Chemical Analysis Report

SO-DIST-2023-06-30-01

Florida DEP Laboratory
2600 Blair Stone Road
Tallahassee, FL 32399-2400
DOH Accreditation E31780

Event Description: **2023 SMP: SO CO OH NO**
Request ID: **RQ-2023-06-26-57**
Customer: **SO-DIST**
Project ID: **SMP**

Send Reports to:
FL Dept. of Environmental Protection
FLDEP South District Office
2295 Victoria Ave. Suite 314
Fort Myers, FL 33901-3381
Attn: Monica Jaeger

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Certified by: Colin Wright, Program Administrator

Date Certified: 25-JUL-2023 10:50

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: COW SLOUGH **Collection Date/Time: 06/29/2023 11:15**

Field ID: IMKFSHCK Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2421008	EPA 8270E	Aldrin	0.67	U	ng/L	P432133	
		Alpha-BHC	0.10	U	ng/L	P432133	
		Alpha-Chlordane	0.20	U	ng/L	P432133	
		PCB-1016	2.0	U	ng/L	P432133	
		Beta-BHC	0.55		ng/L	P432133	
		PCB-1221	2.0	U	ng/L	P432133	
		Beta-Cyfluthrin	1.3	U	ng/L	P432133	
		PCB-1232	2.0	U	ng/L	P432133	
		Bifenthrin	0.51	U	ng/L	P432133	
		PCB-1242	2.0	U	ng/L	P432133	
		PCB-1248	2.0	U	ng/L	P432133	
		Chlorothalonil	3.7	U	ng/L	P432133	
		PCB-1254	2.0	U	ng/L	P432133	
		Cis-Nonachlor	0.20	U	ng/L	P432133	
		PCB-1260	2.0	U	ng/L	P432133	
		Cypermethrin	1.5	U	ng/L	P432133	
		Dacthal	0.15	U	ng/L	P432133	
		DDD-p,p'	0.26	U	ng/L	P432133	
		DDE-p,p'	0.20	U	ng/L	P432133	
		DDT-p,p'	0.82	U	ng/L	P432133	
		Delta-BHC	0.41	U	ng/L	P432133	
		Deltamethrin	1.3	U	ng/L	P432133	
		Dichlobenil	0.26	U	ng/L	P432133	
		Dicofol	1.3	U	ng/L	P432133	
		Dieldrin	0.41	U	ng/L	P432133	
		Endosulfan I	0.41	U	ng/L	P432133	
		Endosulfan II	0.92	U	ng/L	P432133	
		Endosulfan Sulfate	0.31	U	ng/L	P432133	
		Endrin	0.92	U	ng/L	P432133	
		Endrin Aldehyde	0.77	U	ng/L	P432133	
		Endrin Ketone	0.41	U	ng/L	P432133	
		Esfenvalerate	0.77	U	ng/L	P432133	
		Ethalfluralin	0.15	U	ng/L	P432133	
		Fenpropathrin	0.26	U	ng/L	P432133	
		Gamma-BHC	0.38	I	ng/L	P432133	
		Gamma-Chlordane	0.20	U	ng/L	P432133	
		Heptachlor	0.20	U	ng/L	P432133	
		Heptachlor Epoxide	0.26	U	ng/L	P432133	
		Hexachlorobenzene**	1.0	U	ng/L	P432133	
		Kepone	14	UJ	ng/L	P432133	CCV
		Lambda-Cyhalothrin	0.77	U	ng/L	P432133	
		Methoprene	0.77	U	ng/L	P432133	
		Methoxychlor	0.31	U	ng/L	P432133	
		MGK-264	0.20	U	ng/L	P432133	

Field ID: IMKFSHCK Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2421008	EPA 8270E	Mirex	0.36	U	ng/L	P432133	
		Oxychlordane	0.31	U	ng/L	P432133	
		Permethrin	1.6	U	ng/L	P432133	
		Phenothrin	0.92	U	ng/L	P432133	
		Piperonyl Butoxide	0.62	I	ng/L	P432133	
		Prallethrin	2.0	U	ng/L	P432133	
		Tau-Fluvalinate	0.26	U	ng/L	P432133	
		Tetramethrin	0.77	U	ng/L	P432133	
		Trans-Nonachlor	0.20	U	ng/L	P432133	
		Triclosan Methyl	0.15	U	ng/L	P432133	
		Trifluralin	0.20	U	ng/L	P432133	
	EPA 8276	Chlordane	2.0	UJ	ng/L	P432133	LCS, SUR
		Toxaphene	15	UJ	ng/L	P432133	MS, SUR
2421023	EPA 8321B	2,4-D	0.0039	I	ug/L	P431980	
		Acesulfame K	0.10	U	ug/L	P431924	
		2,4,5-T	0.0040	U	ug/L	P431980	
		AMPA	0.50		ug/L	P431924	
		Acetaminophen	0.0080	U	ug/L	P431980	
		Acetamiprid	0.0020	U	ug/L	P431980	
		Endothall	0.25	U	ug/L	P431924	
		Glufosinate	0.10	U	ug/L	P431924	
		Glyphosate	0.80		ug/L	P431924	
		Afidopyropen	0.0020	U	ug/L	P431980	
		Bentazon	8.0E-04	U	ug/L	P431980	
		Sucralose	0.030	I	ug/L	P431924	
		Benzovindiflupyr	0.0020	U	ug/L	P431980	
		Carbamazepine	8.0E-04	U	ug/L	P431980	
		Clothianidin	0.0023	I	ug/L	P431980	
		Dinotefuran	0.0020	U	ug/L	P431980	
		Diuron	0.0020	U	ug/L	P431980	MS
		Fenuron	0.032	U	ug/L	P431980	
		Fluridone	8.0E-04	U	ug/L	P431980	
		Imazapyr	0.0079	I	ug/L	P431980	
		Hydrocodone	0.0020	U	ug/L	P431980	
		Ibuprofen	0.080	U	ug/L	P431980	
		Imidacloprid	0.016		ug/L	P431980	
		Linuron	0.0040	U	ug/L	P431980	
		Mandestrobin	0.0020	U	ug/L	P431980	
		MCPP	0.0020	U	ug/L	P431980	
		Naproxen	0.12		ug/L	P431980	
		Primidone	0.0040	U	ug/L	P431980	
		Pyraclostrobin	0.0020	U	ug/L	P431980	
		Silvex	0.0040	U	ug/L	P431980	
		Thiamethoxam	0.0020	U	ug/L	P431980	
		Tolfenpyrad	0.0020	U	ug/L	P431980	

Field ID: IMKFSHCK Matrix: W-SURF-FRH

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2421023	EPA 8321B	Triclopyr	0.0040	U	ug/L	P431980	

Ref. Method and Comment:
EPA 8270E: Refer to the Lab Analysis Report for an explanation of QC Codes.
EPA 8276: Surrogate failures were observed in both original extraction and re-extraction. Analytical results were confirmed. Refer to the Lab Analysis Report for an explanation of QC Codes.
EPA 8321B: MS accuracy for some analytes could not be assessed due to high concentration of parameter in the spiked sample.

Sample Location: TAMTOM **Collection Date/Time: 06/29/2023 12:40**

Field ID: G1SD0091 Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2421007	EPA 8270E	Aldrin	0.66	U	ng/L	P432133	
		Alpha-BHC	0.10	U	ng/L	P432133	
		Alpha-Chlordane	0.20	U	ng/L	P432133	
		PCB-1016	2.0	U	ng/L	P432133	
		Beta-BHC	0.19	I	ng/L	P432133	
		PCB-1221	2.0	U	ng/L	P432133	
		Beta-Cyfluthrin	1.3	U	ng/L	P432133	
		PCB-1232	2.0	U	ng/L	P432133	
		Bifenthrin	0.51	U	ng/L	P432133	
		PCB-1242	2.0	U	ng/L	P432133	
		PCB-1248	2.0	U	ng/L	P432133	
		Chlorothalonil	3.7	U	ng/L	P432133	
		PCB-1254	2.0	U	ng/L	P432133	
		Cis-Nonachlor	0.20	U	ng/L	P432133	
		PCB-1260	2.0	U	ng/L	P432133	
		Cypermethrin	1.5	U	ng/L	P432133	
		Dacthal	0.15	U	ng/L	P432133	
		DDD-p,p'	0.28	I	ng/L	P432133	
		DDE-p,p'	0.20	U	ng/L	P432133	
		DDT-p,p'	1.3	I	ng/L	P432133	
		Delta-BHC	0.41	U	ng/L	P432133	
		Deltamethrin	1.3	U	ng/L	P432133	
		Dichlobenil	0.26	U	ng/L	P432133	
		Dicofol	1.3	U	ng/L	P432133	
		Dieldrin	0.41	U	ng/L	P432133	
		Endosulfan I	0.41	U	ng/L	P432133	
		Endosulfan II	0.92	U	ng/L	P432133	
		Endosulfan Sulfate	0.31	U	ng/L	P432133	
		Endrin	0.92	U	ng/L	P432133	
		Endrin Aldehyde	0.77	U	ng/L	P432133	
		Endrin Ketone	0.41	U	ng/L	P432133	
		Esfenvalerate	0.77	U	ng/L	P432133	
		Ethalfluralin	0.15	U	ng/L	P432133	
		Fenpropathrin	0.26	U	ng/L	P432133	
		Gamma-BHC	0.13	U	ng/L	P432133	
		Gamma-Chlordane	0.21	I	ng/L	P432133	
		Heptachlor	0.20	U	ng/L	P432133	
		Heptachlor Epoxide	0.26	U	ng/L	P432133	
		Hexachlorobenzene**	1.0	U	ng/L	P432133	
		Kepone	14	UJ	ng/L	P432133	CCV
		Lambda-Cyhalothrin	0.77	U	ng/L	P432133	
		Methoprene	0.77	U	ng/L	P432133	
		Methoxychlor	0.31	U	ng/L	P432133	
		MGK-264	0.20	U	ng/L	P432133	

Field ID: G1SD0091 Matrix: W-SURF-SLT

Sample ID	Ref. Method	Component	Result	Code	Units	Batch ID	QC Codes
2421007	EPA 8270E	Mirex	0.36	U	ng/L	P432133	
		Oxychlordane	0.31	U	ng/L	P432133	
		Permethrin	1.6	U	ng/L	P432133	
		Phenothrin	0.92	U	ng/L	P432133	
		Piperonyl Butoxide	4.1		ng/L	P432133	
		Prallethrin	2.0	U	ng/L	P432133	
		Tau-Fluvalinate	0.26	U	ng/L	P432133	
		Tetramethrin	0.77	U	ng/L	P432133	
		Trans-Nonachlor	0.20	U	ng/L	P432133	
		Triclosan Methyl	0.15	U	ng/L	P432133	
		Trifluralin	0.20	U	ng/L	P432133	
	EPA 8276	Chlordane	2.0	UJ	ng/L	P432133	LCS
		Toxaphene	15	U	ng/L	P432133	MS

Ref. Method and Comment:
EPA 8270E: Refer to the Lab Analysis Report for an explanation of QC Codes.
EPA 8276: Refer to the Lab Analysis Report for an explanation of QC Codes.

Quality Assurance Report
Method Blank Results

Reference Method: EPA 8270E
Batch ID: P432133

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
Chlorothalonil	3.6	U	ng/L
Chlorothalonil	3.6	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'	0.80	U	ng/L
DDT-p,p'	0.80	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	0.90	U	ng/L
Endosulfan II	0.90	U	ng/L
Endosulfan Sulfate	0.30	U	ng/L
Endosulfan Sulfate	0.30	U	ng/L
Endrin	0.90	U	ng/L
Endrin	0.90	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
Ethalfluralin	0.15	U	ng/L
Ethalfluralin	0.15	U	ng/L

Quality Assurance Report
Method Blank Results

Reference Method: EPA 8270E
Batch ID: P432133

Component	Result	Code	Units
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	14	U	ng/L
Kepone	14	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	0.35	U	ng/L
Mirex	0.35	U	ng/L
Oxychlordane	0.30	U	ng/L
Oxychlordane	0.30	U	ng/L
PCB-1016	2.0	U	ng/L
PCB-1016	2.0	U	ng/L
PCB-1221	2.0	U	ng/L
PCB-1221	2.0	U	ng/L
PCB-1232	2.0	U	ng/L
PCB-1232	2.0	U	ng/L
PCB-1242	2.0	U	ng/L
PCB-1242	2.0	U	ng/L
PCB-1248	2.0	U	ng/L
PCB-1248	2.0	U	ng/L
PCB-1254	2.0	U	ng/L
PCB-1254	2.0	U	ng/L
PCB-1260	2.0	U	ng/L
PCB-1260	2.0	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

Quality Assurance Report
Method Blank Results

Reference Method: EPA 8270E
Batch ID: P432133

Component	Result	Code	Units
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: P432133

Component	Result	Code	Units
Chlordane	2.0	U	ng/L
Chlordane	2.0	U	ng/L
Toxaphene	15	U	ng/L
Toxaphene	15	U	ng/L

Reference Method: EPA 8321B
Batch ID: P431924

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: P431980

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	0.032	U	ug/L
Fluridone	8.0E-04	U	ug/L
Hydrocodone	0.0020	U	ug/L
Ibuprofen	0.080	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	0.0020	U	ug/L
Naproxen	0.0080	U	ug/L

Quality Assurance Report
Method Blank Results

Reference Method: EPA 8321B
Batch ID: P431980

Component	Result	Code	Units
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: P432133

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Aldrin	52.0		P	30 - 96.0
Alpha-BHC	81.8		P	70 - 109
Alpha-Chlordane	80.0		P	45 - 107
Beta-BHC	85.7		P	64 - 138
Beta-Cyfluthrin	78.3		P	17 - 141
Bifenthrin	72.1		P	10 - 113
Chlorothalonil	89.1		P	26 - 180
Cis-Nonachlor	76.5		P	37 - 102
Cypermethrin	98.3		P	20 - 133
Dacthal	89.6		P	69 - 114
DDD-p,p'	74.3		P	42 - 105
DDE-p,p'	80.3		P	42 - 106
DDT-p,p'	78.4		P	42 - 107
Delta-BHC	75.4		P	67 - 144
Deltamethrin	120		P	15 - 149
Dichlobenil	74.9		P	46 - 117
Dicofol	79.5		P	34 - 114
Dieldrin	79.7		P	50 - 108
Endosulfan I	86.0		P	55 - 104
Endosulfan II	78.9		P	51 - 111
Endosulfan Sulfate	79.3		P	56 - 121
Endrin	84.1		P	10 - 106
Endrin Aldehyde	84.3		P	34 - 114
Endrin Ketone	92.7		P	63 - 177
Esfenvalerate	107		P	29 - 143
Ethalfluralin	72.1		P	46 - 96.0
Fenpropathrin	78.7		P	28 - 115
Gamma-BHC	86.3		P	65 - 121
Gamma-Chlordane	87.1		P	39 - 103
Heptachlor	78.7		P	39 - 94.0
Heptachlor Epoxide	85.7		P	54 - 104
Hexachlorobenzene	75.9		P	36 - 100
Kepone	39.1		P	10 - 225
Lambda-Cyhalothrin	110		P	10 - 135
Methoprene	70.9		P	10 - 109
Methoxychlor	77.2		P	52 - 112
MGK-264	81.5		P	44 - 117
Mirex	70.1		P	20 - 90.0
Oxychlordane	85.3		P	44 - 102
PCB-1016	67.6		P	45 - 107
PCB-1260	63.6		P	40 - 118
Permethrin	94.0		P	18 - 135
Phenothrin	67.9		P	10 - 102
Piperonyl Butoxide	92.3		P	28 - 156
Prallethrin	76.7		P	28 - 113
Tau-Fluvalinate	106		P	10 - 123
Tetramethrin	82.2		P	18 - 158
Trans-Nonachlor	78.8		P	39 - 104
Triclosan Methyl	83.2		P	54 - 108
Trifluralin	72.1		P	46 - 97.0

Quality Assurance Report
Laboratory Control Sample Accuracy

Reference Method: EPA 8276
Batch ID: P432133

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Chlordane	56.3		F	61 - 116
Toxaphene	58.8		P	48 - 124

Reference Method: EPA 8321B
Batch ID: P431924

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
Acesulfame K	144		P	40 - 150
AMPA	127		P	40 - 150
Endothall	70.2		P	40 - 150
Glufosinate	93.7		P	40 - 150
Glyphosate	110		P	40 - 150
Sucralose	79.1		P	40 - 150

Reference Method: EPA 8321B
Batch ID: P431980

Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2,4-D	103		P	40 - 150
2,4,5-T	96.9		P	40 - 150
Acetaminophen	59.8		P	30 - 150
Acetamiprid	65.8		P	40 - 150
Afidopyropen	46.5		P	30 - 150
Bentazon	107		P	30 - 150
Benzovindiflupyr	74.0		P	40 - 150
Carbamazepine	69.7		P	40 - 150
Clothianidin	84.7		P	40 - 150
Dinotefuran	89.4		P	40 - 150
Diuron	45.2		P	40 - 150
Fenuron	83.0		P	40 - 150
Fluridone	90.3		P	40 - 150
Hydrocodone	85.9		P	40 - 150
Ibuprofen	75.9		P	40 - 150
Imazapyr	79.7		P	40 - 150
Imidacloprid	88.7		P	40 - 150
Linuron	60.3		P	40 - 150
Mandestrobin	85.7		P	40 - 150
MCPP	110		P	40 - 150
Naproxen	77.3		P	40 - 150
Primidone	77.9		P	40 - 150
Pyraclostrobin	67.2		P	40 - 150
Silvex	122		P	40 - 150
Thiamethoxam	84.5		P	40 - 150
Tolfenpyrad	59.0		P	30 - 150
Triclopyr	98.2		P	40 - 150

Quality Assurance Report
Matrix Spike Accuracy

Reference Method: EPA 8270E
Batch ID: P432133

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2420539	Aldrin	48.3	47.8	P/P	24 - 81.0
2420539	Alpha-BHC	81.2	80.5	P/P	65 - 110
2420539	Alpha-Chlordane	77.0	75.4	P/P	43 - 119
2420539	Beta-BHC	79.5	73.6	P/P	54 - 165
2420539	Beta-Cyfluthrin	62.9	60.8	P/P	27 - 165
2420539	Bifenthrin	94.6	94.3	P/P	17 - 117
2420539	Chlorothalonil	129	119	P/P	10 - 255
2420539	Cis-Nonachlor	62.6	58.3	P/P	34 - 98.0
2420539	Cypermethrin	68.4	68.9	P/P	25 - 143
2420539	Dacthal	78.3	87.8	P/P	55 - 139
2420539	DDD-p,p'	64.4	60.0	P/P	30 - 109
2420539	DDE-p,p'	65.0	66.0	P/P	35 - 106
2420539	DDT-p,p'	72.7	73.4	P/P	41 - 101
2420539	Delta-BHC	96.5	86.7	P/P	58 - 165
2420539	Deltamethrin	91.0	89.8	P/P	10 - 194
2420539	Dichlobenil	35.4	36.1	P/P	22 - 114
2420539	Dicofol	82.8	83.4	P/P	17 - 133
2420539	Dieldrin	85.9	80.8	P/P	45 - 129
2420539	Endosulfan I	96.4	91.3	P/P	49 - 104
2420539	Endosulfan II	65.9	72.6	P/P	37 - 117
2420539	Endosulfan Sulfate	61.6	65.6	P/P	38 - 128
2420539	Endrin	67.4	68.5	P/P	35 - 116
2420539	Endrin Aldehyde	45.6	41.3	P/P	19 - 108
2420539	Endrin Ketone	84.5	79.1	P/P	44 - 134
2420539	Esfenvalerate	90.4	90.6	P/P	27 - 176
2420539	Ethalfluralin	70.2	72.8	P/P	49 - 100
2420539	Fenpropathrin	84.9	87.1	P/P	34 - 117
2420539	Gamma-BHC	95.9	89.2	P/P	59 - 129
2420539	Gamma-Chlordane	70.4	76.0	P/P	33 - 107
2420539	Heptachlor	90.1	80.7	P/P	37 - 94.0
2420539	Heptachlor Epoxide	92.0	89.1	P/P	38 - 118
2420539	Hexachlorobenzene	72.7	68.9	P/P	35 - 97.0
2420539	Kepone	24.7	27.0	P/P	10 - 221
2420539	Lambda-Cyhalothrin	121	121	P/P	23 - 190
2420539	Methoprene	69.5	79.4	P/P	21 - 109
2420539	Methoxychlor	77.9	78.5	P/P	46 - 118
2420539	MGK-264	78.0	82.2	P/P	39 - 122
2420539	Mirex	54.0	56.5	P/P	25 - 90.0
2420539	Oxychlordane	92.4	95.5	P/P	42 - 100
2420539	Permethrin	80.1	73.4	P/P	33 - 181
2420539	Phenothrin	71.8	72.9	P/P	12 - 125
2420539	Piperonyl Butoxide	94.4	95.1	P/P	10 - 178
2420539	Prallethrin	66.0	70.4	P/P	24 - 122
2420539	Tau-Fluvalinate	104	107	P/P	13 - 151
2420539	Tetramethrin	85.8	84.5	P/P	16 - 172
2420539	Trans-Nonachlor	78.7	76.4	P/P	39 - 100
2420539	Triclosan Methyl	94.7	82.0	P/P	43 - 110
2420539	Trifluralin	69.4	67.9	P/P	45 - 94.0
2421171	PCB-1016	88.2	79.9	P/P	45 - 107
2421171	PCB-1260	103	83.6	P/P	40 - 112

Quality Assurance Report
Matrix Spike Accuracy

Reference Method: EPA 8276
Batch ID: P432133

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2421171	Chlordane	54.4	59.6	P/P	53 - 126
2421171	Toxaphene	27.3	37.6	F/F	56 - 211

Reference Method: EPA 8321B
Batch ID: P431924

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2420643	Acesulfame K	114	115	P/P	40 - 150
2420643	AMPA	57.2	53.7	P/P	40 - 150
2420643	Endothall	78.9	85.5	P/P	40 - 150
2420643	Glufosinate	69.6	78.5	P/P	40 - 150
2420643	Glyphosate	64.8	56.3	P/P	40 - 150
2420643	Sucralose	64.5	89.2	P/P	40 - 150

Reference Method: EPA 8321B
Batch ID: P431980

Spiked Sample	Component	% Rec.1	% Rec.2	Pass/Fail	Control Limits
2420603	2,4-D	86.7	104	P/P	40 - 150
2420603	2,4,5-T	111	108	P/P	40 - 150
2420603	Acetaminophen	54.3	55.6	P/P	30 - 150
2420603	Acetamiprid	70.8	71.2	P/P	40 - 150
2420603	Afidopyropen	60.5	50.2	P/P	30 - 150
2420603	Benzovindiflupyr	67.6	70.6	P/P	40 - 150
2420603	Carbamazepine	60.0	59.6	P/P	40 - 150
2420603	Clothianidin	80.9	84.8	P/P	40 - 150
2420603	Dinotefuran	75.3	69.7	P/P	40 - 150
2420603	Diuron	26.4	27.7	F/F	40 - 150
2420603	Fenuron	59.6	57.7	P/P	40 - 150
2420603	Fluridone	68.6	65.4	P/P	40 - 150
2420603	Hydrocodone	70.9	67.2	P/P	40 - 150
2420603	Ibuprofen	72.5	67.4	P/P	40 - 150
2420603	Imidacloprid	105	103	P/P	40 - 150
2420603	Linuron	60.2	53.5	P/P	40 - 150
2420603	Mandestrobin	66.8	72.1	P/P	40 - 150
2420603	MCPP	119	124	P/P	40 - 150
2420603	Naproxen	74.9	84.3	P/P	40 - 150
2420603	Primidone	65.4	75.6	P/P	40 - 150
2420603	Pyraclostrobin	62.1	63.2	P/P	40 - 150
2420603	Silvex	96.1	89.2	P/P	40 - 150
2420603	Thiamethoxam	74.1	72.9	P/P	40 - 150
2420603	Tolfenpyrad	47.9	45.6	P/P	30 - 150
2420603	Triclopyr	95.3	107	P/P	40 - 150

Quality Assurance Report
Precision

Reference Method: EPA 8270E
Batch ID: P432133

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2420539	Aldrin	1.12	Spike	P	0 - 41
2420539	Alpha-BHC	0.819	Spike	P	0 - 25
2420539	Alpha-Chlordane	2.11	Spike	P	0 - 32
2420539	Beta-BHC	7.15	Spike	P	0 - 33
2420539	Beta-Cyfluthrin	3.41	Spike	P	0 - 43
2420539	Bifenthrin	0.242	Spike	P	0 - 52
2420539	Chlorothalonil	8.07	Spike	P	0 - 82
2420539	Cis-Nonachlor	7.16	Spike	P	0 - 33
2420539	Cypermethrin	0.763	Spike	P	0 - 51
2420539	Dacthal	11.4	Spike	P	0 - 27
2420539	DDD-p,p'	7.07	Spike	P	0 - 39
2420539	DDE-p,p'	1.62	Spike	P	0 - 31
2420539	DDT-p,p'	0.856	Spike	P	0 - 29
2420539	Delta-BHC	10.6	Spike	P	0 - 35
2420539	Deltamethrin	1.32	Spike	P	0 - 100
2420539	Dichlobenil	1.78	Spike	P	0 - 40
2420539	Dicofol	0.727	Spike	P	0 - 37
2420539	Dieldrin	6.13	Spike	P	0 - 27
2420539	Endosulfan I	5.41	Spike	P	0 - 23
2420539	Endosulfan II	9.69	Spike	P	0 - 34
2420539	Endosulfan Sulfate	6.23	Spike	P	0 - 36
2420539	Endrin	1.65	Spike	P	0 - 45
2420539	Endrin Aldehyde	9.77	Spike	P	0 - 76
2420539	Endrin Ketone	6.56	Spike	P	0 - 43
2420539	Esfenvalerate	0.199	Spike	P	0 - 51
2420539	Ethalfluralin	3.65	Spike	P	0 - 22
2420539	Fenpropathrin	2.54	Spike	P	0 - 49
2420539	Gamma-BHC	7.16	Spike	P	0 - 28
2420539	Gamma-Chlordane	6.84	Spike	P	0 - 40
2420539	Heptachlor	11.0	Spike	P	0 - 29
2420539	Heptachlor Epoxide	3.27	Spike	P	0 - 33
2420539	Hexachlorobenzene	5.36	Spike	P	0 - 36
2420539	Kepone	8.94	Spike	P	0 - 85
2420539	Lambda-Cyhalothrin	0.599	Spike	P	0 - 55
2420539	Methoprene	13.3	Spike	P	0 - 53
2420539	Methoxychlor	0.731	Spike	P	0 - 50
2420539	MGK-264	5.26	Spike	P	0 - 43
2420539	Mirex	4.52	Spike	P	0 - 40
2420539	Oxychlordane	3.22	Spike	P	0 - 31
2420539	Permethrin	8.73	Spike	P	0 - 50
2420539	Phenothrin	1.39	Spike	P	0 - 58
2420539	Piperonyl Butoxide	0.737	Spike	P	0 - 100
2420539	Prallethrin	6.37	Spike	P	0 - 39
2420539	Tau-Fluvalinate	2.27	Spike	P	0 - 54
2420539	Tetramethrin	1.55	Spike	P	0 - 51
2420539	Trans-Nonachlor	3.01	Spike	P	0 - 39
2420539	Triclosan Methyl	14.4	Spike	P	0 - 31
2420539	Trifluralin	2.16	Spike	P	0 - 22
2421171	PCB-1016	9.92	Spike	P	0 - 25
2421171	PCB-1260	21.1	Spike	P	0 - 30

Quality Assurance Report
Precision

Reference Method: EPA 8276
Batch ID: P432133

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2421171	Chlordane	9.18	Spike	P	0 - 25
2421171	Toxaphene	16.0	Spike	P	0 - 26

Reference Method: EPA 8321B
Batch ID: P431924

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2420643	Acesulfame K	0.596	Spike	P	0 - 30
2420643	AMPA	4.19	Spike	P	0 - 30
2420643	Endothall	8.01	Spike	P	0 - 30
2420643	Glufosinate	12.1	Spike	P	0 - 30
2420643	Glyphosate	5.95	Spike	P	0 - 30
2420643	Sucralose	26.1	Spike	P	0 - 30

Reference Method: EPA 8321B
Batch ID: P431980

Replicated Lab Sample	Component	% RSD/RPD	Sample/Spike/LCS*	Pass/Fail	Control Limits
2420603	2,4-D	17.8	Spike	P	0 - 30
2420603	2,4,5-T	2.45	Spike	P	0 - 30
2420603	Acetaminophen	2.29	Spike	P	0 - 30
2420603	Acetamiprid	0.512	Spike	P	0 - 30
2420603	Afidopyropen	18.6	Spike	P	0 - 30
2420603	Bentazon	2.73	Spike	P	0 - 30
2420603	Benzovindiflupyr	4.37	Spike	P	0 - 30
2420603	Carbamazepine	0.610	Spike	P	0 - 30
2420603	Clothianidin	4.70	Spike	P	0 - 30
2420603	Dinotefuran	7.68	Spike	P	0 - 30
2420603	Diuron	3.52	Spike	P	0 - 30
2420603	Fenuron	3.18	Spike	P	0 - 30
2420603	Fluridone	3.81	Spike	P	0 - 30
2420603	Hydrocodone	5.37	Spike	P	0 - 30
2420603	Ibuprofen	7.28	Spike	P	0 - 30
2420603	Imazapyr	6.80	Spike	P	0 - 30
2420603	Imidacloprid	1.98	Spike	P	0 - 30
2420603	Linuron	11.7	Spike	P	0 - 30
2420603	Mandestrobin	7.63	Spike	P	0 - 30
2420603	MCPP	4.55	Spike	P	0 - 30
2420603	Naproxen	11.8	Spike	P	0 - 30
2420603	Primidone	14.5	Spike	P	0 - 30
2420603	Pyraclostrobin	1.78	Spike	P	0 - 30
2420603	Silvex	7.08	Spike	P	0 - 30
2420603	Thiamethoxam	1.61	Spike	P	0 - 30
2420603	Tolfenpyrad	4.75	Spike	P	0 - 30
2420603	Triclopyr	11.8	Spike	P	0 - 30

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

Quality Assurance Report
Surrogates

Lab Sample ID: 2421007
Field Sample ID: G1SD0091

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8270E	Decachlorobiphenyl	59.3	P	37 - 129
EPA 8270E	Decachlorobiphenyl	49.9	P	26 - 115
EPA 8270E	Tetrachloro-m-xylene	51.2	P	30 - 101
EPA 8270E	Tetrachloro-m-xylene	53.7	P	29 - 95.0
EPA 8276	Decachlorobiphenyl	42.7	P	30 - 101
EPA 8276	PCNB	73.2	P	48 - 121

Lab Sample ID: 2421008
Field Sample ID: IMKFSHCK

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8270E	Decachlorobiphenyl	41.4	P	37 - 129
EPA 8270E	Decachlorobiphenyl	30.1	P	26 - 115
EPA 8270E	Tetrachloro-m-xylene	34.7	P	30 - 101
EPA 8270E	Tetrachloro-m-xylene	37.8	P	29 - 95.0
EPA 8276	Decachlorobiphenyl	13.2	F	28 - 102
EPA 8276	Decachlorobiphenyl	23.2	F	30 - 101
EPA 8276	PCNB	93.3	P	49 - 115
EPA 8276	PCNB	64.8	P	48 - 121

Lab Sample ID: 2421023
Field Sample ID: IMKFSHCK

Reference Method	Surrogate	% Rec.	Pass/Fail	Control Limits
EPA 8321B	2,4-D-d3	104	P	30 - 160
EPA 8321B	Acetaminophen-d4	64.3	P	30 - 160
EPA 8321B	Carbamazepine-d10	39.9	P	30 - 160
EPA 8321B	Diuron-d6	60.1	P	30 - 160
EPA 8321B	Endothall-d6	91.0	P	30 - 160
EPA 8321B	Glyphosate 13C 15N	105	P	30 - 160
EPA 8321B	Ibuprofen-d3	59.3	P	30 - 160
EPA 8321B	Primidone-d5	61.2	P	30 - 160
EPA 8321B	Sucralose-d6	79.6	P	30 - 160

Quality Assurance Report
Calibration Verification

Reference Method: EPA 8321B
Run ID: A120150
Included Lab Sample IDs: 2421023

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Acesulfame K	139	148	P/P	60 - 160
Sucralose	89.2	80.7	P/P	60 - 160

Reference Method: EPA 8321B
Run ID: A120153
Included Lab Sample IDs: 2421023

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
AMPA	133	153	P/P	60 - 160
Endothall	72.1	83.7	P/P	60 - 160
Glufosinate	95.4	92.5	P/P	60 - 160
Glyphosate	109	112	P/P	60 - 160

Reference Method: EPA 8321B
Run ID: A120262
Included Lab Sample IDs: 2421023

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
2,4-D	95.2	96.2	P/P	50 - 150
2,4,5-T	103	97.8	P/P	50 - 150
Acetaminophen	81.3	81.2	P/P	60 - 160
Acetamiprid	101	98.6	P/P	50 - 150
Afidopyropen	115	96.3	P/P	50 - 150
Bentazon	126	135	P/P	50 - 160
Benzovindiflupyr	95.5	95.6	P/P	50 - 150
Carbamazepine	105	98.9	P/P	60 - 150
Clothianidin	117	109	P/P	60 - 150
Dinotefuran	113	116	P/P	50 - 150
Diuron	103	108	P/P	60 - 160
Fenuron	101	106	P/P	60 - 150
Fluridone	106	104	P/P	60 - 160
Hydrocodone	110	111	P/P	60 - 150
Ibuprofen	112	125	P/P	50 - 160
Imazapyr	91.8	96.8	P/P	50 - 150
Imidacloprid	110	104	P/P	60 - 150
Linuron	96.5	85.6	P/P	60 - 150
Mandestrobin	106	96.1	P/P	50 - 150
MCPP	103	99.4	P/P	50 - 150
Naproxen	101	116	P/P	50 - 160
Primidone	103	99.5	P/P	60 - 150
Pyraclostrobin	90.7	91.1	P/P	60 - 150
Silvex	98.0	93.6	P/P	50 - 150
Thiamethoxam	101	104	P/P	50 - 150
Tolfenpyrad	92.8	95.5	P/P	60 - 150
Triclopyr	103	91.9	P/P	50 - 150

Reference Method: EPA 8270E
Run ID: A120273
Included Lab Sample IDs: 2421007, 2421008

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits

Quality Assurance Report
Calibration Verification

Reference Method: EPA 8270E
Run ID: A120273
Included Lab Sample IDs: 2421007, 2421008

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Aldrin	101		P	80 - 120
Alpha-BHC	98.9		P	80 - 120
Alpha-Chlordane	103		P	80 - 120
Beta-BHC	96.4		P	80 - 120
Beta-Cyfluthrin	104		P	80 - 120
Bifenthrin	103		P	80 - 120
Chlorothalonil	100		P	80 - 120
Cis-Nonachlor	99.3		P	80 - 120
Cypermethrin	102		P	80 - 120
Dacthal	100		P	80 - 120
DDD-p,p'	105		P	80 - 120
DDE-p,p'	101		P	80 - 120
DDT-p,p'	99.5		P	80 - 120
Delta-BHC	92.9		P	80 - 120
Deltamethrin	103		P	80 - 120
Dichlobenil	99.1		P	80 - 120
Dicofol	97.2		P	80 - 120
Dieldrin	99.1		P	80 - 120
Endosulfan I	99.0		P	80 - 120
Endosulfan II	97.6		P	80 - 120
Endosulfan Sulfate	98.0		P	80 - 120
Endrin	101		P	80 - 120
Endrin Aldehyde	101		P	80 - 120
Endrin Ketone	91.9		P	80 - 120
Esfenvalerate	103		P	80 - 120
Ethalfluralin	99.8		P	80 - 120
Fenpropathrin	102		P	80 - 120
Gamma-BHC	94.7		P	80 - 120
Gamma-Chlordane	102		P	80 - 120
Heptachlor	95.2		P	80 - 120
Heptachlor Epoxide	101		P	80 - 120
Hexachlorobenzene	98.1		P	80 - 120
Kepone	61.4*		F	80 - 120
Lambda-Cyhalothrin	104		P	80 - 120
Methoprene	99.8		P	80 - 120
Methoxychlor	101		P	80 - 120
MGK-264	101		P	80 - 120
Mirex	99.5		P	80 - 120
Oxychlordane	100		P	80 - 120
Permethrin	106		P	80 - 120
Phenothrin	103		P	80 - 120
Piperonyl Butoxide	94.1		P	80 - 120
Prallethrin	98.3		P	80 - 120
Tau-Fluvalinate	103		P	80 - 120
Tetramethrin	100		P	80 - 120
Trans-Nonachlor	104		P	80 - 120
Triclosan Methyl	101		P	80 - 120
Trifluralin	99.9		P	80 - 120

Quality Assurance Report
Calibration Verification

Reference Method: EPA 8276
Run ID: A120289
Included Lab Sample IDs: 2421007, 2421008

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
Chlordane	92.7		P	80 - 120
Toxaphene	88.8		P	80 - 120

Reference Method: EPA 8270E
Run ID: A120372
Included Lab Sample IDs: 2421007

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
PCB-1016	103		P	80 - 120
PCB-1260	105		P	80 - 120

Reference Method: EPA 8270E
Run ID: A120374
Included Lab Sample IDs: 2421008

Component	% Rec.1	% Rec.2	Pass/Fail*	Control Limits
PCB-1016	101		P	80 - 120
PCB-1260	95.3		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		
					LCS	SMP	MS
EPA 8270E	Aldrin	52.0	48.3	47.8			1.12
	Alpha-BHC	81.8	81.2	80.5			0.819
	Alpha-Chlordane	80.0	77.0	75.4			2.11
	Beta-BHC	85.7	79.5	73.6			7.15
	Beta-Cyfluthrin	78.3	62.9	60.8			3.41
	Bifenthrin	72.1	94.6	94.3			0.242
	Chlorothalonil	89.1	129	119			8.07
	Cis-Nonachlor	76.5	62.6	58.3			7.16
	Cypermethrin	98.3	68.4	68.9			0.763
	Dacthal	89.6	78.3	87.8			11.4
	DDD-p,p'	74.3	64.4	60.0			7.07
	DDE-p,p'	80.3	65.0	66.0			1.62
	DDT-p,p'	78.4	72.7	73.4			0.856
	Delta-BHC	75.4	96.5	86.7			10.6
	Deltamethrin	120	91.0	89.8			1.32
	Dichlobenil	74.9	35.4	36.1			1.78
	Dicofol	79.5	82.8	83.4			0.727
	Dieldrin	79.7	85.9	80.8			6.13
	Endosulfan I	86.0	96.4	91.3			5.41
	Endosulfan II	78.9	65.9	72.6			9.69
	Endosulfan Sulfate	79.3	61.6	65.6			6.23
	Endrin	84.1	67.4	68.5			1.65
	Endrin Aldehyde	84.3	45.6	41.3			9.77
	Endrin Ketone	92.7	84.5	79.1			6.56
	Esfenvalerate	107	90.4	90.6			0.199
	Ethalfluralin	72.1	70.2	72.8			3.65
	Fenpropathrin	78.7	84.9	87.1			2.54
	Gamma-BHC	86.3	95.9	89.2			7.16
	Gamma-Chlordane	87.1	70.4	76.0			6.84
	Heptachlor	78.7	90.1	80.7			11.0
	Heptachlor Epoxide	85.7	92.0	89.1			3.27
	Hexachlorobenzene	75.9	72.7	68.9			5.36
	Kepone	39.1	24.7	27.0			8.94
	Lambda-Cyhalothrin	110	121	121			0.599
	Methoprene	70.9	69.5	79.4			13.3
	Methoxychlor	77.2	77.9	78.5			0.731
	MGK-264	81.5	78.0	82.2			5.26
	Mirex	70.1	54.0	56.5			4.52
	Oxychlordane	85.3	92.4	95.5			3.22
	PCB-1016	67.6	88.2	79.9			9.92
	PCB-1260	63.6	103	83.6			21.1
	Permethrin	94.0	80.1	73.4			8.73
	Phenothrin	67.9	71.8	72.9			1.39
	Piperonyl Butoxide	92.3	94.4	95.1			0.737
	Prallethrin	76.7	66.0	70.4			6.37
	Tau-Fluvalinate	106	104	107			2.27
	Tetramethrin	82.2	85.8	84.5			1.55
	Trans-Nonachlor	78.8	78.7	76.4			3.01
	Triclosan Methyl	83.2	94.7	82.0			14.4
	Trifluralin	72.1	69.4	67.9			2.16
EPA 8276	Chlordane	56.3	54.4	59.6			9.18
	Toxaphene	58.8	27.3	37.6			16.0
EPA 8321B	2,4-D	103	86.7	104			17.8
	2,4,5-T	96.9	108	111			2.45

Quality Assurance Report
Summary

Ref. Method	Analyte	LCS % Recovery	MS % Recovery		Precision		
					LCS	SMP	MS
EPA 8321B	Acesulfame K	144	114	115			0.596
	Acetaminophen	59.8	54.3	55.6			2.29
	Acetamiprid	65.8	70.8	71.2			0.512
	Afidopyropen	46.5	60.5	50.2			18.6
	AMPA	127	57.2	53.7			4.19
	Bentazon	107					2.73
	Benzovindiflupyr	74.0	67.6	70.6			4.37
	Carbamazepine	69.7	60.0	59.6			0.610
	Clothianidin	84.7	80.9	84.8			4.70
	Dinotefuran	89.4	75.3	69.7			7.68
	Diuron	45.2	26.4	27.7			3.52
	Endothall	70.2	78.9	85.5			8.01
	Fenuron	83.0	59.6	57.7			3.18
	Fluridone	90.3	68.6	65.4			3.81
	Glufosinate	93.7	69.6	78.5			12.1
	Glyphosate	110	64.8	56.3			5.95
	Hydrocodone	85.9	70.9	67.2			5.37
	Ibuprofen	75.9	67.4	72.5			7.28
	Imazapyr	79.7					6.80
	Imidacloprid	88.7	105	103			1.98
	Linuron	60.3	60.2	53.5			11.7
	Mandestrobin	85.7	66.8	72.1			7.63
	MCPP	110	119	124			4.55
	Naproxen	77.3	84.3	74.9			11.8
	Primidone	77.9	65.4	75.6			14.5
	Pyraclostrobin	67.2	62.1	63.2			1.78
	Silvex	122	89.2	96.1			7.08
	Sucralose	79.1	64.5	89.2			26.1
	Thiamethoxam	84.5	74.1	72.9			1.61
	Tolfenpyrad	59.0	47.9	45.6			4.75
	Triclopyr	98.2	95.3	107			11.8

Reference Method Descriptions

Method	Description	Associated Samples
EPA 8270E	Organochlorine pesticides, pyrethroids and tracers in water matrices by GC/MS/MS	2421007, 2421008
EPA 8270E	PCBs in water matrices by GC/MS/MS	2421007, 2421008
EPA 8276	Chlordane and Toxaphene in water matrices by GC/MS with Negative Chemical Ionization	2421007, 2421008
EPA 8321B	Pesticides, herbicides, and other chemicals in water matrices by HPLC/MS/MS	2421023

Preparation and Analysis Log

Ref. Method	Received Date	Prep Date/Time	Prepared By	Analysis Date/Time	Analyzed By	Associated Samples
EPA 8270E	06/30/2023	07/05/2023 08:00	Rasheda Ghaffari	07/08/2023 01:17	Michael Poppell	2421007
	06/30/2023	07/05/2023 08:00	Rasheda Ghaffari	07/08/2023 01:49	Michael Poppell	2421008
	06/30/2023	07/05/2023 08:00	Rasheda Ghaffari	07/11/2023 23:01	Lipi Saha	2421007
	06/30/2023	07/05/2023 08:00	Rasheda Ghaffari	07/13/2023 05:06	Lipi Saha	2421008
EPA 8276	06/30/2023	07/05/2023 08:00	Rasheda Ghaffari	07/08/2023 15:23	Arthur Maknenko	2421007
	06/30/2023	07/05/2023 08:00	Rasheda Ghaffari	07/08/2023 16:20	Arthur Maknenko	2421008
EPA 8321B	06/30/2023	06/30/2023 16:00	Hana Lee	07/01/2023 07:08	Tae K Lee	2421023
	06/30/2023	06/30/2023 16:00	Hana Lee	07/02/2023 03:46	Tae K Lee	2421023
	06/30/2023	07/01/2023 09:00	Hoor Shaik	07/07/2023 15:12	Juyoung Kim	2421023