BHC	79.0	84.6	P/P	50 - 145
1960221	Gamma-Chlordane	74.0	73.7	P/P	44 - 118
1960221	Heptachlor	58.5	62.0	P/P	35 - 106
1960221	Heptachlor Epoxide	71.2	72.0	P/P	52 - 123
1960221	Methoxychlor	85.3	85.7	P/P	54 - 132
1960221	Mirex	73.8	69.1	P/P	36 - 107
1960221	Permethrin	90.4	97.5	P/P	47 - 135
1960221	Trifluralin	74.3	73.2	P/P	32 - 228

Reference Method: EPA 8270D

Batch ID: P338832

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1961026	Acetochlor	102	101	P/P	67 - 125
1961026	Alachlor	106	103	P/P	69 - 123
1961026	Ametryn	170	163	F/F	52 - 151
1961026	Atrazine Desethyl	73.2	54.0	P/P	10 - 129
1961026	Azinphos Methyl	129	120	P/P	48 - 200
1961026	Bromacil	95.7	81.8	P/P	46 - 130
1961026	Butylate	32.2	43.8	P/P	10 - 85.0
1961026	Chlorpyrifos Ethyl	108	106	P/P	54 - 115
1961026	Chlorpyrifos Methyl	104	101	P/P	44 - 117
1961026	Cyanazine	163	129	P/P	10 - 262
1961026	Demeton	61.5	64.6	P/P	24 - 145
1961026	Diazinon	95.7	98.0	P/P	66 - 129
1961026	Disulfoton	88.2	83.0	P/P	45 - 139
1961026	EPTC	32.5	46.6	P/P	10 - 86.0
1961026	Ethion	121	118	P/P	59 - 133
1961026	Ethoprop	72.1	69.9	P/P	54 - 116
1961026	Fenamiphos	104	89.7	P/P	55 - 140
1961026	Fipronil	101	77.4	P/P	37 - 142
1961026	Fipronil Sulfide	98.0	66.4	P/P	37 - 130
1961026	Fipronil Sulfone	92.2	16.1	P/F	18 - 143
1961026	Fonofos	92.1	86.5	P/P	55 - 118
1961026	Hexazinone	126	111	P/P	62 - 140
1961026	Malathion	119	109	P/P	64 - 132
1961026	Metalaxyl	126	112	P/P	55 - 129
1961026	Metolachlor	109	110	P/P	56 - 137
1961026	Metribuzin	163	154	P/P	16 - 218
1961026	Mevinphos	69.4	67.0	P/P	34 - 129
1961026	Molinate	41.3	56.0	P/P	16 - 99.0
1961026	Norflurazon	107	78.3	P/P	43 - 135
1961026	Parathion Ethyl	105	108	P/P	71 - 112

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 8270D

Batch ID: P338832

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1961026	Parathion Methyl	108	107	P/P	65 - 127
1961026	Pendimethalin	108	116	P/P	35 - 159
1961026	Phorate	72.2	73.3	P/P	41 - 129
1961026	Prometon	116	112	P/P	56 - 140
1961026	Prometryn	105	103	P/P	65 - 130
1961026	Simazine	117	120	P/P	54 - 148
1961026	Terbufos	88.1	84.8	P/P	53 - 126
1961026	Terbutylazine	109	107	P/P	73 - 114

Reference Method: EPA 8276

Batch ID: P338607

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1961055	Chlordane	67.9	66.3	P/P	41 - 134
1961055	Toxaphene	69.6	73.4	P/P	39 - 158

Reference Method: EPA 8321B

Batch ID: P338457

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960487	Sucralose	97.9	93.1	P/P	40 - 150

Reference Method: EPA 8321B

Batch ID: P338652

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1961018	3-Hydroxycarbofuran	120	119	P/P	40 - 150
1961018	Aldicarb	129	144	P/P	30 - 150
1961018	Aldicarb Sulfone	132	135	P/P	40 - 150
1961018	Aldicarb Sulfoxide	98.1	103	P/P	40 - 150
1961018	Carbaryl	73.2	84.1	P/P	40 - 150
1961018	Carbofuran	73.8	81.0	P/P	40 - 150
1961018	Methiocarb	77.5	84.4	P/P	40 - 150
1961018	Methomyl	92.4	93.0	P/P	40 - 150
1961018	Oxamyl	100	100	P/P	40 - 150
1961018	Propoxur	66.3	77.5	P/P	40 - 150
1961018	Pyraclostrobin	109	90.5	P/P	40 - 150

Reference Method: EPA 8321B

Batch ID: P338691

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1961018	AMPA	101	102	P/P	40 - 150
1961018	Glyphosate	100	104	P/P	40 - 150

Reference Method: SM 4500 F-C-97

Batch ID: P339356

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960705	Fluoride	97.7	93.6	P/P	91 - 105

Quality Assurance Report Matrix Spike Accuracy

Reference Method: SM 4500 F-C-97
Batch ID: P339357

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1961110	Fluoride	96.5	97.1	P/P	91 - 105

Reference Method: SM 5310 B-00
Batch ID: P339030

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1960984	Organic Carbon	101	102	P/P	85 - 115

Reference Method: USGS O-2060-01
Batch ID: P338652

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
1961018	2,4-D	66.3	70.6	P/P	40 - 150
1961018	Acetaminophen	126	129	P/P	30 - 150
1961018	Bentazon	48.0	53.8	P/P	30 - 150
1961018	Carbamazepine	101	105	P/P	40 - 150
1961018	Diuron	90.3	94.6	P/P	40 - 150
1961018	Fenuron	97.6	102	P/P	40 - 150
1961018	Fluridone	93.3	109	P/P	40 - 150
1961018	Imidacloprid	161	152	F/P	40 - 160
1961018	Linuron	100	105	P/P	40 - 150
1961018	MCP	54.1	59.0	P/P	40 - 150
1961018	Primidone	126	134	P/P	40 - 150
1961018	Triclopyr	52.7	58.0	P/P	40 - 150

Quality Assurance Report Precision

Reference Method: EPA 180.1 Rev. 2.0
Batch ID: P338647

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960961	Turbidity	0.0	Sample	P	0 - 20

Reference Method: EPA 200.7 Rev. 4.4
Batch ID: P338723

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1961028	Calcium	0.370	Spike	P	0 - 20
1961028	Iron	0.811	Spike	P	0 - 20
1961028	Magnesium	0.207	Spike	P	0 - 20
1961028	Potassium	0.480	Spike	P	0 - 20
1961028	Sodium	0.0255	Spike	P	0 - 20
1961028	Zinc	1.48	Spike	P	0 - 20

Quality Assurance Report Precision

Reference Method: EPA 200.8 Rev. 5.4
Batch ID: P338723

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1961028	Arsenic	0.543	Spike	P	0 - 20
1961028	Cadmium	0.200	Spike	P	0 - 20
1961028	Chromium	0.692	Spike	P	0 - 20
1961028	Copper	0.0537	Spike	P	0 - 20
1961028	Lead	0.175	Spike	P	0 - 20
1961028	Nickel	0.389	Spike	P	0 - 20
1961028	Silver	0.253	Spike	P	0 - 20

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P338759

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960982	Chloride	0.630	Sample	P	0 - 20

Reference Method: EPA 300.0 Rev. 2.1
Batch ID: P338762

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960982	Sulfate	0.710	Sample	P	0 - 20

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P338945

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960463	Ammonia-N	0.370	Spike	P	0 - 20

Reference Method: EPA 350.1 Rev. 2.0
Batch ID: P338946

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960985	Ammonia-N	0.503	Spike	P	0 - 20

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P338826

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960984	Kjeldahl Nitrogen	0.331	Spike	P	0 - 20

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P339100

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1962820	Kjeldahl Nitrogen	0.725	Spike	P	0 - 20

Quality Assurance Report Precision

Reference Method: EPA 351.2 Rev. 2.0
Batch ID: P339426

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1964318	Kjeldahl Nitrogen	2.30	Spike	P	0 - 20

Reference Method: EPA 353.2 Rev. 2.0
Batch ID: P338715

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960984	NO2NO3-N	0.0	Spike	P	0 - 20

Reference Method: EPA 365.1 Rev. 2.0
Batch ID: P338796

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960990	Total-P	4.47	Spike	P	0 - 20

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Batch ID: P338654

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960918	O-Phosphate-P	0.336	Spike	P	0 - 20

Reference Method: EPA 8270D
Batch ID: P338607

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960221	Aldrin	12.3	Spike	P	0 - 30
1960221	Alpha-BHC	11.3	Spike	P	0 - 30
1960221	Alpha-Chlordane	0.640	Spike	P	0 - 30
1960221	Beta-BHC	0.455	Spike	P	0 - 30
1960221	Carbophenothion	9.07	Spike	P	0 - 30
1960221	Chlorothalonil	15.5	Spike	P	0 - 30
1960221	Cypermethrin	0.113	Spike	P	0 - 30
1960221	DDD-p,p'	11.3	Spike	P	0 - 30
1960221	DDE-p,p'	4.54	Spike	P	0 - 30
1960221	DDT-p,p'	1.03	Spike	P	0 - 30
1960221	Delta-BHC	2.52	Spike	P	0 - 30
1960221	Dicofol	3.16	Spike	P	0 - 30
1960221	Dieldrin	1.84	Spike	P	0 - 30
1960221	Endosulfan I	6.55	Spike	P	0 - 30
1960221	Endosulfan II	4.10	Spike	P	0 - 30
1960221	Endosulfan Sulfate	5.76	Spike	P	0 - 30
1960221	Endrin	1.15	Spike	P	0 - 30
1960221	Endrin Aldehyde	23.3	Spike	P	0 - 30
1960221	Endrin Ketone	6.17	Spike	P	0 - 30
1960221	Gamma-BHC	6.96	Spike	P	0 - 30
1960221	Gamma-Chlordane	0.291	Spike	P	0 - 30
1960221	Heptachlor	5.69	Spike	P	0 - 30
1960221	Heptachlor Epoxide	1.16	Spike	P	0 - 30

Quality Assurance Report Precision

Reference Method: EPA 8270D

Batch ID: P338607

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960221	Methoxychlor	0.472	Spike	P	0 - 30
1960221	Mirex	6.48	Spike	P	0 - 30
1960221	Permethrin	7.56	Spike	P	0 - 30
1960221	Trifluralin	1.56	Spike	P	0 - 30
LFB	Aldrin	9.99	LCS	P	0 - 30
LFB	Alpha-BHC	3.07	LCS	P	0 - 30
LFB	Alpha-Chlordane	6.18	LCS	P	0 - 30
LFB	Beta-BHC	5.89	LCS	P	0 - 30
LFB	Carbophenothion	11.9	LCS	P	0 - 30
LFB	Chlorothalonil	17.2	LCS	P	0 - 30
LFB	Cypermethrin	6.57	LCS	P	0 - 30
LFB	DDD-p,p'	2.24	LCS	P	0 - 30
LFB	DDE-p,p'	6.57	LCS	P	0 - 30
LFB	DDT-p,p'	8.77	LCS	P	0 - 30
LFB	Delta-BHC	3.57	LCS	P	0 - 30
LFB	Dicofol	0.840	LCS	P	0 - 30
LFB	Dieldrin	6.65	LCS	P	0 - 30
LFB	Endosulfan I	1.09	LCS	P	0 - 30
LFB	Endosulfan II	0.388	LCS	P	0 - 30
LFB	Endosulfan Sulfate	0.0460	LCS	P	0 - 30
LFB	Endrin	6.76	LCS	P	0 - 30
LFB	Endrin Aldehyde	5.77	LCS	P	0 - 30
LFB	Endrin Ketone	0.851	LCS	P	0 - 30
LFB	Gamma-BHC	0.475	LCS	P	0 - 30
LFB	Gamma-Chlordane	5.60	LCS	P	0 - 30
LFB	Heptachlor	8.21	LCS	P	0 - 30
LFB	Heptachlor Epoxide	6.64	LCS	P	0 - 30
LFB	Methoxychlor	2.48	LCS	P	0 - 30
LFB	Mirex	2.96	LCS	P	0 - 30
LFB	Permethrin	5.02	LCS	P	0 - 30
LFB	Trifluralin	5.54	LCS	P	0 - 30

Reference Method: EPA 8270D

Batch ID: P338832

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1961026	Acetochlor	0.919	Spike	P	0 - 30
1961026	Alachlor	2.72	Spike	P	0 - 30
1961026	Ametryn	4.49	Spike	P	0 - 30
1961026	Atrazine	6.58	Spike	P	0 - 30
1961026	Atrazine Desethyl	22.7	Spike	P	0 - 30
1961026	Azinphos Methyl	6.83	Spike	P	0 - 30
1961026	Bromacil	15.6	Spike	P	0 - 30
1961026	Butylate	30.3	Spike	F	0 - 30
1961026	Chlorpyrifos Ethyl	2.36	Spike	P	0 - 30
1961026	Chlorpyrifos Methyl	2.77	Spike	P	0 - 30
1961026	Cyanazine	23.5	Spike	P	0 - 30
1961026	Demeton	4.88	Spike	P	0 - 30
1961026	Diazinon	2.30	Spike	P	0 - 30
1961026	Disulfoton	5.98	Spike	P	0 - 30

Quality Assurance Report Precision

Reference Method: EPA 8270D

Batch ID: P338832

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1961026	EPTC	35.7	Spike	F	0 - 30
1961026	Ethion	2.30	Spike	P	0 - 30
1961026	Ethoprop	3.12	Spike	P	0 - 30
1961026	Fenamiphos	15.0	Spike	P	0 - 30
1961026	Fipronil	26.1	Spike	P	0 - 30
1961026	Fipronil Sulfide	34.3	Spike	F	0 - 30
1961026	Fipronil Sulfone	56.3	Spike	F	0 - 30
1961026	Fonofos	6.17	Spike	P	0 - 30
1961026	Hexazinone	11.0	Spike	P	0 - 30
1961026	Malathion	9.06	Spike	P	0 - 30
1961026	Metalaxyl	12.2	Spike	P	0 - 30
1961026	Metolachlor	1.00	Spike	P	0 - 30
1961026	Metribuzin	5.79	Spike	P	0 - 30
1961026	Mevinphos	3.52	Spike	P	0 - 30
1961026	Molinate	30.2	Spike	F	0 - 30
1961026	Norflurazon	31.0	Spike	F	0 - 30
1961026	Parathion Ethyl	3.00	Spike	P	0 - 30
1961026	Parathion Methyl	1.21	Spike	P	0 - 30
1961026	Pendimethalin	6.91	Spike	P	0 - 30
1961026	Phorate	1.46	Spike	P	0 - 30
1961026	Prometon	3.13	Spike	P	0 - 30
1961026	Prometryn	1.67	Spike	P	0 - 30
1961026	Simazine	2.43	Spike	P	0 - 30
1961026	Terbufos	3.81	Spike	P	0 - 30
1961026	Terbutylazine	1.51	Spike	P	0 - 30
LFB	Acetochlor	3.09	LCS	P	0 - 30
LFB	Alachlor	2.21	LCS	P	0 - 30
LFB	Ametryn	3.76	LCS	P	0 - 30
LFB	Atrazine	8.54	LCS	P	0 - 30
LFB	Atrazine Desethyl	4.43	LCS	P	0 - 30
LFB	Azinphos Methyl	11.7	LCS	P	0 - 30
LFB	Bromacil	3.54	LCS	P	0 - 30
LFB	Butylate	19.1	LCS	P	0 - 30
LFB	Chlorpyrifos Ethyl	13.8	LCS	P	0 - 30
LFB	Chlorpyrifos Methyl	16.1	LCS	P	0 - 30
LFB	Cyanazine	7.38	LCS	P	0 - 30
LFB	Demeton	26.8	LCS	P	0 - 30
LFB	Diazinon	3.77	LCS	P	0 - 30
LFB	Disulfoton	24.5	LCS	P	0 - 30
LFB	EPTC	27.3	LCS	P	0 - 30
LFB	Ethion	7.49	LCS	P	0 - 30
LFB	Ethoprop	11.8	LCS	P	0 - 30
LFB	Fenamiphos	33.6	LCS	F	0 - 30
LFB	Fipronil	3.99	LCS	P	0 - 30
LFB	Fipronil Sulfide	2.97	LCS	P	0 - 30
LFB	Fipronil Sulfone	3.54	LCS	P	0 - 30
LFB	Fonofos	8.66	LCS	P	0 - 30
LFB	Hexazinone	11.2	LCS	P	0 - 30
LFB	Malathion	1.98	LCS	P	0 - 30
LFB	Metalaxyl	57.0	LCS	F	0 - 30
LFB	Metolachlor	4.37	LCS	P	0 - 30

Quality Assurance Report Precision

Reference Method: EPA 8270D

Batch ID: P338832

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
LFB	Metribuzin	12.6	LCS	P	0 - 30
LFB	Mevinphos	12.2	LCS	P	0 - 30
LFB	Molinate	23.7	LCS	P	0 - 30
LFB	Norflurazon	14.4	LCS	P	0 - 30
LFB	Parathion Ethyl	0.0946	LCS	P	0 - 30
LFB	Parathion Methyl	5.18	LCS	P	0 - 30
LFB	Pendimethalin	15.5	LCS	P	0 - 30
LFB	Phorate	27.9	LCS	P	0 - 30
LFB	Prometon	8.63	LCS	P	0 - 30
LFB	Prometryn	3.34	LCS	P	0 - 30
LFB	Simazine	5.07	LCS	P	0 - 30
LFB	Terbufos	13.4	LCS	P	0 - 30
LFB	Terbutylazine	3.54	LCS	P	0 - 30

Reference Method: EPA 8276

Batch ID: P338607

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1961055	Chlordane	2.43	Spike	P	0 - 30
1961055	Toxaphene	5.42	Spike	P	0 - 30
LFB	Chlordane	1.80	LCS	P	0 - 30
LFB	Toxaphene	5.79	LCS	P	0 - 30

Reference Method: EPA 8321B

Batch ID: P338457

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960487	Sucralose	4.82	Spike	P	0 - 30

Reference Method: EPA 8321B

Batch ID: P338652

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1961018	3-Hydroxycarbofuran	0.745	Spike	P	0 - 30
1961018	Aldicarb	11.0	Spike	P	0 - 30
1961018	Aldicarb Sulfone	2.83	Spike	P	0 - 30
1961018	Aldicarb Sulfoxide	4.63	Spike	P	0 - 30
1961018	Carbaryl	13.9	Spike	P	0 - 30
1961018	Carbofuran	9.36	Spike	P	0 - 30
1961018	Methiocarb	8.47	Spike	P	0 - 30
1961018	Methomyl	0.685	Spike	P	0 - 30
1961018	Oxamyl	0.0696	Spike	P	0 - 30
1961018	Propoxur	15.7	Spike	P	0 - 30
1961018	Pyraclostrobin	18.1	Spike	P	0 - 30

Quality Assurance Report Precision

Reference Method: EPA 8321B
Batch ID: P338691

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1961018	AMPA	1.43	Spike	P	0 - 30
1961018	Glyphosate	3.53	Spike	P	0 - 30

Reference Method: SM 2120 B
Batch ID: P338637

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960960	Color (true)	0.907	Sample	P	0 - 20

Reference Method: SM 2320 B-97
Batch ID: P338923

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1961439	Total Alkalinity	0.671	Sample	P	0 - 4.8

Reference Method: SM 2540 C-97
Batch ID: P338983

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960959	TDS	1.07	Sample	P	0 - 10

Reference Method: SM 4500 F-C-97
Batch ID: P339356

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960705	Fluoride	2.90	Spike	P	0 - 3.0

Reference Method: SM 4500 F-C-97
Batch ID: P339357

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1961110	Fluoride	0.519	Spike	P	0 - 3.0

Reference Method: SM 5310 B-00
Batch ID: P339030

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1960984	Organic Carbon	0.731	Spike	P	0 - 20

Reference Method: USGS O-2060-01
Batch ID: P338652

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1961018	2,4-D	5.02	Spike	P	0 - 30

Quality Assurance Report Precision

Reference Method: USGS O-2060-01
Batch ID: P338652

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
1961018	Acetaminophen	1.96	Spike	P	0 - 30
1961018	Bentazon	8.95	Spike	P	0 - 30
1961018	Carbamazepine	4.08	Spike	P	0 - 30
1961018	Diuron	4.67	Spike	P	0 - 30
1961018	Fenuron	4.52	Spike	P	0 - 30
1961018	Fluridone	9.64	Spike	P	0 - 30
1961018	Imidacloprid	5.57	Spike	P	0 - 30
1961018	Linuron	4.58	Spike	P	0 - 30
1961018	MCP	8.58	Spike	P	0 - 30
1961018	Primidone	6.61	Spike	P	0 - 30
1961018	Triclopyr	9.47	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: 1961018
Field Sample ID: G2CE0152

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8321B	Acetaminophen-d4	107	P	30 - 160
EPA 8321B	Acetaminophen-d4	107	P	30 - 160
EPA 8321B	Carbamazepine-d10	95.8	P	30 - 160
EPA 8321B	Carbamazepine-d10	95.8	P	30 - 160
EPA 8321B	Diuron-d6	84.0	P	30 - 160
EPA 8321B	Diuron-d6	84.0	P	30 - 160
EPA 8321B	Diuron-d6	84.0	P	30 - 160
EPA 8321B	Diuron-d6	84.0	P	30 - 160
EPA 8321B	Glyphosate 13C 15N	86.2	P	40 - 160
EPA 8321B	Primidone-d5	109	P	30 - 160
EPA 8321B	Primidone-d5	109	P	30 - 160
EPA 8321B	Sucralose-d6	102	P	40 - 160
EPA 8321B	Sucralose-d6	102	P	40 - 160
USGS O-2060-01	2,4-D-d3	66.0	P	30 - 160
USGS O-2060-01	Acetaminophen-d4	107	P	30 - 160
USGS O-2060-01	Carbamazepine-d10	95.8	P	30 - 160
USGS O-2060-01	Diuron-d6	84.0	P	30 - 160
USGS O-2060-01	Diuron-d6	84.0	P	30 - 160
USGS O-2060-01	Primidone-d5	109	P	30 - 160
USGS O-2060-01	Sucralose-d6	102	P	40 - 160

Lab Sample ID: 1961019
Field Sample ID: G2CE0152

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8321B	Carbaryl-d7	63.4	P	30 - 160

Quality Assurance Report Surrogates

Lab Sample ID: 1961025
Field Sample ID: G2CE0152

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8270D	Decachlorobiphenyl	67.6	P	37 - 117
EPA 8270D	Tetrachloro-m-xylene	42.5	P	34 - 101
EPA 8276	Decachlorobiphenyl	56.6	P	31 - 108
EPA 8276	PCNB	105	P	40 - 130

Lab Sample ID: 1961026
Field Sample ID: G2CE0152

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8270D	Simazine-d10	120	P	71 - 126
EPA 8270D	Terbufos-d10	122	P	50 - 130

Quality Assurance Report Calibration Verification

Reference Method: SM 2120 B
Run ID: A81607
Included Lab Sample IDs: 1960982, 1960983, 1960988, 1960989

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Color (true)	101	102	P/P	85 - 115

Reference Method: EPA 180.1 Rev. 2.0
Run ID: A81610
Included Lab Sample IDs: 1960982, 1960983, 1960988, 1960989

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

Reference Method: EPA 365.1 Rev. 2.0 dissolved
Run ID: A81611
Included Lab Sample IDs: 1960986, 1960987, 1960992, 1960993

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
O-Phosphate-P	98.9	99.2	P/P	90 - 110

Reference Method: EPA 300.0 Rev. 2.1
Run ID: A81616
Included Lab Sample IDs: 1960982, 1960983, 1960988, 1960989

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Chloride	101	99.5	P/P	90 - 110
Chloride	101	102	P/P	90 - 110
Chloride	99.5	101	P/P	90 - 110
Sulfate	101	102	P/P	90 - 110
Sulfate	101	97.8	P/P	90 - 110
Sulfate	97.8	101	P/P	90 - 110

Quality Assurance Report Calibration Verification

Reference Method: EPA 353.2 Rev. 2.0

Run ID: A81625

Included Lab Sample IDs: 1960984, 1960985, 1960990, 1960991

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

Reference Method: EPA 200.7 Rev. 4.4

Run ID: A81658

Included Lab Sample IDs: 1961028, 1961029

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Calcium	99.9	97.2	P/P	90 - 110
Iron	101	99.3	P/P	90 - 110
Magnesium	101	99.2	P/P	90 - 110
Potassium	97.6	97.0	P/P	90 - 110
Sodium	99.2	97.5	P/P	90 - 110
Zinc	99.5	99.0	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A81670

Included Lab Sample IDs: 1960990, 1960991

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

Reference Method: EPA 8321B

Run ID: A81671

Included Lab Sample IDs: 1961019

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
3-Hydroxycarbofuran	118	107	P/P	60 - 150
Aldicarb	135	114	P/P	60 - 150
Aldicarb Sulfone	107	103	P/P	50 - 150
Aldicarb Sulfoxide	129	106	P/P	50 - 150
Carbaryl	121	99.5	P/P	60 - 150
Carbofuran	120	109	P/P	50 - 150
Methiocarb	127	106	P/P	50 - 150
Methomyl	108	110	P/P	50 - 150
Oxamyl	121	107	P/P	50 - 150
Propoxur	117	108	P/P	50 - 150
Pyraclostrobin	111	116	P/P	60 - 150

Reference Method: USGS O-2060-01

Run ID: A81671

Included Lab Sample IDs: 1961018

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
2,4-D	78.1	91.0	P/P	50 - 150
Acetaminophen	105	104	P/P	60 - 150
Bentazon	97.8	109	P/P	50 - 150
Carbamazepine	113	114	P/P	60 - 150
Diuron	110	117	P/P	60 - 150
Fenuron	111	113	P/P	60 - 150
Fluridone	119	124	P/P	60 - 160

Quality Assurance Report Calibration Verification

Reference Method: USGS O-2060-01

Run ID: A81671

Included Lab Sample IDs: 1961018

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Imidacloprid	103	104	P/P	60 - 150
Linuron	115	118	P/P	60 - 150
MCPP	91.5	97.8	P/P	50 - 150
Primidone	106	108	P/P	60 - 150
Triclopyr	92.4	98.7	P/P	50 - 150

Reference Method: EPA 8321B

Run ID: A81676

Included Lab Sample IDs: 1961018

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
AMPA	70.6	75.8	P/P	60 - 150
Glyphosate	64.4	73.6	P/P	60 - 150

Reference Method: EPA 200.8 Rev. 5.4

Run ID: A81683

Included Lab Sample IDs: 1961028, 1961029

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Arsenic	104	103	P/P	90 - 110
Cadmium	100	102	P/P	90 - 110
Chromium	103	103	P/P	90 - 110
Copper	103	102	P/P	90 - 110
Lead	99.3	99.4	P/P	90 - 110
Nickel	103	102	P/P	90 - 110
Silver	100	101	P/P	90 - 110

Reference Method: SM 2320 B-97

Run ID: A81689

Included Lab Sample IDs: 1960982, 1960983, 1960988, 1960989

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Total Alkalinity	99.2	97.2	P/P	90 - 110

Reference Method: EPA 365.1 Rev. 2.0

Run ID: A81694

Included Lab Sample IDs: 1960984, 1960985

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

Reference Method: EPA 350.1 Rev. 2.0

Run ID: A81704

Included Lab Sample IDs: 1960984, 1960985, 1960990, 1960991

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

Quality Assurance Report Calibration Verification

Reference Method: EPA 351.2 Rev. 2.0

Run ID: A81718

Included Lab Sample IDs: 1960991

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

Reference Method: EPA 8321B

Run ID: A81725

Included Lab Sample IDs: 1961018

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Sucralose	98.8	108	P/P	60 - 150

Reference Method: SM 5310 B-00

Run ID: A81738

Included Lab Sample IDs: 1960984, 1960985, 1960990, 1960991

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Organic Carbon	98.6	99.8	P/P	90 - 110
Organic Carbon	99.1	98.6	P/P	90 - 110

Reference Method: EPA 8270D

Run ID: A81761

Included Lab Sample IDs: 1961025

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Aldrin	97.4		P	80 - 120
Alpha-BHC	101		P	80 - 120
Alpha-Chlordane	99.1		P	80 - 120
Beta-BHC	94.0		P	80 - 120
Carbophenothion	110		P	80 - 120
Chlorothalonil	108		P	80 - 120
Cypermethrin	97.3		P	80 - 120
DDD-p,p'	102		P	80 - 120
DDE-p,p'	98.7		P	80 - 120
DDT-p,p'	104		P	80 - 120
Delta-BHC	101		P	80 - 120
Dicofol	101		P	80 - 120
Dieldrin	101		P	80 - 120
Endosulfan I	96.6		P	80 - 120
Endosulfan II	102		P	80 - 120
Endosulfan Sulfate	101		P	80 - 120
Endrin	97.9		P	80 - 120
Endrin Aldehyde	99.7		P	80 - 120
Endrin Ketone	102		P	80 - 120
Gamma-BHC	92.3		P	80 - 120
Gamma-Chlordane	102		P	80 - 120
Heptachlor	95.8		P	80 - 120
Heptachlor Epoxide	99.2		P	80 - 120
Methoxychlor	104		P	80 - 120
Mirex	101		P	80 - 120
Permethrin	98.9		P	80 - 120
Trifluralin	99.6		P	80 - 120

Quality Assurance Report Calibration Verification

Reference Method: EPA 8276

Run ID: A81772

Included Lab Sample IDs: 1961025

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Chlordane	92.4		P	80 - 120
Toxaphene	99.0		P	80 - 120

Reference Method: EPA 351.2 Rev. 2.0

Run ID: A81832

Included Lab Sample IDs: 1960985, 1960990

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

Reference Method: SM 4500 F-C-97

Run ID: A81863

Included Lab Sample IDs: 1960982, 1960983, 1960988, 1960989

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Fluoride	98.5	99.5	P/P	90 - 110
Fluoride	99.1	98.5	P/P	90 - 110

Reference Method: EPA 8270D

Run ID: A81885

Included Lab Sample IDs: 1961026

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Acetochlor	102		P	80 - 120
Alachlor	103		P	80 - 120
Ametryn	99.4		P	80 - 120
Atrazine	112		P	80 - 120
Atrazine Desethyl	108		P	80 - 120
Azinphos Methyl	98.6		P	80 - 120
Bromacil	109		P	80 - 120
Butylate	97.4		P	80 - 120
Chlorpyrifos Ethyl	105		P	80 - 120
Chlorpyrifos Methyl	109		P	80 - 120
Cyanazine	109		P	80 - 120
Demeton	106		P	80 - 120
Diazinon	108		P	80 - 120
Disulfoton	103		P	80 - 120
EPTC	110		P	80 - 120
Ethion	104		P	80 - 120
Ethoprop	94.5		P	80 - 120
Fenamiphos	106		P	80 - 120
Fipronil	98.9		P	80 - 120
Fipronil Sulfide	107		P	80 - 120
Fipronil Sulfone	105		P	80 - 120
Fonofos	109		P	80 - 120
Hexazinone	108		P	80 - 120
Malathion	106		P	80 - 120
Metaxyl	103		P	80 - 120
Metolachlor	105		P	80 - 120
Metribuzin	115		P	80 - 120
Mevinphos	111		P	80 - 120

Quality Assurance Report Calibration Verification

Reference Method: EPA 8270D
 Run ID: A81885
 Included Lab Sample IDs: 1961026

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Molinate	103		P	80 - 120
Norflurazon	104		P	80 - 120
Parathion Ethyl	109		P	80 - 120
Parathion Methyl	115		P	80 - 120
Pendimethalin	107		P	80 - 120
Phorate	111		P	80 - 120
Prometon	103		P	80 - 120
Prometryn	102		P	80 - 120
Simazine	107		P	80 - 120
Terbufos	110		P	80 - 120
Terbuthylazine	105		P	80 - 120

Reference Method: EPA 351.2 Rev. 2.0
 Run ID: A81900
 Included Lab Sample IDs: 1960984

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Kjeldahl Nitrogen	95.1	94.8	P/P	90 - 110

* Pass/Fail determinations are made for each bracketing calibration verification check.
 Control limits for initial calibration checks may be different from those for continuing checks, depending on method requirements.
 Where they are different, both control limits are provided.

Quality Assurance Report Summary

Ref. Method	Analyte	LCS % Recovery	MS % Recovery			LCS	Precision SMP	MS
EPA 180.1 Rev. 2.0	Turbidity						0.0	
EPA 200.7 Rev. 4.4	Calcium	104		100				0.370
	Iron	104		101	103	104		0.811
	Magnesium	109		101	103	103		0.207
	Potassium	101		99.2	96.0	95.1		0.480
	Sodium	101		99.1	97.7			0.0255
	Zinc	99.7		98.1	99.0	100		1.48
EPA 200.8 Rev. 5.4	Arsenic	107		106	103	104		0.543
	Cadmium	100		101	101	101		0.200
	Chromium	104		98.8	100	99.5		0.692
	Copper	104		98.1	98.5	98.5		0.0537
	Lead	101		101	99.7	99.5		0.175
	Nickel	106		98.4	101	101		0.389
	Silver	99.6		96.7	98.4	98.6		0.253
EPA 300.0 Rev. 2.1	Chloride	104		103	101		0.630	
	Sulfate	101		101	97.0		0.710	
EPA 350.1 Rev. 2.0	Ammonia-N	104		101	102			0.370
	Ammonia-N	101		101	102			0.503
EPA 351.2 Rev. 2.0	Kjeldahl Nitrogen	99.5		97.0	96.6			0.331
	Kjeldahl Nitrogen	104		100	101			0.725
	Kjeldahl Nitrogen	93.9		92.0	94.5			2.30
EPA 353.2 Rev. 2.0	NO2NO3-N	104		105	105			0.0

Quality Assurance Report Summary

Ref. Method	Analyte	LCS % Recovery		MS % Recovery		LCS	Precision	MS
							SMP	
EPA 365.1 Rev. 2.0	Total-P	100		101	96.2			4.47
EPA 365.1 Rev. 2.0 dissolved	O-Phosphate-P	97.7		96.8	97.4			0.336
EPA 8270D	Acetochlor	101	104	102	101	3.09		0.919
	Alachlor	105	107	106	103	2.21		2.72
	Aldrin	49.1	44.4	48.3	54.6	9.99		12.3
	Alpha-BHC	64.8	66.9	69.5	77.8	3.07		11.3
	Alpha-Chlordane	66.7	70.9	74.5	75.0	6.18		0.640
	Ametryn	109	105	170	163	3.76		4.49
	Atrazine	100	109			8.54		6.58
	Atrazine Desethyl	63.1	66.0	73.2	54.0	4.43		22.7
	Azinphos Methyl	98.7	111	129	120	11.7		6.83
	Beta-BHC	75.3	79.9	83.9	83.5	5.89		0.455
	Bromacil	72.9	75.5	95.7	81.8	3.54		15.6
	Butylate	66.9	80.9	32.2	43.8	19.1		30.3
	Carbophenothion	59.2	52.6	67.5	73.9	11.9		9.07
	Chlorothalonil	79.6	67.0	95.7	112	17.2		15.5
	Chlorpyrifos Ethyl	97.1	112	108	106	13.8		2.36
	Chlorpyrifos Methyl	86.3	101	104	101	16.1		2.77
	Cyanazine	97.1	90.1	163	129	7.38		23.5
	Cypermethrin	76.1	81.2	90.5	90.6	6.57		0.113
	DDD-p,p'	74.3	76.0	84.4	75.3	2.24		11.3
	DDE-p,p'	72.3	67.7	74.1	70.8	6.57		4.54
	DDT-p,p'	79.5	72.8	81.2	82.0	8.77		1.03
	Delta-BHC	79.1	82.0	106	108	3.57		2.52
	Demeton	62.7	82.2	61.5	64.6	26.8		4.88
	Diazinon	101	105	95.7	98.0	3.77		2.30
	Dicofol	68.6	69.2	76.3	73.9	0.840		3.16
	Dieldrin	72.8	68.1	74.0	72.6	6.65		1.84
	Disulfoton	60.7	77.6	88.2	83.0	24.5		5.98
	Endosulfan I	75.5	74.7	76.8	82.0	1.09		6.55
	Endosulfan II	71.6	71.9	85.2	88.8	0.388		4.10
	Endosulfan Sulfate	72.8	72.8	76.5	81.1	0.0460		5.76
	Endrin	74.5	69.6	74.6	75.4	6.76		1.15
	Endrin Aldehyde	69.5	65.6	52.3	41.4	5.77		23.3
	Endrin Ketone	74.5	73.8	80.2	75.4	0.851		6.17
	EPTC	66.4	87.4	32.5	46.6	27.3		35.7
	Ethion	112	121	121	118	7.49		2.30
	Ethoprop	83.7	94.2	72.1	69.9	11.8		3.12
	Fenamiphos	50.1	70.3	104	89.7	33.6		15.0
	Fipronil	105	101	101	77.4	3.99		26.1
	Fipronil Sulfide	111	108	98.0	66.4	2.97		34.3
	Fipronil Sulfone	110	106	92.2	16.1	3.54		56.3
	Fonofos	87.9	95.8	92.1	86.5	8.66		6.17
	Gamma-BHC	75.1	75.5	79.0	84.6	0.475		6.96
	Gamma-Chlordane	69.3	73.3	74.0	73.7	5.60		0.291
	Heptachlor	62.9	57.9	58.5	62.0	8.21		5.69
	Heptachlor Epoxide	70.2	65.6	71.2	72.0	6.64		1.16
	Hexazinone	142	158	126	111	11.2		11.0
	Malathion	115	117	119	109	1.98		9.06
	Metalaxyl	33.1	59.5	126	112	57.0		12.2
	Methoxychlor	79.3	81.3	85.3	85.7	2.48		0.472
	Metolachlor	107	111	109	110	4.37		1.00
	Metribuzin	95.2	108	163	154	12.6		5.79
	Mevinphos	81.2	91.7	69.4	67.0	12.2		3.52

Quality Assurance Report Summary

Ref. Method	Analyte	LCS % Recovery		MS % Recovery		Precision	
						LCS	MS
						SMP	
EPA 8270D	Mirex	69.9	72.0	73.8	69.1	2.96	6.48
	Molinate	70.0	88.8	41.3	56.0	23.7	30.2
	Norflurazon	92.7	80.2	107	78.3	14.4	31.0
	Parathion Ethyl	103	103	105	108	0.0946	3.00
	Parathion Methyl	101	106	108	107	5.18	1.21
	Pendimethalin	92.3	108	108	116	15.5	6.91
	Permethrin	80.5	84.6	90.4	97.5	5.02	7.56
	Phorate	65.3	86.5	72.2	73.3	27.9	1.46
	Prometon	98.7	90.5	116	112	8.63	3.13
	Prometryn	102	105	105	103	3.34	1.67
	Simazine	105	110	117	120	5.07	2.43
	Terbufos	81.4	93.1	88.1	84.8	13.4	3.81
	Terbutylazine	107	110	109	107	3.54	1.51
	Trifluralin	66.8	70.6	74.3	73.2	5.54	1.56
	Chlordane	78.7	80.1	67.9	66.3	1.80	2.43
EPA 8276	Toxaphene	87.7	82.8	69.6	73.4	5.79	5.42
EPA 8321B	3-Hydroxycarbofuran	108		120	119		0.745
	Aldicarb	131		129	144		11.0
	Aldicarb Sulfone	109		132	135		2.83
	Aldicarb Sulfoxide	117		98.1	103		4.63
	AMPA	106		101	102		1.43
	Carbaryl	79.0		73.2	84.1		13.9
	Carbofuran	80.6		73.8	81.0		9.36
	Glyphosate	105		100	104		3.53
	Methiocarb	82.6		77.5	84.4		8.47
	Methomyl	109		92.4	93.0		0.685
	Oxamyl	99.7		100	100		0.0696
	Propoxur	79.3		66.3	77.5		15.7
	Pyraclostrobin	103		109	90.5		18.1
	Sucralose	97.4		97.9	93.1		4.82
SM 2120 B	Color (true)					0.907	
SM 2320 B-97	Total Alkalinity	99.5				0.671	
SM 2540 C-97	TDS					1.07	
SM 4500 F-C-97	Fluoride	96.0		97.7	93.6		2.90
	Fluoride	97.5		96.5	97.1		0.519
SM 5310 B-00	Organic Carbon	97.8		101	102		0.731
USGS O-2060-01	2,4-D	73.4		70.6	66.3		5.02
	Acetaminophen	101		126	129		1.96
	Bentazon	80.2		53.8	48.0		8.95
	Carbamazepine	101		101	105		4.08
	Diuron	86.8		90.3	94.6		4.67
	Fenuron	120		97.6	102		4.52
	Fluridone	118		93.3	109		9.64
	Imidacloprid	111		161	152		5.57
	Linuron	102		100	105		4.58
	MCP	74.7		59.0	54.1		8.58
	Primidone	120		126	134		6.61
	Triclopyr	77.7		58.0	52.7		9.47

Reference Method Descriptions

Method / DoH Cert #	Description	Associated Samples
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Reference Method Descriptions

Method / DoH Cert #	Description	Associated Samples
EPA 180.1 Rev. 2.0 / E31780	Turbidity in aqueous matrices	1960982, 1960983, 1960988, 1960989
EPA 200.7 Rev. 4.4 / E31780	Total Recoverable Metals analysis using ICP emission spectroscopy for aqueous samples supporting Clean Water Act Projects	1961028, 1961029
EPA 200.8 Rev. 5.4 / E31780	Total Recoverable Metals analysis using ICP-MS for aqueous samples supporting Clean Water Act Projects	1961028, 1961029
EPA 300.0 Rev. 2.1 / E31780	Chloride in aqueous matrices	1960982, 1960983, 1960988, 1960989
EPA 300.0 Rev. 2.1 / E31780	Sulfate in aqueous matrices	1960982, 1960983, 1960988, 1960989
EPA 350.1 Rev. 2.0 / E31780	Ammonia in aqueous matrices as mg N/L	1960984, 1960985, 1960990, 1960991
EPA 351.2 Rev. 2.0 / E31780	Total Kjeldahl Nitrogen in aqueous matrices	1960984, 1960985, 1960990, 1960991
EPA 353.2 Rev. 2.0 / E31780	Nitrite/Nitrate in aqueous matrices as mg N/L	1960984, 1960985, 1960990, 1960991
EPA 365.1 Rev. 2.0 / E31780	Total Phosphorus in aqueous matrices as mg P/L	1960984, 1960985, 1960990, 1960991
EPA 365.1 Rev. 2.0 dissolved / E31780	Ortho-phosphate, dissolved, in filtered, aqueous matrices as mg P/L	1960986, 1960987, 1960992, 1960993
EPA 8270D / E31780	Organochlorine pesticides in water matrices by GC/MS-SIM	1961025
EPA 8270D / E31780	Organonitrogen and phosphorus pesticides (ultra trace level) in water matrices by GC/MS/MS	1961026
EPA 8276 / E31780	Organochlorine pesticides in water matrices by GC/MS with Negative Chemical Ionization	1961025
EPA 8321B / E31780	Analysis of sucralose in water matrices by HPLC/MS/MS	1961018
EPA 8321B / E31780	Carbamates in water matrices by HPLC/MS/MS	1961019
EPA 8321B / E31780	Glyphosate in water matrices by HPLC/MS/MS	1961018
EPA 8321B / E31780	Pyraclostrobin in water matrices by HPLC/MS/MS	1961018
SM 2120 B / E31780	True Color measured at 450 nm	1960982, 1960983, 1960988, 1960989
SM 2320 B-97 / E31780	Alkalinity in aqueous matrices as mg CaCO ₃ /L	1960982, 1960983, 1960988, 1960989
SM 2540 C-97 / E31780	Total Dissolved Solids in aqueous matrices	1960982, 1960983, 1960988, 1960989
SM 2540 D-97 / E31780	Total Suspended Solids in aqueous matrices	1960982, 1960983, 1960988, 1960989
SM 4500 F-C-97 / E31780	Fluoride in aqueous matrices, without distillation (not valid for NPDES monitoring)	1960982, 1960983, 1960988, 1960989
SM 5310 B-00 / E31780	Nonpurgeable Organic Carbon in aqueous matrices	1960984, 1960985, 1960990, 1960991
USGS O-2060-01 / E31780	Chlorinated (phenoxy acid) herbicides in water matrices by HPLC/MS/MS	1961018
USGS O-2060-01 / E31780	Urea herbicides and other chemicals in water matrices by HPLC/MS/MS	1961018

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	01/23/2018			01/23/2018 15:16	DeAsia Armster	1960982, 1960983, 1960988, 1960989
EPA 200.7 Rev. 4.4	01/23/2018	01/24/2018	Elliott D. Healy	01/25/2018	Betina Topolski	1961028, 1961029
EPA 200.8 Rev. 5.4	01/23/2018	01/24/2018	Elliott D. Healy	01/26/2018	Nadine Brooks	1961028, 1961029
EPA 300.0 Rev. 2.1	01/23/2018			01/24/2018	Julia Storbeck	1960982, 1960983, 1960988, 1960989
EPA 350.1 Rev. 2.0	01/23/2018			01/26/2018	Ping Hua	1960984, 1960985, 1960990, 1960991
EPA 351.2 Rev. 2.0	01/23/2018	01/26/2018	Adrian Shelby	01/29/2018	Joseph Suarez	1960991
	01/23/2018	02/01/2018	Adrian Shelby	02/02/2018	Joseph Suarez	1960985, 1960990
	01/23/2018	02/07/2018	Adrian Shelby	02/07/2018	Joseph Suarez	1960984
EPA 353.2 Rev. 2.0	01/23/2018			01/24/2018	Lauren Bottorf	1960984, 1960985, 1960990, 1960991
EPA 365.1 Rev. 2.0	01/23/2018	01/25/2018	Sima Feizi	01/26/2018	Lipi Saha	1960984, 1960985, 1960990, 1960991
EPA 365.1 Rev. 2.0 dissolved	01/23/2018			01/23/2018 16:28	Megan Treadwell	1960986, 1960987
	01/23/2018			01/23/2018 16:29	Megan Treadwell	1960992
	01/23/2018			01/23/2018 16:30	Megan Treadwell	1960993
EPA 8270D	01/23/2018	01/24/2018	Fe-Val Siddell	01/29/2018	Marek Topolski	1961025
	01/23/2018	01/26/2018	John Kaba	01/31/2018	Vandana T. Nagar	1961026
EPA 8276	01/23/2018	01/24/2018	Fe-Val Siddell	01/31/2018	John P. Burgos	1961025
EPA 8321B	01/23/2018	01/24/2018	Hoor Shaik	01/25/2018	S. M. Reddy	1961018
	01/23/2018	01/25/2018	Juyoung Kim	01/26/2018	Juyoung Kim	1961018
	01/23/2018	01/26/2018	Juyoung Kim	01/26/2018	Juyoung Kim	1961018
SM 2120 B	01/23/2018			01/23/2018 15:07	Tanya Welborn	1960982
	01/23/2018			01/23/2018 15:08	Tanya Welborn	1960983, 1960988
	01/23/2018			01/23/2018 15:09	Tanya Welborn	1960989
SM 2320 B-97	01/23/2018			01/27/2018	Lauren Bottorf	1960982, 1960983, 1960988, 1960989
SM 2540 C-97	01/23/2018			01/24/2018	Yijie Li	1960982, 1960983, 1960988, 1960989
SM 2540 D-97	01/23/2018			01/24/2018	Yijie Li	1960982, 1960983, 1960988, 1960989
SM 4500 F-C-97	01/23/2018			02/05/2018	Dale L. Simmons	1960982, 1960983, 1960988, 1960989
SM 5310 B-00	01/23/2018			01/29/2018	Megan Treadwell	1960984, 1960985, 1960990, 1960991
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