

Chemical Analysis Report

CEN-DIST-2022-01-06-01

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

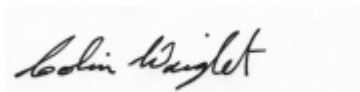
Event Description: **Run 16**
Request ID: **RQ-2022-01-03-27**
Customer: **CEN-DIST**
Project ID: **SMP**

Send Reports to:
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Certified by: Colin Wright, Program Administrator

Date Certified: 14-JAN-2022 09:23

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 group are included in this report: 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 by the Florida Department of Health Environmental Laboratory Certification Program or where accreditation for that field of testing is not applicable.

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

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

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

Precision is reported as relative percent difference unless otherwise noted.

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

QC Codes used in this report may include:

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

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

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

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

Sample Location: Smith Canal 40m S of St. Johns Pkwy

Collection Date/Time: 01/05/2022 11:09

Field ID: G2CE0241

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2297982	EPA 8321B	2,4-D	0.011		ug/L	P408154	
		Acesulfame K	0.31	I	ug/L	P408153	
		2,4,5-T	0.0040	U	ug/L	P408154	
		AMPA	0.61		ug/L	P408153	
		Acetaminophen	0.0080	U	ug/L	P408154	
		Acetamiprid	0.0020	U	ug/L	P408154	
		Endothall	0.25	U	ug/L	P408153	
		Glufosinate	0.10	U	ug/L	P408153	
		Glyphosate	1.2		ug/L	P408153	
		Afidopyropen	0.0020	U	ug/L	P408154	
		Bentazon	0.26		ug/L	P408154	
		Sucralose	3.1		ug/L	P408153	
		Benzovindiflupyr	0.0020	U	ug/L	P408154	
		Carbamazepine	0.0021	I	ug/L	P408154	
		Clothianidin	0.0021	I	ug/L	P408154	
		Dinotefuran	0.0039	I	ug/L	P408154	
		Diuron	0.0035	I	ug/L	P408154	
		Fenuron	0.016	U	ug/L	P408154	
		Fluridone	0.0075		ug/L	P408154	
		Imazapyr	0.15		ug/L	P408154	
		Hydrocodone	0.0020	U	ug/L	P408154	
		Ibuprofen	0.020	U	ug/L	P408154	
		Imidacloprid	0.0060	I	ug/L	P408154	
		Linuron	0.0040	U	ug/L	P408154	
		Mandestrobin	0.0020	U	ug/L	P408154	
		MCPP	0.0040	U	ug/L	P408154	
		Naproxen	0.0080	U	ug/L	P408154	
		Primidone	0.0040	U	ug/L	P408154	
		Pyraclostrobin	0.0020	U	ug/L	P408154	
		Silvex	0.0040	U	ug/L	P408154	
		Thiamethoxam	0.0020	U	ug/L	P408154	
		Tolfenpyrad	0.0020	U	ug/L	P408154	RPD
		Triclopyr	0.0040	U	ug/L	P408154	

Sample Location: Soldier Creek at 150m Upstream of SR Hwy 419 Collection Date/Time: 01/05/2022 12:10

Field ID: G2CE0071

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2297980	EPA 8270E	Aldrin	0.67	U	ng/L	P408157	
		Alpha-BHC	0.10	U	ng/L	P408157	
		Alpha-Chlordane	0.20	U	ng/L	P408157	
		Beta-BHC	0.10	U	ng/L	P408157	
		Beta-Cyfluthrin**	1.3	U	ng/L	P408157	
		Bifenthrin**	0.51	U	ng/L	P408157	
		Carbophenothion	0.92	U	ng/L	P408157	
		Chlorothalonil	1.3	U	ng/L	P408157	
		Cis-Nonachlor**	0.20	U	ng/L	P408157	
		Cypermethrin	1.5	U	ng/L	P408157	
		Dacthal**	0.15	U	ng/L	P408157	
		DDD-p,p'	0.26	U	ng/L	P408157	
		DDE-p,p'	0.20	U	ng/L	P408157	
		DDT-p,p'	0.26	U	ng/L	P408157	
		Delta-BHC	0.41	U	ng/L	P408157	
		Deltamethrin**	1.3	U	ng/L	P408157	
		Dichlobenil**	0.26	U	ng/L	P408157	
		Dicofol	1.3	U	ng/L	P408157	
		Dieldrin	0.41	U	ng/L	P408157	
		Endosulfan I	0.41	U	ng/L	P408157	
		Endosulfan II	0.41	U	ng/L	P408157	
		Endosulfan Sulfate	0.31	U	ng/L	P408157	
		Endrin	0.41	U	ng/L	P408157	
		Endrin Aldehyde	0.77	U	ng/L	P408157	
		Endrin Ketone	0.41	U	ng/L	P408157	
		Esfenvalerate**	0.77	U	ng/L	P408157	
		Ethalfuralin**	0.15	U	ng/L	P408157	
		Fenpropathrin**	0.26	U	ng/L	P408157	
		Gamma-BHC	0.13	U	ng/L	P408157	
		Gamma-Chlordane	0.20	U	ng/L	P408157	
		Heptachlor	0.20	U	ng/L	P408157	
		Heptachlor Epoxide	0.26	U	ng/L	P408157	
		Hexachlorobenzene	1.0	U	ng/L	P408157	
		Kepone**	5.1	UJ	ng/L	P408157	CCV, LCS
		Lambda-Cyhalothrin**	0.77	U	ng/L	P408157	
		Methoprene**	0.77	U	ng/L	P408157	
		Methoxychlor	0.31	U	ng/L	P408157	
		MGK-264**	0.20	U	ng/L	P408157	
		Mirex	0.72	U	ng/L	P408157	
		Oxychlordane**	0.31	U	ng/L	P408157	
		Permethrin	1.6	U	ng/L	P408157	
		Phenothrin**	0.92	U	ng/L	P408157	
		Piperonyl Butoxide**	0.18	I	ng/L	P408157	
		Prallethrin**	2.0	U	ng/L	P408157	

Field ID: G2CE0071

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2297980	EPA 8270E	Tau-Fluvalinate**	0.26	U	ng/L	P408157	
		Tetramethrin**	0.77	U	ng/L	P408157	
		Trans-Nonachlor**	0.20	U	ng/L	P408157	
		Triclosan Methyl**	0.15	U	ng/L	P408157	
		Trifluralin	0.20	U	ng/L	P408157	
	EPA 8276	Chlordane	2.6	U	ng/L	P408157	
		Toxaphene	15	U	ng/L	P408157	
2297983	EPA 8321B	2,4-D	0.0020	U	ug/L	P408154	
		Acesulfame K	0.19	I	ug/L	P408153	
		2,4,5-T	0.0040	U	ug/L	P408154	
		AMPA	0.10	U	ug/L	P408153	
		Acetaminophen	0.0080	U	ug/L	P408154	
		Acetamiprid	0.0020	U	ug/L	P408154	
		Endothall	0.25	U	ug/L	P408153	
		Glufosinate	0.10	U	ug/L	P408153	
		Glyphosate	0.10	U	ug/L	P408153	
		Afidopyropen	0.0020	U	ug/L	P408154	
		Bentazon	0.012		ug/L	P408154	
		Sucralose	1.8		ug/L	P408153	
		Benzovindiflupyr	0.0020	U	ug/L	P408154	
		Carbamazepine	0.0033		ug/L	P408154	
		Clothianidin	0.0020	U	ug/L	P408154	
		Dinotefuran	0.0020	U	ug/L	P408154	
		Diuron	0.0030	I	ug/L	P408154	
		Fenuron	0.016	U	ug/L	P408154	
		Fluridone	0.0062		ug/L	P408154	
		Imazapyr	0.14		ug/L	P408154	
		Hydrocodone	0.0020	U	ug/L	P408154	
		Ibuprofen	0.020	U	ug/L	P408154	
		Imidacloprid	0.0040	I	ug/L	P408154	
		Linuron	0.0040	U	ug/L	P408154	
		Mandestrobin	0.0020	U	ug/L	P408154	
		MCPP	0.0040	U	ug/L	P408154	
		Naproxen	0.0080	U	ug/L	P408154	
		Primidone	0.0040	U	ug/L	P408154	
		Pyraclostrobin	0.0020	U	ug/L	P408154	
		Silvex	0.0040	U	ug/L	P408154	
		Thiamethoxam	0.0020	U	ug/L	P408154	
		Tolfenpyrad	0.0020	U	ug/L	P408154	RPD
		Triclopyr	0.0040	U	ug/L	P408154	

Ref. Method and Comment:

EPA 8270E: Refer to the Lab Analysis Report for an explanation of QC Codes.

Sample Location: Gee Creek at Alton Rd

Collection Date/Time: 01/05/2022 12:51

Field ID: G2CE0161

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2297981	EPA 8270E	Aldrin	0.67	U	ng/L	P408157	
		Alpha-BHC	0.10	U	ng/L	P408157	
		Alpha-Chlordane	0.21	U	ng/L	P408157	
		Beta-BHC	0.10	U	ng/L	P408157	
		Beta-Cyfluthrin**	1.3	U	ng/L	P408157	
		Bifenthrin**	0.51	U	ng/L	P408157	
		Carbophenothion	0.92	U	ng/L	P408157	
		Chlorothalonil	1.3	U	ng/L	P408157	
		Cis-Nonachlor**	0.21	U	ng/L	P408157	
		Cypermethrin	1.5	U	ng/L	P408157	
		Dacthal**	0.15	U	ng/L	P408157	
		DDD-p,p'	0.26	U	ng/L	P408157	
		DDE-p,p'	0.21	U	ng/L	P408157	
		DDT-p,p'	0.26	U	ng/L	P408157	
		Delta-BHC	0.41	U	ng/L	P408157	
		Deltamethrin**	1.3	U	ng/L	P408157	
		Dichlobenil**	0.26	U	ng/L	P408157	
		Dicofol	1.3	U	ng/L	P408157	
		Dieldrin	1.1	I	ng/L	P408157	
		Endosulfan I	0.41	U	ng/L	P408157	
		Endosulfan II	0.41	U	ng/L	P408157	
		Endosulfan Sulfate	0.31	U	ng/L	P408157	
		Endrin	0.41	U	ng/L	P408157	
		Endrin Aldehyde	0.77	U	ng/L	P408157	
		Endrin Ketone	0.41	U	ng/L	P408157	
		Esfenvalerate**	0.77	U	ng/L	P408157	
		Ethalfuralin**	0.15	U	ng/L	P408157	
		Fenpropathrin**	0.26	U	ng/L	P408157	
		Gamma-BHC	0.13	U	ng/L	P408157	
		Gamma-Chlordane	0.21	U	ng/L	P408157	
		Heptachlor	0.21	U	ng/L	P408157	
		Heptachlor Epoxide	0.26	U	ng/L	P408157	
		Hexachlorobenzene	1.0	U	ng/L	P408157	
		Kepone**	5.1	UJ	ng/L	P408157	CCV, LCS
		Lambda-Cyhalothrin**	0.77	U	ng/L	P408157	
		Methoprene**	0.77	U	ng/L	P408157	
		Methoxychlor	0.31	U	ng/L	P408157	
		MGK-264**	0.21	U	ng/L	P408157	
		Mirex	0.72	U	ng/L	P408157	
		Oxychlordane**	0.31	U	ng/L	P408157	
		Permethrin	1.6	U	ng/L	P408157	
		Phenothrin**	0.92	U	ng/L	P408157	
		Piperonyl Butoxide**	0.16	I	ng/L	P408157	
		Prallethrin**	2.1	U	ng/L	P408157	

Field ID: G2CE0161

Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2297981	EPA 8270E	Tau-Fluvalinate**	0.26	U	ng/L	P408157	
		Tetramethrin**	0.77	U	ng/L	P408157	
		Trans-Nonachlor**	0.21	U	ng/L	P408157	
		Triclosan Methyl**	0.15	U	ng/L	P408157	
		Trifluralin	0.21	U	ng/L	P408157	
	EPA 8276	Chlordane	2.6	U	ng/L	P408157	
		Toxaphene	15	U	ng/L	P408157	

Ref. Method and Comment:
EPA 8270E: Refer to the Lab Analysis Report for an explanation of QC Codes.

Quality Assurance Report

Method Blank Results

Reference Method: EPA 8270E

Batch ID: P408157

Component	Result	Code	Units
Aldrin	0.65	U	ng/L
Aldrin	0.65	U	ng/L
Alpha-BHC	0.10	U	ng/L
Alpha-BHC	0.10	U	ng/L
Alpha-Chlordane	0.20	U	ng/L
Alpha-Chlordane	0.20	U	ng/L
Beta-BHC	0.10	U	ng/L
Beta-BHC	0.10	U	ng/L
Beta-Cyfluthrin	1.2	U	ng/L
Beta-Cyfluthrin	1.2	U	ng/L
Bifenthrin	0.50	U	ng/L
Bifenthrin	0.50	U	ng/L
Carbophenothion	0.90	U	ng/L
Carbophenothion	0.90	U	ng/L
Chlorothalonil	1.2	U	ng/L
Chlorothalonil	1.2	U	ng/L
Cis-Nonachlor	0.20	U	ng/L
Cis-Nonachlor	0.20	U	ng/L
Cypermethrin	1.5	U	ng/L
Cypermethrin	1.5	U	ng/L
Dacthal	0.15	U	ng/L
Dacthal	0.15	U	ng/L
DDD-p,p'	0.25	U	ng/L
DDD-p,p'	0.25	U	ng/L
DDE-p,p'	0.20	U	ng/L
DDE-p,p'	0.20	U	ng/L
DDT-p,p'	0.25	U	ng/L
DDT-p,p'	0.25	U	ng/L
Delta-BHC	0.40	U	ng/L
Delta-BHC	0.40	U	ng/L
Deltamethrin	1.2	U	ng/L
Deltamethrin	1.2	U	ng/L
Dichlobenil	0.25	U	ng/L
Dichlobenil	0.25	U	ng/L
Dicofol	1.2	U	ng/L
Dicofol	1.2	U	ng/L
Dieldrin	0.40	U	ng/L
Dieldrin	0.40	U	ng/L
Endosulfan I	0.40	U	ng/L
Endosulfan I	0.40	U	ng/L
Endosulfan II	0.40	U	ng/L
Endosulfan II	0.40	U	ng/L
Endosulfan Sulfate	0.30	U	ng/L
Endosulfan Sulfate	0.30	U	ng/L
Endrin	0.40	U	ng/L
Endrin	0.40	U	ng/L
Endrin Aldehyde	0.75	U	ng/L
Endrin Aldehyde	0.75	U	ng/L
Endrin Ketone	0.40	U	ng/L
Endrin Ketone	0.40	U	ng/L
Esfenvalerate	0.75	U	ng/L
Esfenvalerate	0.75	U	ng/L

Quality Assurance Report

Method Blank Results

Reference Method: EPA 8270E

Batch ID: P408157

Component	Result	Code	Units
Ethalfuralin	0.15	U	ng/L
Ethalfuralin	0.15	U	ng/L
Fenpropathrin	0.25	U	ng/L
Fenpropathrin	0.25	U	ng/L
Gamma-BHC	0.12	U	ng/L
Gamma-BHC	0.12	U	ng/L
Gamma-Chlordane	0.20	U	ng/L
Gamma-Chlordane	0.20	U	ng/L
Heptachlor	0.20	U	ng/L
Heptachlor	0.20	U	ng/L
Heptachlor Epoxide	0.25	U	ng/L
Heptachlor Epoxide	0.25	U	ng/L
Hexachlorobenzene	1.0	U	ng/L
Hexachlorobenzene	1.0	U	ng/L
Kepone	5.0	U	ng/L
Kepone	5.0	U	ng/L
Lambda-Cyhalothrin	0.75	U	ng/L
Lambda-Cyhalothrin	0.75	U	ng/L
Methoprene	0.75	U	ng/L
Methoprene	0.75	U	ng/L
Methoxychlor	0.30	U	ng/L
Methoxychlor	0.30	U	ng/L
MGK-264	0.20	U	ng/L
MGK-264	0.20	U	ng/L
Mirex	0.70	U	ng/L
Mirex	0.70	U	ng/L
Oxychlordane	0.30	U	ng/L
Oxychlordane	0.30	U	ng/L
Permethrin	1.6	U	ng/L
Permethrin	1.6	U	ng/L
Phenothrin	0.90	U	ng/L
Phenothrin	0.90	U	ng/L
Piperonyl Butoxide	0.15	U	ng/L
Piperonyl Butoxide	0.15	U	ng/L
Prallethrin	2.0	U	ng/L
Prallethrin	2.0	U	ng/L
Tau-Fluvalinate	0.25	U	ng/L
Tau-Fluvalinate	0.25	U	ng/L
Tetramethrin	0.75	U	ng/L
Tetramethrin	0.75	U	ng/L
Trans-Nonachlor	0.20	U	ng/L
Trans-Nonachlor	0.20	U	ng/L
Triclosan Methyl	0.15	U	ng/L
Triclosan Methyl	0.15	U	ng/L
Trifluralin	0.20	U	ng/L
Trifluralin	0.20	U	ng/L

Reference Method: EPA 8276

Batch ID: P408157

Component	Result	Code	Units
Chlordane	2.5	U	ng/L

Quality Assurance Report

Method Blank Results

Reference Method: EPA 8276
Batch ID: P408157

Component	Result	Code	Units
Chlordane	2.5	U	ng/L
Toxaphene	15	U	ng/L
Toxaphene	15	U	ng/L

Reference Method: EPA 8321B
Batch ID: P408153

Component	Result	Code	Units
Acesulfame K	0.10	U	ug/L
AMPA	0.10	U	ug/L
Endothall	0.25	U	ug/L
Glufosinate	0.10	U	ug/L
Glyphosate	0.10	U	ug/L
Sucralose	0.010	U	ug/L

Reference Method: EPA 8321B
Batch ID: P408154

Component	Result	Code	Units
2,4-D	0.0020	U	ug/L
2,4,5-T	0.0040	U	ug/L
Acetaminophen	0.0080	U	ug/L
Acetamiprid	0.0020	U	ug/L
Afidopyropen	0.0020	U	ug/L
Bentazon	8.0E-04	U	ug/L
Benzovindiflupyr	0.0020	U	ug/L
Carbamazepine	8.0E-04	U	ug/L
Clothianidin	0.0020	U	ug/L
Dinotefuran	0.0020	U	ug/L
Diuron	0.0020	U	ug/L
Fenuron	0.016	U	ug/L
Fluridone	8.0E-04	U	ug/L
Hydrocodone	0.0020	U	ug/L
Ibuprofen	0.020	U	ug/L
Imazapyr	0.0040	U	ug/L
Imidacloprid	0.0020	U	ug/L
Linuron	0.0040	U	ug/L
Mandestrobin	0.0020	U	ug/L
MCPP	0.0040	U	ug/L
Naproxen	0.0080	U	ug/L
Primidone	0.0040	U	ug/L
Pyraclostrobin	0.0020	U	ug/L
Silvex	0.0040	U	ug/L
Thiamethoxam	0.0020	U	ug/L
Tolfenpyrad	0.0020	U	ug/L
Triclopyr	0.0040	U	ug/L

Quality Assurance Report

Laboratory Control Sample Accuracy

Reference Method: EPA 8270E
Batch ID: P408157

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Aldrin	52.2		P	20 - 83.0
Alpha-BHC	93.7		P	74 - 108
Alpha-Chlordane	80.7		P	53 - 109
Beta-BHC	109		P	64 - 139
Beta-Cyfluthrin	96.3		P	27 - 171
Bifenthrin	64.9		P	20 - 124
Carbophenothion	58.1		P	20 - 94.0
Chlorothalonil	106		P	20 - 182
Cis-Nonachlor	76.9		P	46 - 110
Cypermethrin	103		P	35 - 160
Dacthal	90.7		P	70 - 115
DDD-p,p'	79.1		P	51 - 108
DDE-p,p'	74.8		P	51 - 104
DDT-p,p'	75.8		P	52 - 107
Delta-BHC	111		P	73 - 146
Deltamethrin	92.2		P	20 - 190
Dichlobenil	87.5		P	30 - 100
Dicofol	78.1		P	52 - 110
Dieldrin	82.2		P	57 - 111
Endosulfan I	79.0		P	61 - 106
Endosulfan II	89.2		P	57 - 122
Endosulfan Sulfate	101		P	58 - 122
Endrin	85.5		P	34 - 125
Endrin Aldehyde	90.4		P	40 - 120
Endrin Ketone	91.9		P	51 - 138
Esfenvalerate	92.5		P	20 - 193
Ethalfuralin	74.3		P	51 - 99.0
Fenpropathrin	87.8		P	40 - 116
Gamma-BHC	95.9		P	74 - 116
Gamma-Chlordane	74.7		P	49 - 105
Heptachlor	71.8		P	45 - 98.0
Heptachlor Epoxide	83.6		P	61 - 106
Hexachlorobenzene	74.4		P	41 - 96.0
Kepone	199		F	27 - 179
Lambda-Cyhalothrin	94.3		P	20 - 199
Methoprene	58.2		P	20 - 134
Methoxychlor	96.8		P	61 - 111
MGK-264	84.8		P	20 - 124
Mirex	59.4		P	20 - 199
Oxychlordane	87.1		P	39 - 112
Permethrin	95.7		P	31 - 155
Phenothrin	59.2		P	20 - 100
Piperonyl Butoxide	108		P	20 - 144
Prallethrin	76.4		P	20 - 103
Tau-Fluvalinate	79.4		P	24 - 133
Tetramethrin	85.6		P	20 - 116
Trans-Nonachlor	72.0		P	49 - 105
Triclosan Methyl	81.7		P	60 - 111
Trifluralin	73.0		P	53 - 97.0

Quality Assurance Report Laboratory Control Sample Accuracy

Reference Method: EPA 8276
Batch ID: P408157

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Chlordane	77.5		P	56 - 117
Toxaphene	64.6		P	45 - 116

Reference Method: EPA 8321B
Batch ID: P408153

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Acesulfame K	95.5		P	40 - 150
AMPA	99.8		P	40 - 160
Endothall	85.4		P	40 - 150
Glufosinate	104		P	40 - 160
Glyphosate	104		P	40 - 160
Sucralose	86.3		P	40 - 150

Reference Method: EPA 8321B
Batch ID: P408154

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2,4-D	88.0		P	40 - 150
2,4,5-T	102		P	40 - 150
Acetaminophen	93.4		P	30 - 150
Acetamiprid	90.0		P	40 - 150
Afidopyropen	70.2		P	40 - 150
Bentazon	104		P	30 - 150
Benzovindiflupyr	82.0		P	40 - 150
Carbamazepine	93.8		P	40 - 150
Clothianidin	84.9		P	40 - 150
Dinotefuran	104		P	40 - 150
Diuron	83.3		P	40 - 150
Fenuron	102		P	40 - 150
Fluridone	91.6		P	40 - 150
Hydrocodone	97.4		P	40 - 150
Ibuprofen	108		P	40 - 150
Imazapyr	88.5		P	40 - 150
Imidacloprid	101		P	40 - 150
Linuron	81.2		P	40 - 150
Mandestrobin	93.2		P	40 - 150
MCPP	96.1		P	40 - 150
Naproxen	74.8		P	40 - 150
Primidone	85.9		P	40 - 150
Pyraclostrobin	81.2		P	40 - 150
Silvex	92.5		P	40 - 150
Thiamethoxam	106		P	40 - 150
Tolfenpyrad	58.2		P	30 - 150
Triclopyr	108		P	40 - 150

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 8270E
Batch ID: P408157

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2297416	Aldrin	53.9	44.1	P/P	10 - 94.0
2297416	Alpha-BHC	87.9	79.8	P/P	71 - 108
2297416	Alpha-Chlordane	66.3	65.7	P/P	42 - 115
2297416	Beta-BHC	118	95.2	P/P	56 - 161
2297416	Beta-Cyfluthrin	98.6	88.1	P/P	46 - 190
2297416	Bifenthrin	58.7	48.8	P/P	19 - 126
2297416	Carbophenothion	53.8	46.2	P/P	18 - 108
2297416	Chlorothalonil	182	111	P/P	10 - 262
2297416	Cis-Nonachlor	69.6	65.3	P/P	44 - 112
2297416	Cypermethrin	78.0	82.8	P/P	40 - 178
2297416	Dacthal	99.0	86.9	P/P	60 - 119
2297416	DDD-p,p'	74.8	72.2	P/P	40 - 114
2297416	DDE-p,p'	70.0	67.3	P/P	22 - 125
2297416	DDT-p,p'	67.3	62.0	P/P	39 - 110
2297416	Delta-BHC	127	96.6	P/P	64 - 174
2297416	Deltamethrin	101	95.0	P/P	10 - 227
2297416	Dichlobenil	69.6	66.0	P/P	20 - 99.0
2297416	Dicofol	75.5	70.8	P/P	43 - 115
2297416	Dieldrin	70.2	66.7	P/P	31 - 131
2297416	Endosulfan I	77.2	70.5	P/P	52 - 110
2297416	Endosulfan II	83.5	72.7	P/P	53 - 127
2297416	Endosulfan Sulfate	80.9	69.7	P/P	44 - 135
2297416	Endrin	68.4	62.6	P/P	36 - 122
2297416	Endrin Aldehyde	63.7	58.5	P/P	23 - 115
2297416	Endrin Ketone	87.7	78.5	P/P	46 - 147
2297416	Esfenvalerate	89.1	86.9	P/P	25 - 217
2297416	Ethalfuralin	76.1	66.7	P/P	46 - 99.0
2297416	Fenpropathrin	67.4	62.0	P/P	42 - 121
2297416	Gamma-BHC	98.4	86.2	P/P	63 - 131
2297416	Gamma-Chlordane	72.2	68.0	P/P	40 - 108
2297416	Heptachlor	58.5	51.7	P/P	38 - 98.0
2297416	Heptachlor Epoxide	71.2	69.8	P/P	39 - 124
2297416	Hexachlorobenzene	64.4	62.2	P/P	37 - 96.0
2297416	Kepone	151	109	P/P	10 - 216
2297416	Lambda-Cyhalothrin	83.6	85.5	P/P	21 - 220
2297416	Methoprene	64.7	55.1	P/P	19 - 112
2297416	Methoxychlor	88.8	78.3	P/P	56 - 118
2297416	MGK-264	87.3	75.8	P/P	28 - 125
2297416	Mirex	56.2	53.8	P/P	10 - 203
2297416	Oxychlordane	69.7	61.3	P/P	46 - 92.0
2297416	Permethrin	68.4	81.2	P/P	42 - 173
2297416	Phenothrin	52.8	47.3	P/P	10 - 140
2297416	Piperonyl Butoxide	102	96.8	P/P	10 - 158
2297416	Prallethrin	77.4	69.7	P/P	19 - 119
2297416	Tau-Fluvalinate	78.0	72.0	P/P	27 - 164
2297416	Tetramethrin	94.4	67.1	P/P	16 - 130
2297416	Trans-Nonachlor	69.8	67.1	P/P	43 - 105
2297416	Triclosan Methyl	91.0	80.3	P/P	50 - 113
2297416	Trifluralin	77.2	68.2	P/P	48 - 98.0

Quality Assurance Report Matrix Spike Accuracy

Reference Method: EPA 8276
Batch ID: P408157

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2297431	Chlordane	89.0	97.6	P/P	47 - 128
2297431	Toxaphene	67.7	80.9	P/P	11 - 163

Reference Method: EPA 8321B
Batch ID: P408153

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2297068	Acesulfame K	70.8	69.6	P/P	40 - 150
2297068	AMPA	97.9	99.2	P/P	40 - 160
2297068	Endothall	98.3	94.5	P/P	40 - 150
2297068	Glufosinate	106	105	P/P	40 - 160
2297068	Glyphosate	102	104	P/P	40 - 160
2297068	Sucralose	89.8	90.1	P/P	40 - 150

Reference Method: EPA 8321B
Batch ID: P408154

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2297068	2,4-D	79.4	99.7	P/P	40 - 150
2297068	2,4,5-T	91.9	88.9	P/P	40 - 150
2297068	Acetaminophen	91.9	99.2	P/P	30 - 150
2297068	Acetamiprid	88.6	88.4	P/P	40 - 150
2297068	Afidopyropen	75.3	70.0	P/P	40 - 150
2297068	Bentazon	81.0	101	P/P	30 - 150
2297068	Benzovindiflupyr	80.2	85.0	P/P	40 - 150
2297068	Carbamazepine	87.2	96.0	P/P	40 - 150
2297068	Clothianidin	103	105	P/P	40 - 150
2297068	Dinotefuran	103	105	P/P	40 - 150
2297068	Diuron	73.3	81.4	P/P	40 - 150
2297068	Fenuron	98.2	103	P/P	40 - 150
2297068	Fluridone	87.6	87.0	P/P	40 - 150
2297068	Hydrocodone	89.3	94.8	P/P	40 - 150
2297068	Ibuprofen	80.0	81.2	P/P	40 - 150
2297068	Imazapyr	78.1	96.7	P/P	40 - 150
2297068	Imidacloprid	89.3	95.8	P/P	40 - 150
2297068	Linuron	95.0	91.0	P/P	40 - 150
2297068	Mandestrobin	91.0	101	P/P	40 - 150
2297068	MCPP	95.2	99.5	P/P	40 - 150
2297068	Naproxen	92.7	82.5	P/P	40 - 150
2297068	Primidone	116	108	P/P	40 - 150
2297068	Pyraclostrobin	90.3	101	P/P	40 - 150
2297068	Silvex	99.0	101	P/P	40 - 150
2297068	Thiamethoxam	103	108	P/P	40 - 150
2297068	Tolfenpyrad	46.9	68.0	P/P	30 - 150
2297068	Triclopyr	91.5	101	P/P	40 - 150

Quality Assurance Report Precision

Reference Method: EPA 8270E
Batch ID: P408157

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2297416	Aldrin	20.0	Spike	P	0 - 37
2297416	Alpha-BHC	9.70	Spike	P	0 - 16
2297416	Alpha-Chlordane	0.973	Spike	P	0 - 28
2297416	Beta-BHC	21.8	Spike	P	0 - 32
2297416	Beta-Cyfluthrin	11.3	Spike	P	0 - 41
2297416	Bifenthrin	18.3	Spike	P	0 - 36
2297416	Carbophenothion	15.4	Spike	P	0 - 30
2297416	Chlorothalonil	48.5	Spike	P	0 - 54
2297416	Cis-Nonachlor	6.38	Spike	P	0 - 33
2297416	Cypermethrin	5.98	Spike	P	0 - 38
2297416	Dacthal	13.1	Spike	P	0 - 23
2297416	DDD-p,p'	3.62	Spike	P	0 - 35
2297416	DDE-p,p'	3.91	Spike	P	0 - 27
2297416	DDT-p,p'	8.13	Spike	P	0 - 31
2297416	Delta-BHC	27.5	Spike	P	0 - 30
2297416	Deltamethrin	6.13	Spike	P	0 - 76
2297416	Dichlobenil	5.26	Spike	P	0 - 33
2297416	Dicofol	6.47	Spike	P	0 - 24
2297416	Dieldrin	5.13	Spike	P	0 - 35
2297416	Endosulfan I	9.12	Spike	P	0 - 25
2297416	Endosulfan II	13.9	Spike	P	0 - 31
2297416	Endosulfan Sulfate	14.8	Spike	P	0 - 38
2297416	Endrin	8.79	Spike	P	0 - 53
2297416	Endrin Aldehyde	8.45	Spike	P	0 - 81
2297416	Endrin Ketone	11.1	Spike	P	0 - 33
2297416	Esfenvalerate	2.52	Spike	P	0 - 46
2297416	Ethalfuralin	13.2	Spike	P	0 - 22
2297416	Fenpropathrin	8.37	Spike	P	0 - 29
2297416	Gamma-BHC	13.2	Spike	P	0 - 17
2297416	Gamma-Chlordane	6.03	Spike	P	0 - 28
2297416	Heptachlor	12.3	Spike	P	0 - 28
2297416	Heptachlor Epoxide	1.99	Spike	P	0 - 23
2297416	Hexachlorobenzene	3.52	Spike	P	0 - 22
2297416	Kepone	32.1	Spike	P	0 - 61
2297416	Lambda-Cyhalothrin	2.18	Spike	P	0 - 52
2297416	Methoprene	15.9	Spike	P	0 - 38
2297416	Methoxychlor	12.5	Spike	P	0 - 29
2297416	MGK-264	14.2	Spike	P	0 - 41
2297416	Mirex	4.27	Spike	P	0 - 39
2297416	Oxychlordane	12.7	Spike	P	0 - 33
2297416	Permethrin	17.2	Spike	P	0 - 39
2297416	Phenothrin	11.1	Spike	P	0 - 52
2297416	Piperonyl Butoxide	5.66	Spike	P	0 - 91
2297416	Prallethrin	10.4	Spike	P	0 - 34
2297416	Tau-Fluvalinate	8.00	Spike	P	0 - 41
2297416	Tetramethrin	33.7	Spike	P	0 - 43
2297416	Trans-Nonachlor	3.93	Spike	P	0 - 31
2297416	Triclosan Methyl	12.5	Spike	P	0 - 24
2297416	Trifluralin	12.4	Spike	P	0 - 23

Quality Assurance Report Precision

Reference Method: EPA 8276
Batch ID: P408157

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2297431	Chlordane	9.23	Spike	P	0 - 30
2297431	Toxaphene	17.7	Spike	P	0 - 30

Reference Method: EPA 8321B
Batch ID: P408153

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2297068	Acesulfame K	1.73	Spike	P	0 - 30
2297068	AMPA	1.36	Spike	P	0 - 30
2297068	Endothall	3.97	Spike	P	0 - 30
2297068	Glufosinate	1.28	Spike	P	0 - 30
2297068	Glyphosate	1.36	Spike	P	0 - 30
2297068	Sucralose	0.297	Spike	P	0 - 30

Reference Method: EPA 8321B
Batch ID: P408154

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2297068	2,4-D	22.7	Spike	P	0 - 30
2297068	2,4,5-T	3.35	Spike	P	0 - 30
2297068	Acetaminophen	7.61	Spike	P	0 - 30
2297068	Acetamiprid	0.168	Spike	P	0 - 30
2297068	Afidopyropen	7.22	Spike	P	0 - 30
2297068	Bentazon	21.7	Spike	P	0 - 30
2297068	Benzovindiflupyr	5.71	Spike	P	0 - 30
2297068	Carbamazepine	9.58	Spike	P	0 - 30
2297068	Clothianidin	2.11	Spike	P	0 - 30
2297068	Dinotefuran	1.82	Spike	P	0 - 30
2297068	Diuron	10.4	Spike	P	0 - 30
2297068	Fenuron	4.57	Spike	P	0 - 30
2297068	Fluridone	0.713	Spike	P	0 - 30
2297068	Hydrocodone	5.99	Spike	P	0 - 30
2297068	Ibuprofen	1.47	Spike	P	0 - 30
2297068	Imazapyr	21.3	Spike	P	0 - 30
2297068	Imidacloprid	6.99	Spike	P	0 - 30
2297068	Linuron	4.26	Spike	P	0 - 30
2297068	Mandestrobin	10.6	Spike	P	0 - 30
2297068	MCPP	4.45	Spike	P	0 - 30
2297068	Naproxen	11.6	Spike	P	0 - 30
2297068	Primidone	7.49	Spike	P	0 - 30
2297068	Pyraclostrobin	11.3	Spike	P	0 - 30
2297068	Silvex	2.44	Spike	P	0 - 30
2297068	Thiamethoxam	4.71	Spike	P	0 - 30
2297068	Tolfenpyrad	36.8	Spike	F	0 - 30
2297068	Triclopyr	10.1	Spike	P	0 - 30

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

Quality Assurance Report Surrogates

Lab Sample ID: 2297980
Field Sample ID: G2CE0071

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8270E	Decachlorobiphenyl	88.8	P	29 - 123
EPA 8270E	Tetrachloro-m-xylene	55.8	P	24 - 97.0
EPA 8276	Decachlorobiphenyl	59.6	P	29 - 92.0
EPA 8276	PCNB	70.8	P	43 - 134

Lab Sample ID: 2297981
Field Sample ID: G2CE0161

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8270E	Decachlorobiphenyl	74.2	P	29 - 123
EPA 8270E	Tetrachloro-m-xylene	48.0	P	24 - 97.0
EPA 8276	Decachlorobiphenyl	57.6	P	29 - 92.0
EPA 8276	PCNB	72.3	P	43 - 134

Lab Sample ID: 2297982
Field Sample ID: G2CE0241

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8321B	2,4-D-d3	97.7	P	30 - 160
EPA 8321B	Acetaminophen-d4	123	P	30 - 160
EPA 8321B	Carbamazepine-d10	107	P	30 - 160
EPA 8321B	Diuron-d6	77.0	P	30 - 160
EPA 8321B	Endothall-d6	120	P	30 - 160
EPA 8321B	Glyphosate 13C 15N	95.7	P	30 - 160
EPA 8321B	Ibuprofen-d3	94.2	P	30 - 160
EPA 8321B	Primidone-d5	102	P	30 - 160
EPA 8321B	Sucralose-d6	112	P	30 - 160

Lab Sample ID: 2297983
Field Sample ID: G2CE0071

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8321B	2,4-D-d3	108	P	30 - 160
EPA 8321B	Acetaminophen-d4	112	P	30 - 160
EPA 8321B	Carbamazepine-d10	98.7	P	30 - 160
EPA 8321B	Diuron-d6	72.3	P	30 - 160
EPA 8321B	Endothall-d6	118	P	30 - 160
EPA 8321B	Glyphosate 13C 15N	98.0	P	30 - 160
EPA 8321B	Ibuprofen-d3	69.3	P	30 - 160
EPA 8321B	Primidone-d5	89.1	P	30 - 160
EPA 8321B	Sucralose-d6	112	P	30 - 160

Quality Assurance Report Calibration Verification

Reference Method: EPA 8321B

Run ID: A109742

Included Lab Sample IDs: 2297982, 2297983

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
AMPA	105	100	P/P	60 - 160
Glufosinate	108	105	P/P	60 - 160
Glyphosate	107	97.8	P/P	60 - 160

Reference Method: EPA 8321B

Run ID: A109772

Included Lab Sample IDs: 2297982, 2297983

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
2,4-D	88.7	98.5	P/P	50 - 150
2,4,5-T	101	84.5	P/P	50 - 150
Acetaminophen	88.7	104	P/P	60 - 160
Acetamiprid	94.8	109	P/P	50 - 150
Afidopyropen	127	101	P/P	50 - 150
Bentazon	106	115	P/P	50 - 160
Benzovindiflupyr	90.3	85.2	P/P	50 - 150
Carbamazepine	109	105	P/P	60 - 150
Clothianidin	108	114	P/P	60 - 150
Dinotefuran	109	108	P/P	50 - 150
Diuron	109	98.2	P/P	60 - 160
Fenuron	100	99.7	P/P	60 - 150
Fluridone	100	98.0	P/P	60 - 160
Hydrocodone	106	100	P/P	60 - 150
Ibuprofen	86.8	65.1	P/P	50 - 160
Imazapyr	95.5	93.6	P/P	50 - 150
Imidacloprid	104	96.8	P/P	60 - 150
Linuron	96.9	122	P/P	60 - 150
Mandestrobin	114	109	P/P	50 - 150
MCPP	93.8	101	P/P	50 - 150
Naproxen	140	86.0	P/P	50 - 160
Primidone	68.6	76.8	P/P	60 - 150
Pyraclostrobin	117	118	P/P	60 - 150
Silvex	93.5	120	P/P	50 - 150
Thiamethoxam	108	109	P/P	50 - 150
Tolfenpyrad	134	89.1	P/P	60 - 150
Triclopyr	113	87.2	P/P	50 - 150

Reference Method: EPA 8321B

Run ID: A109773

Included Lab Sample IDs: 2297982, 2297983

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Acesulfame K	104	106	P/P	60 - 160
Endothall	95.4	98.5	P/P	60 - 160
Sucralose	88.6	89.8	P/P	60 - 160

Reference Method: EPA 8270E

Run ID: A109793

Included Lab Sample IDs: 2297980, 2297981

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

Reference Method: EPA 8270E

Run ID: A109793

Included Lab Sample IDs: 2297980, 2297981

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Aldrin	92.4		P	80 - 120
Alpha-BHC	95.3		P	80 - 120
Alpha-Chlordane	95.3		P	80 - 120
Beta-BHC	97.8		P	80 - 120
Beta-Cyfluthrin	89.9		P	80 - 120
Bifenthrin	96.5		P	80 - 120
Carbophenothion	88.7		P	80 - 120
Chlorothalonil	98.4		P	80 - 120
Cis-Nonachlor	90.9		P	80 - 120
Cypermethrin	90.3		P	80 - 120
Dacthal	93.1		P	80 - 120
DDD-p,p'	90.9		P	80 - 120
DDE-p,p'	94.8		P	80 - 120
DDT-p,p'	92.2		P	80 - 120
Delta-BHC	95.5		P	80 - 120
Deltamethrin	90.7		P	80 - 120
Dichlobenil	97.3		P	80 - 120
Dicofol	102		P	80 - 120
Dieldrin	91.3		P	80 - 120
Endosulfan I	95.7		P	80 - 120
Endosulfan II	90.7		P	80 - 120
Endosulfan Sulfate	84.6		P	80 - 120
Endrin	89.1		P	80 - 120
Endrin Aldehyde	90.2		P	80 - 120
Endrin Ketone	92.1		P	80 - 120
Esfenvalerate	94.7		P	80 - 120
Ethalfuralin	95.9		P	80 - 120
Fenpropathrin	92.6		P	80 - 120
Gamma-BHC	95.9		P	80 - 120
Gamma-Chlordane	101		P	80 - 120
Heptachlor	88.6		P	80 - 120
Heptachlor Epoxide	93.0		P	80 - 120
Hexachlorobenzene	95.0		P	80 - 120
Kepone	70.1*		F	80 - 120
Lambda-Cyhalothrin	95.3		P	80 - 120
Methoprene	88.9		P	80 - 120
Methoxychlor	105		P	80 - 120
MGK-264	87.2		P	80 - 120
Mirex	90.1		P	80 - 120
Oxychlordane	82.7		P	80 - 120
Permethrin	90.5		P	80 - 120
Phenothrin	94.9		P	80 - 120
Piperonyl Butoxide	84.8		P	80 - 120
Prallethrin	82.5		P	80 - 120
Tau-Fluvalinate	95.0		P	80 - 120
Tetramethrin	91.2		P	80 - 120
Trans-Nonachlor	97.4		P	80 - 120
Triclosan Methyl	96.2		P	80 - 120
Trifluralin	99.4		P	80 - 120

Quality Assurance Report Calibration Verification

Reference Method: EPA 8276

Run ID: A109821

Included Lab Sample IDs: 2297980, 2297981

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Chlordane	94.0		P	80 - 120
Toxaphene	98.8		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 8270E	Aldrin	52.2	53.9	44.1		20.0
	Alpha-BHC	93.7	87.9	79.8		9.70
	Alpha-Chlordane	80.7	66.3	65.7		0.973
	Beta-BHC	109	118	95.2		21.8
	Beta-Cyfluthrin	96.3	98.6	88.1		11.3
	Bifenthrin	64.9	58.7	48.8		18.3
	Carbophenothion	58.1	53.8	46.2		15.4
	Chlorothalonil	106	182	111		48.5
	Cis-Nonachlor	76.9	69.6	65.3		6.38
	Cypermethrin	103	78.0	82.8		5.98
	Dacthal	90.7	99.0	86.9		13.1
	DDD-p,p'	79.1	74.8	72.2		3.62
	DDE-p,p'	74.8	70.0	67.3		3.91
	DDT-p,p'	75.8	67.3	62.0		8.13
	Delta-BHC	111	127	96.6		27.5
	Deltamethrin	92.2	101	95.0		6.13
	Dichlobenil	87.5	69.6	66.0		5.26
	Dicofol	78.1	75.5	70.8		6.47
	Dieldrin	82.2	70.2	66.7		5.13
	Endosulfan I	79.0	77.2	70.5		9.12
	Endosulfan II	89.2	83.5	72.7		13.9
	Endosulfan Sulfate	101	80.9	69.7		14.8
	Endrin	85.5	68.4	62.6		8.79
	Endrin Aldehyde	90.4	63.7	58.5		8.45
	Endrin Ketone	91.9	87.7	78.5		11.1
	Esfenvalerate	92.5	89.1	86.9		2.52
	Ethalfuralin	74.3	76.1	66.7		13.2
	Fenpropathrin	87.8	67.4	62.0		8.37
	Gamma-BHC	95.9	98.4	86.2		13.2
	Gamma-Chlordane	74.7	72.2	68.0		6.03
	Heptachlor	71.8	58.5	51.7		12.3
	Heptachlor Epoxide	83.6	71.2	69.8		1.99
	Hexachlorobenzene	74.4	64.4	62.2		3.52
	Kepone	199	151	109		32.1
	Lambda-Cyhalothrin	94.3	83.6	85.5		2.18
	Methoprene	58.2	64.7	55.1		15.9
	Methoxychlor	96.8	88.8	78.3		12.5
	MGK-264	84.8	87.3	75.8		14.2
	Mirex	59.4	56.2	53.8		4.27
	Oxychlordane	87.1	69.7	61.3		12.7
	Permethrin	95.7	68.4	81.2		17.2
	Phenothrin	59.2	52.8	47.3		11.1
	Piperonyl Butoxide	108	102	96.8		5.66
	Prallethrin	76.4	77.4	69.7		10.4
	Tau-Fluvalinate	79.4	78.0	72.0		8.00
	Tetramethrin	85.6	94.4	67.1		33.7
	Trans-Nonachlor	72.0	69.8	67.1		3.93
	Triclosan Methyl	81.7	91.0	80.3		12.5
	Trifluralin	73.0	77.2	68.2		12.4
EPA 8276	Chlordane	77.5	89.0	97.6		9.23
	Toxaphene	64.6	67.7	80.9		17.7
EPA 8321B	2,4-D	88.0	79.4	99.7		22.7
	2,4,5-T	102	91.9	88.9		3.35
	Acesulfame K	95.5	70.8	69.6		1.73

Quality Assurance Report Summary

Ref. Method	Analyte	LCS % Recovery	MS % Recovery		Precision SMP	MS
			LCS			
EPA 8321B	Acetaminophen	93.4	91.9	99.2		7.61
	Acetamiprid	90.0	88.6	88.4		0.168
	Afidopyropen	70.2	75.3	70.0		7.22
	AMPA	99.8	97.9	99.2		1.36
	Bentazon	104	81.0	101		21.7
	Benzovindiflupyr	82.0	80.2	85.0		5.71
	Carbamazepine	93.8	87.2	96.0		9.58
	Clothianidin	84.9	103	105		2.11
	Dinotefuran	104	103	105		1.82
	Diuron	83.3	73.3	81.4		10.4
	Endothall	85.4	98.3	94.5		3.97
	Fenuron	102	98.2	103		4.57
	Fluridone	91.6	87.6	87.0		0.713
	Glufosinate	104	106	105		1.28
	Glyphosate	104	102	104		1.36
	Hydrocodone	97.4	89.3	94.8		5.99
	Ibuprofen	108	80.0	81.2		1.47
	Imazapyr	88.5	78.1	96.7		21.3
	Imidacloprid	101	89.3	95.8		6.99
	Linuron	81.2	95.0	91.0		4.26
	Mandestrobin	93.2	91.0	101		10.6
	MCPP	96.1	95.2	99.5		4.45
	Naproxen	74.8	92.7	82.5		11.6
	Primidone	85.9	116	108		7.49
	Pyraclostrobin	81.2	90.3	101		11.3
	Silvex	92.5	99.0	101		2.44
	Sucralose	86.3	89.8	90.1		0.297
	Thiamethoxam	106	103	108		4.71
	Tolfenpyrad	58.2	46.9	68.0		36.8
	Triclopyr	108	91.5	101		10.1

Reference Method Descriptions

Method	Description	Associated Samples
EPA 8270E	Organochlorine pesticides, pyrethroids and tracers in water matrices by GC/MS/MS	2297980, 2297981
EPA 8276	Organochlorine pesticides in water matrices by GC/MS with Negative Chemical Ionization	2297980, 2297981
EPA 8321B	Pesticides, herbicides, and other chemicals in water matrices by HPLC/MS/MS	2297982, 2297983

Preparation and Analysis Log

Ref. Method	Received Date	Prep Date/Time	Prepared By	Analysis Date/Time	Analyzed By	Associated Samples
EPA 8270E	01/06/2022	01/10/2022 08:00	Fe-Val Siddell	01/11/2022 18:46	Vandana T. Nagar	2297980
	01/06/2022	01/10/2022 08:00	Fe-Val Siddell	01/11/2022 19:15	Vandana T. Nagar	2297981
EPA 8276	01/06/2022	01/10/2022 08:00	Fe-Val Siddell	01/12/2022 11:48	Arthur Maknenko	2297980
	01/06/2022	01/10/2022 08:00	Fe-Val Siddell	01/12/2022 12:44	Arthur Maknenko	2297981
EPA 8321B	01/06/2022	01/07/2022 10:00	Juyoung Kim	01/07/2022 13:48	Juyoung Kim	2297982
	01/06/2022	01/07/2022 10:00	Juyoung Kim	01/07/2022 13:58	Juyoung Kim	2297983
	01/06/2022	01/07/2022 10:00	Juyoung Kim	01/07/2022 15:42	Juyoung Kim	2297982
	01/06/2022	01/07/2022 10:00	Juyoung Kim	01/07/2022 15:57	Juyoung Kim	2297983
	01/06/2022	01/07/2022 13:00	Hoor Shaik	01/08/2022 15:46	Juyoung Kim	2297982
	01/06/2022	01/07/2022 13:00	Hoor Shaik	01/08/2022 16:20	Juyoung Kim	2297983
	01/06/2022	01/07/2022 13:00	Hoor Shaik	01/10/2022 12:09	Juyoung Kim	2297982
	01/06/2022	01/07/2022 13:00	Hoor Shaik	01/10/2022 12:44	Juyoung Kim	2297983