284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

DATA PACKAGE

GC SEMI-VOLATILES

PROJECT NAME : R36724

TETRA TECH, EMI

240 Continental Drive, Suite 200

Newark, DE - 19713

Phone No: 302-738-7551

ORDER ID : P4462

ATTENTION : Ava Heiss

Laboratory Certification ID # 20012

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Cover Page

Order ID : P4462

Project ID : R36724

Client : Tetra Tech, EMI

Lab Sample Number	Client Sample Number
P4462-02	C0AL2

I certify that the data package is in compliance with the terms and conditions of the contract,both technically and for completeness, for other than the conditions detailed above. Release of the data contained in this hard copy data package has been authorized by the laboratory manager or his designee, as verified by the following signature.

Signature : _____

Date: 11/4/2024

NYDOH CERTIFICATION NO - 11376

NJDEP CERTIFICATION NO - 20012

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CASE NARRATIVE

Tetra Tech, EMI
Project Name: R36724
Project # N/A
Chemtech Project # P4462
Test Name: TCLP Herbicide

A. Number of Samples and Date of Receipt:
1 Water sample was received on 10/19/2024.

B. Parameters
According to the Chain of Custody document, the following analyses were requested: TCLP Extraction and TCLP Herbicide. This data package contains results for TCLP Herbicide.

C. Analytical Techniques:
The analysis was performed on instrument ECD_S. The front column is RTX-CLPesticides which is 30 meters, 0.32 mm ID, 0. 5 um df,: Catalog # 11139. The rear column is RTX-CLPesticides2 which is 30 meters, 0.32 mm ID, 0.25 um df, Catalog #: 11324The analysis of TCLP Herbicides was based on method 8151A and extraction was done based on method 3510 and TCLP extraction method was 1311.

D. QA/ QC Samples:
The Holding Times were met for all analysis.

The Surrogate recoveries met the acceptable criteria except for WB-301-BOTMS [2,4-DCAA(1) - 28%, 2,4-DCAA(2) - 23%], WB-301-BOTMSD [2,4-DCAA(1) - 28%, 2 and4-DCAA(2) - 22%]due to matrix interference.

The Retention Times were acceptable for all samples.

The MS {P4397-06MS} with File ID: PS028042.D recoveries met the requirements for all compounds except for 2,4,5-TP(Silvex)[212%] due to matrix interference.

The MSD {P4397-06MSD} with File ID: PS028043.D recoveries met the acceptable requirements except for 2,4,5-TP(Silvex)[226%] due to matrix interference.

The RPD met criteria .
The Blank Spike met requirements for all samples .
The Blank analysis did not indicate the presence of lab contamination.
The Initial Calibration met the requirements .
The Continuous Calibration met the requirements .

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E. Additional Comments:

F. Manual Integration Comments:
Please refer to the Manual integration Report included with the Run Logs for information on the manual integrations performed.

I certify that the data package is in compliance with the terms and conditions of the contract, both technically and for completeness, for other than the conditions detailed above. The laboratory manager or his designee, as verified by the following signature has authorized release of the data contained in this hard copy data package.

Signature_____

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DATA REPORTING QUALIFIERS- ORGANIC

For reporting results, the following " Results Qualifiers" are used:

Value	If the result is a value greater than or equal to the detection limit, report the value
U	Indicates the compound was analyzed for but was not detected. Report the minimum detection limit for the sample with the U, i.e. "10 U". This is not necessarily the instrument detection limit attainable for this particular sample based on any concentration or dilution that may have been required.
ND	Indicates the analyte was analyzed for, but not detected
J	Indicates an estimated value. This flag is used: (1) When estimating a concentration for a tentatively identified compound (library search hits, where a 1:1 response is assumed.) (2) When the mass spectral data indicated the identification, however the result was less than the specified detection limit greater than zero. If the detection limit was 10ug/L and a concentration of 3 ug/L was calculated report as 3 J. This is flag is used when similar situation arise on any organic parameter i.e. Pest, PCB and others.
B	Indicates the analyte was found in the blank as well as the sample report as "12 B".
E	Indicates the analyte 's concentration exceeds the calibrated range of the instrument for that specific analysis.
D	This flag identifies all compounds identified in an analysis at a secondary dilution factor.
P	This flag is used for Pesticide/PCB target analyte when there is >25% difference for detected concentrations between the two GC columns. The lower of the two values is reported on Form 1 and flagged with a "P".
N	This flag indicates presumptive evidence of a compound. This is only used for tentatively identified compounds (TICs), where the identification is based on a mass spectral library search. It applies to all TIC results. For generic characterization of a TIC, such as chlorinated hydrocarbon, the flag is not used.
A	This flag indicates that a Tentatively Identified Compound is a suspected aldol-condensation product.
Q	Indicates the LCS did not meet the control limits requirements

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GC ANALYSIS CONFORMANCE/NON-CONFORMANCE SUMMARY

CHEMTECH PROJECT NUMBER: P4462 MATRIX: TCLP

METHOD: 8151A/3510/1311

		NA	NO	YES
1.	Chromatograms Labeled/Compounds Identified.			✓
2.	Standard Summary Submitted.			✓
3.	Calibration - Initial Calibration performed within 30 days before sample analysis and continuing calibration performed within 24 hours of sample analysis, 12 HOURS IF 8000 SERIES METHOD. The Initial Calibration met the requirements . The Continuous Calibration met the requirements .			✓
4.	Blank Contamination - If yes, list compounds and concentrations in each blank:		✓	
5.	Surrogate Recoveries Meet Criteria If not met, list those compounds and their recoveries which fall outside the acceptable ranges. The Surrogate recoveries met the acceptable criteria except for WB-301-BOTMS [2,4-DCAA(1) - 28%, 2,4-DCAA(2) - 23%], WB-301-BOTMSD [2,4-DCAA(1) - 28%, 2 and4-DCAA(2) - 22%]due to matrix interference.		✓	
6.	Matrix Spike/Matrix Spike Duplicate Recoveries Meet Criteria If not met, list those compounds and their recoveries which fall outside the acceptable range. The MS {P4397-06MS} with File ID: PS028042.D recoveries met the requirements for all compounds except for 2,4,5-TP(Silvex)[212%] due to matrix interference. The MSD {P4397-06MSD} with File ID: PS028043.D recoveries met the acceptable requirements except for 2,4,5-TP(Silvex)[226%] due to matrix interference. The Blank Spike met requirements for all samples . The RPD met criteria .		✓	
7.	Retention Time Shift Meet Criteria (if applicable) Comments:			✓

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GC ANALYSIS CONFORMANCE/NON-CONFORMANCE SUMMARY (CONTINUED)

		NA	NO	YES
8.	Extraction Holding Time Met			✓
	If not met, list number of days exceeded for each sample:			
9.	Analysis Holding Time Met			✓
	If not met, list those compounds and their recoveries which fall outside the acceptable range.			

ADDITIONAL COMMENTS:

QA REVIEW _____ Date _____

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APPENDIX A

QA REVIEW GENERAL DOCUMENTATION

Project #: P4462

	Completed
For thorough review, the report must have the following:	
GENERAL:	
Are all original paperwork present (chain of custody, record of communication,airbill, sample management lab chronicle, login page)	✓
Check chain-of-custody for proper relinquish/return of samples	✓
Is the chain of custody signed and complete	✓
Check internal chain-of-custody for proper relinquish/return of samples /sample extracts	✓
Collect information for each project id from server. Were all requirements followed	✓
COVER PAGE:	
Do numbers of samples correspond to the number of samples in the Chain of Custody on login page	✓
Do lab numbers and client Ids on cover page agree with the Chain of Custody	✓
CHAIN OF CUSTODY:	
Do requested analyses on Chain of Custody agree with form I results	✓
Do requested analyses on Chain of Custody agree with the log-in page	✓
Were the correct method log-in for analysis according to the Analytical Request and Chain of Castody	✓
Were the samples received within hold time	✓
Were any problems found with the samples at arrival recorded in the Sample Management Laboratory Chronicle	✓
ANALYTICAL:	
Was method requirement followed?	✓
Was client requirement followed?	✓
Does the case narrative summarize all QC failure?	✓
All runlogs and manual integration are reviewed for requirements	✓
All manual calculations and /or hand notations verified	✓

QA Review Signature: SOHIL JODHANI **Date:** 11/04/2024

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LAB CHRONICLE

OrderID:	P4462	**OrderDate:**	10/21/2024 10:30:18 AM
Client:	Tetra Tech, EMI	**Project:**	R36724
Contact:	Ava Heiss	**Location:**	K51

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
P4462-02	**C0AL2**	**TCLP**			**10/17/24**			**10/19/24**
			TCLP Herbicide	8151A		10/24/24	10/24/24	

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Hit Summary Sheet
SW-846

SDG No.: P4462 **Order ID:** P4462

Client: Tetra Tech, EMI **Project ID:** R36724

Sample ID	Client ID	Matrix	Parameter	Concentration	C	MDL	RDL	Units

Client ID :

Total Concentration: 0.000

QC SUMMARY

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Surrogate Summary

SDG No.: P4462

Client: Tetra Tech, EMI

Analytical Method: 8151A

Lab Sample ID	Client ID	Parameter	Column	Spike	Result	Rec	Qual	Limits Low	Limits High
I.BLK-PS028007.D	PIBLK-PS028007.D	2,4-DCAA	1	500	489	98		39	175
		2,4-DCAA	2	500	461	92		39	175
I.BLK-PS028035.D	PIBLK-PS028035.D	2,4-DCAA	1	500	508	102		39	175
		2,4-DCAA	2	500	489	98		39	175
PB164378BL	PB164378BL	2,4-DCAA	1	500	510	102		39	175
		2,4-DCAA	2	500	516	103		39	175
PB164378BS	PB164378BS	2,4-DCAA	1	500	506	101		39	175
		2,4-DCAA	2	500	542	108		39	175
P4397-06MS	WB-301-BOTMS	2,4-DCAA	1	500	138	28	*	39	175
		2,4-DCAA	2	500	114	23	*	39	175
P4397-06MSD	WB-301-BOTMSD	2,4-DCAA	1	500	142	28	*	39	175
		2,4-DCAA	2	500	111	22	*	39	175
P4462-02	C0AL2	2,4-DCAA	1	500	411	82		39	175
		2,4-DCAA	2	500	366	73		39	175
I.BLK-PS028046.D	PIBLK-PS028046.D	2,4-DCAA	1	500	506	101		39	175
		2,4-DCAA	2	500	479	96		39	175
I.BLK-PS028071.D	PIBLK-PS028071.D	2,4-DCAA	1	500	501	100		39	175
		2,4-DCAA	2	500	483	97		39	175
PB164336TB	PB164336TB	2,4-DCAA	1	500	345	69		39	175
		2,4-DCAA	2	500	287	57		39	175
I.BLK-PS028075.D	PIBLK-PS028075.D	2,4-DCAA	1	500	508	102		39	175
		2,4-DCAA	2	500	418	84		39	175

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Matrix Spike/Matrix Spike Duplicate Summary

SW-846

SDG No.: P4462

Client: Tetra Tech, EMI

Analytical Method: 8151A **DataFile :** PS028042.D

Lab Sample ID:	Parameter	Spike	Sample Result	Result	Units	Rec	Rec Qual	RPD	RPD Qual	Limits Low	Limits High	RPD
Client Sample ID:	**WB-301-BOTMS**											
P4397-06MS	2,4-D	50	0	55.2	ug/L	110				65	135	
	2,4,5-TP(Silvex)	50	0	106	ug/L	212	*			62	139	

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Matrix Spike/Matrix Spike Duplicate Summary

SW-846

SDG No.: P4462

Client: Tetra Tech, EMI

Analytical Method: 8151A **DataFile :** PS028043.D

Lab Sample ID:	Parameter	Spike	Sample Result	Result	Units	Rec	Rec Qual	RPD	RPD Qual	Limits Low	Limits High	Limits RPD
Client Sample ID:	**WB-301-BOTMSD**											
P4397-06MSD	2,4-D	50	0	56.6	ug/L	113		3		65	135	20
	2,4,5-TP(Silvex)	50	0	113	ug/L	226	*	6		62	139	20

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Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.: P4462

Client: Tetra Tech, EMI

Analytical Method: 8151A **Datafile :** PS028038.D

Lab Sample ID	Parameter	Spike	Result	Units	Rec	RPD	Qual	RPD Qual	Limits Low	Limits High	RPD
PB164378BS	2,4-D	5	5.00	ug/L	100				83	130	
	2,4,5-TP(Silvex)	5	5.40	ug/L	108				78	127	

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4C

PESTICIDE METHOD BLANK SUMMARY

EPA SAMPLE NO.

PB164378BL

Lab Name: CHEMTECH Contract: TETR16

Lab Code: CHEM Case No.: P4462 SAS No.: P4462 SDG NO.: P4462

Lab Sample ID: PB164378BL Lab File ID: PS028037.D

Matrix: (soil/water) water Extraction: (Type)

Sulfur Cleanup: (Y/N) N Date Extracted: 10/24/2024

Date Analyzed (1): 10/24/2024 Date Analyzed (2): 10/24/2024

Time Analyzed (1): 17:09 Time Analyzed (2): 17:09

Instrument ID (1): ECD_S Instrument ID (2): ECD_S

GC Column (1): RTX-CLP ID: 0.32 (mm) GC Column (2): RTX-CLP2 ID: 0.32 (mm)

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED 1	DATE ANALYZED 2
PB164378BS	PB164378BS	PS028038.D	10/24/2024	10/24/2024
WB-301-BOTMS	P4397-06MS	PS028042.D	10/24/2024	10/24/2024
WB-301-BOTMSD	P4397-06MSD	PS028043.D	10/24/2024	10/24/2024
C0AL2	P4462-02	PS028045.D	10/24/2024	10/24/2024
PB164336TB	PB164336TB	PS028074.D	10/28/2024	10/28/2024

COMMENTS:

Form IV Pest

SAMPLE DATA

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Report of Analysis

Client:	Tetra Tech, EMI	Date Collected:	10/17/24
Project:	R36724	Date Received:	10/19/24
Client Sample ID:	C0AL2	SDG No.:	P4462
Lab Sample ID:	P4462-02	Matrix:	TCLP
Analytical Method:	SW8151A	% Solid:	0 Decanted:
Sample Wt/Vol:	100 Units: mL	Final Vol:	10000 uL
Soil Aliquot Vol:	uL	Test:	TCLP Herbicide
Extraction Type:		Injection Volume :	
GPC Factor :	1.0 PH :		
Prep Method :	8151A		

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
PS028045.D	1	10/24/24 11:28	10/24/24 20:20	PB164378

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
94-75-7	2,4-D	4.90	U	4.90	20.0	ug/L
93-72-1	2,4,5-TP (Silvex)	4.50	U	4.50	20.0	ug/L
SURROGATES						
19719-28-9	2,4-DCAA	411		39 - 175	82%	SPK: 500

Comments:

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
P = Indicates >25% difference for detected concentrations between the two GC columns
Q = indicates LCS control criteria did not meet requirements
M = MS/MSD acceptance criteria did not meet requirements
J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution
S = Indicates estimated value where valid five-point calibration was not performed prior to analyte detection in sample.
() = Laboratory InHouse Limit

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028045.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 20:20
Operator : AR\AJ
Sample : P4462-02
Misc :
ALS Vial : 14 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
C0AL2

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:49:00 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.091	7.612	1109.3E6	347.3E6	411.318	366.128
	Target Compounds						

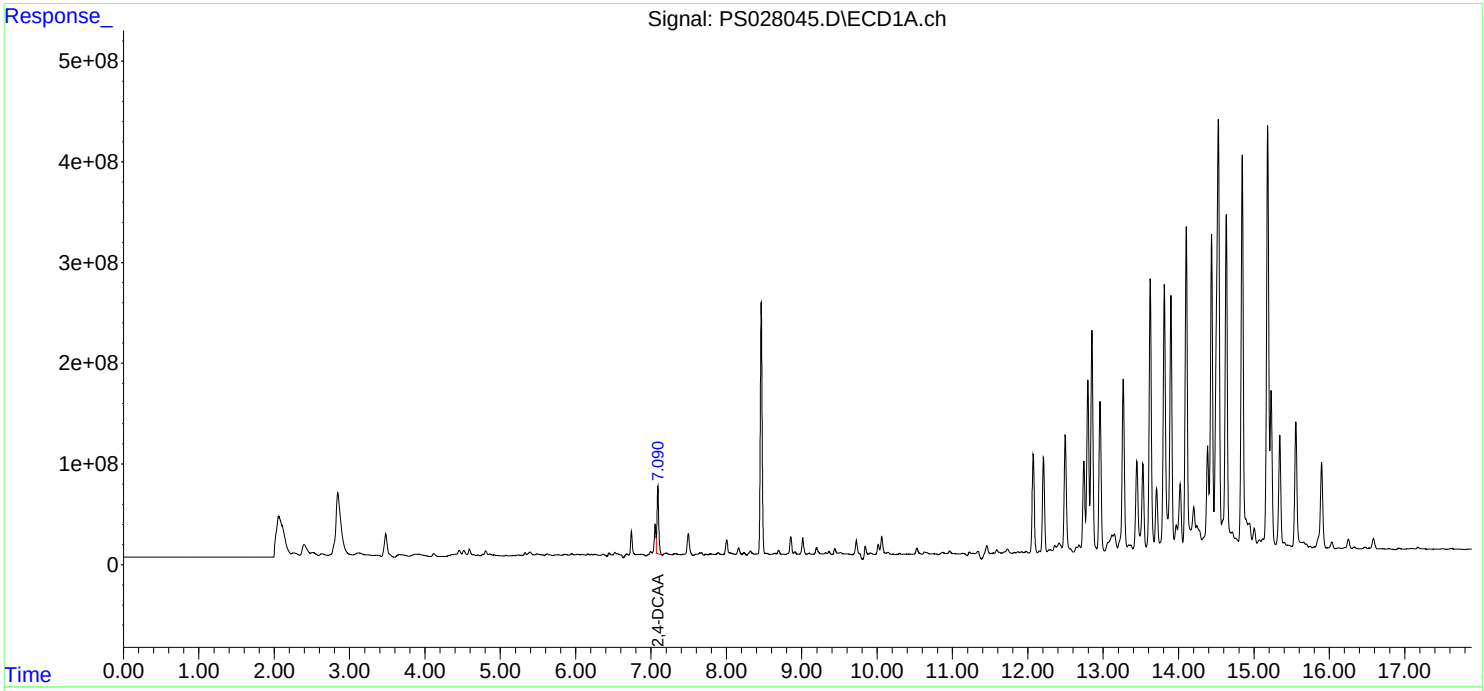
(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

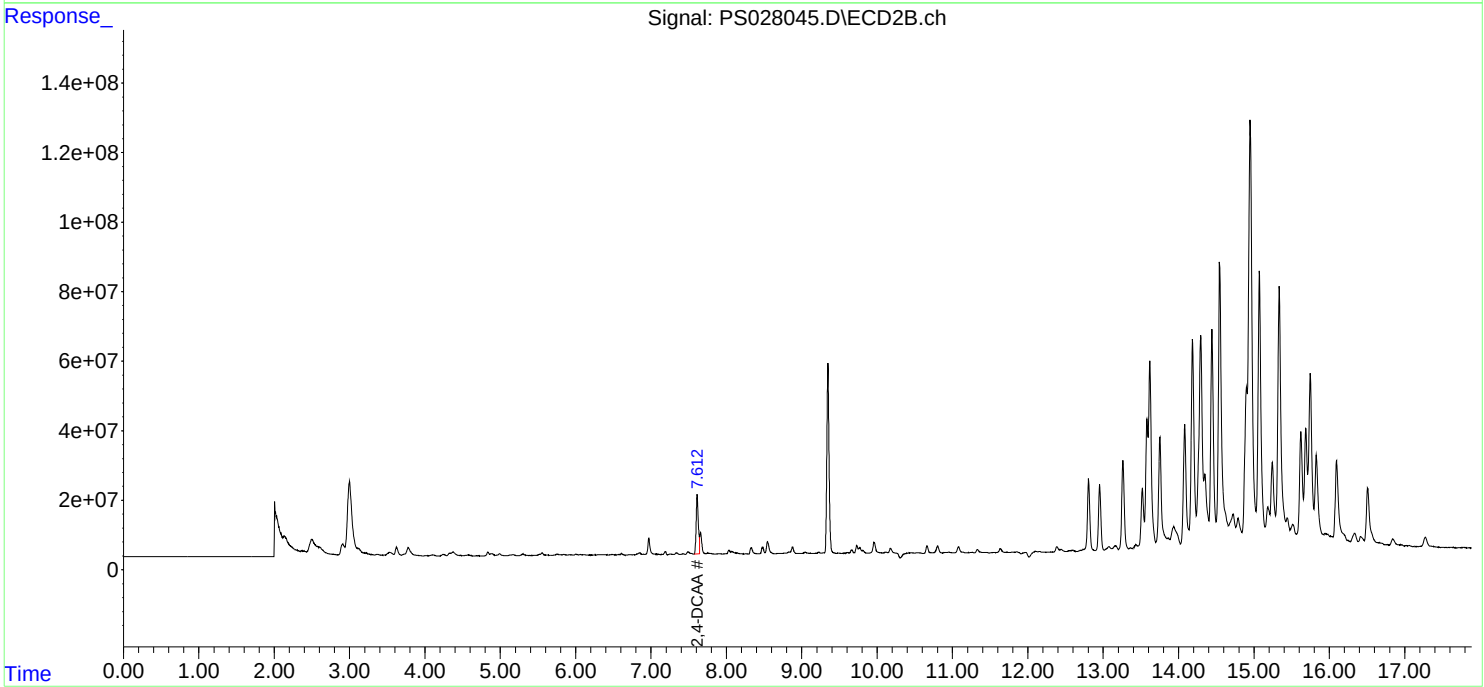
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028045.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 20:20
Operator : AR\AJ
Sample : P4462-02
Misc :
ALS Vial : 14 Sample Multiplier: 1

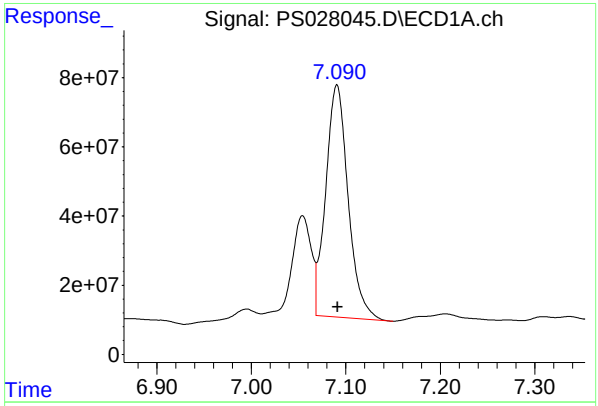
Instrument :
ECD_S
ClientSampleId :
C0AL2

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:49:00 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm



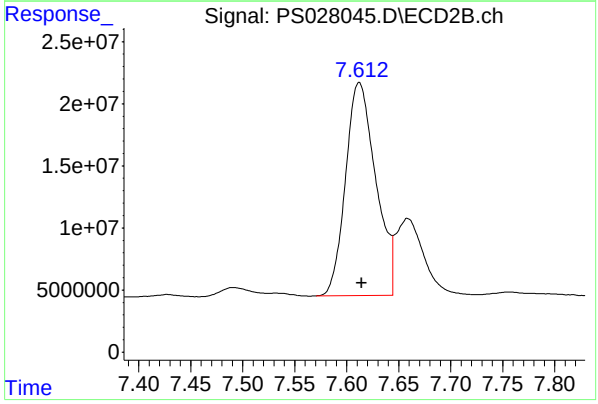




#4 2,4-DCAA

R.T.: 7.091 min
Delta R.T.: 0.000 min
Response: 1109311436
Conc: 411.32 ng/ml

Instrument :
ECD_S
ClientSampleId :
C0AL2



#4 2,4-DCAA

R.T.: 7.612 min
Delta R.T.: -0.002 min
Response: 347337777
Conc: 366.13 ng/ml

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Report of Analysis

Client:	Tetra Tech, EMI	Date Collected:	
Project:	R36724	Date Received:	10/24/24
Client Sample ID:	PB164336TB	SDG No.:	P4462
Lab Sample ID:	PB164336TB	Matrix:	TCLP
Analytical Method:	SW8151A	% Solid:	0 Decanted:
Sample Wt/Vol:	100 Units: mL	Final Vol:	10000 uL
Soil Aliquot Vol:	uL	Test:	TCLP Herbicide
Extraction Type:		Injection Volume :	
GPC Factor :	1.0 PH :		
Prep Method :	8151A		

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
PS028074.D	1	10/24/24 11:28	10/28/24 13:35	PB164378

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
94-75-7	2,4-D	4.90	U	4.90	20.0	ug/L
93-72-1	2,4,5-TP (Silvex)	4.50	U	4.50	20.0	ug/L
SURROGATES						
19719-28-9	2,4-DCAA	345		39 - 175	69%	SPK: 500

Comments:

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
P = Indicates >25% difference for detected concentrations between the two GC columns
Q = indicates LCS control criteria did not meet requirements
M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution
S = Indicates estimated value where valid five-point calibration was not performed prior to analyte detection in sample.
() = Laboratory InHouse Limit

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102824\
Data File : PS028074.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 28 Oct 2024 13:35
Operator : AR\AJ
Sample : PB164336TB
Misc :
ALS Vial : 5 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
PB164336TB

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 29 00:25:01 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.087	7.608	929.1E6	272.1E6	344.508m	286.777
	Target Compounds						

(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102824\
Data File : PS028074.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 28 Oct 2024 13:35
Operator : AR\AJ
Sample : PB164336TB
Misc :
ALS Vial : 5 Sample Multiplier: 1

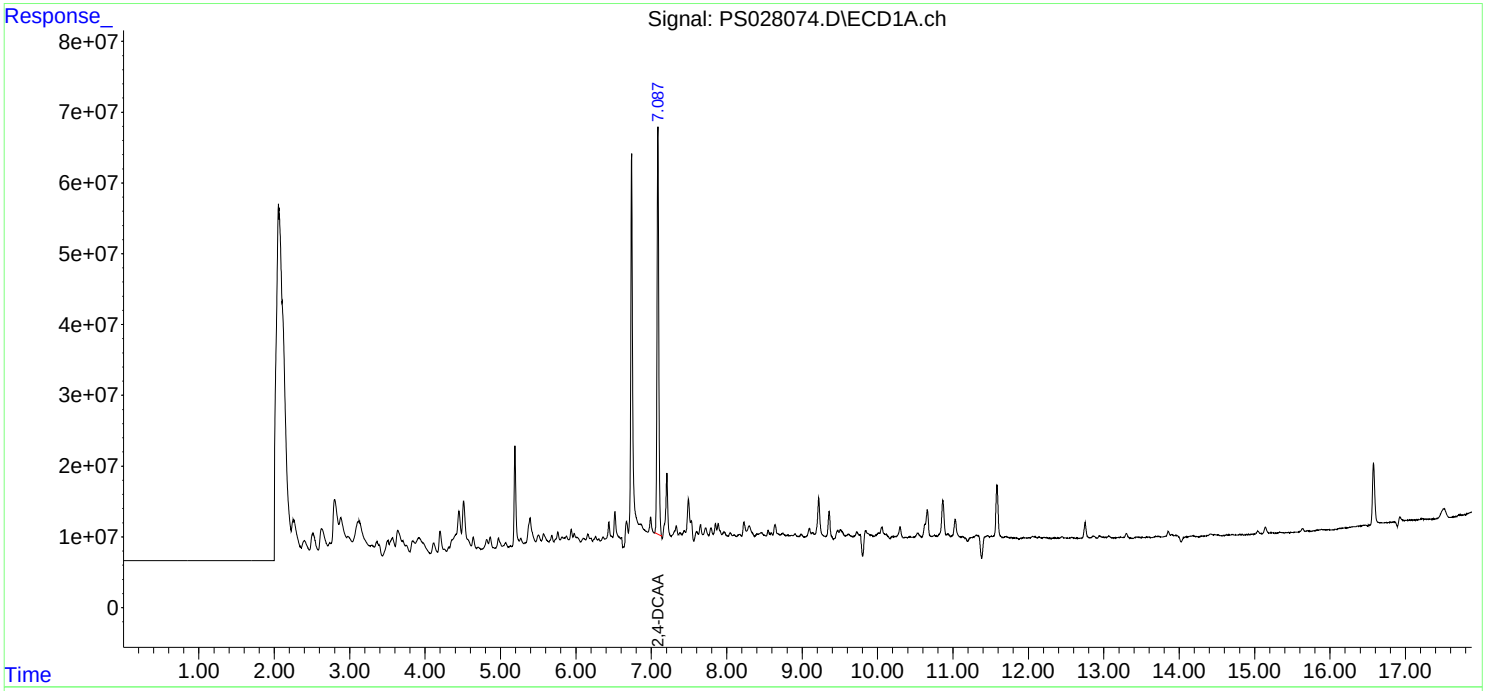
Instrument :
ECD_S
ClientSampleId :
PB164336TB

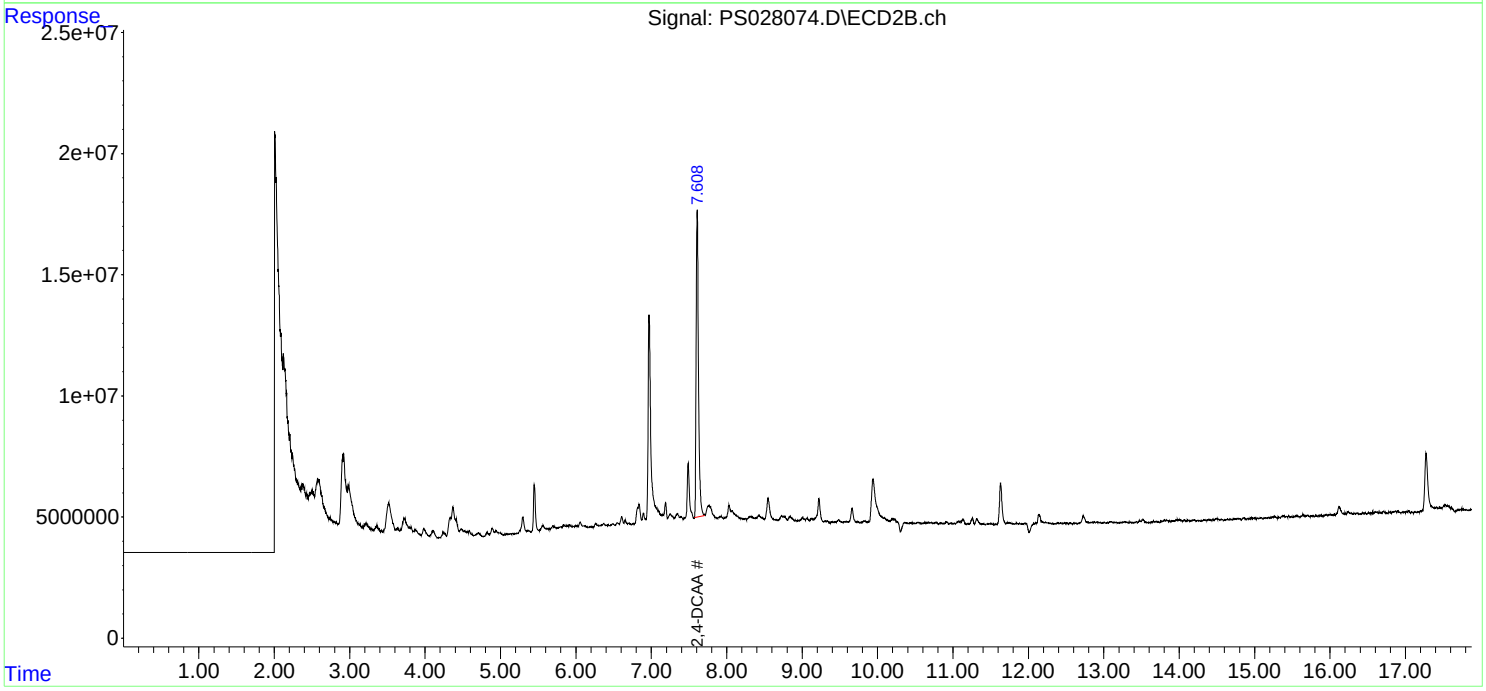
Manual Integrations APPROVED

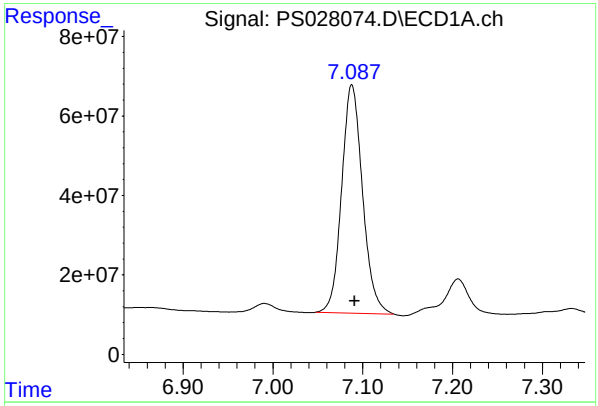
Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 29 00:25:01 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm







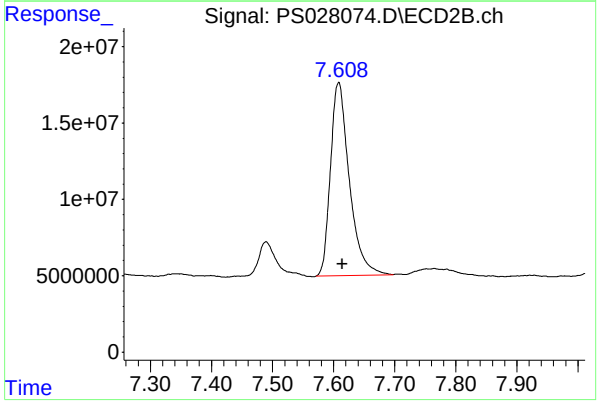
#4 2,4-DCAA

R.T.: 7.087 min
Delta R.T.: -0.004 min
Response: 929126924
Conc: 344.51 ng/ml

Instrument :
ECD_S
ClientSampleId :
PB164336TB

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024



#4 2,4-DCAA

R.T.: 7.608 min
Delta R.T.: -0.006 min
Response: 272059263
Conc: 286.78 ng/ml

CALIBRATION SUMMARY

Alliance TECHNICAL GROUP
284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

RETENTION TIMES OF INITIAL CALIBRATION

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Instrument ID: ECD_S **Calibration Date(s):** 10/23/2024 10/23/2024

Calibration Times: 11:28 13:04

GC Column: RTX-CLP ID: 0.32 (mm)

LAB FILE ID: RT 200 = PS028008.D RT 500 = PS028009.D

RT 750 = PS028010.D RT 1000 = PS028011.D RT 1500 = PS028012.D

COMPOUND	RT 200	RT 500	RT 750	RT 1000	RT 1500	MEAN RT	RT WINDOW FROM	RT WINDOW TO
2,4,5-TP(Silvex)	9.03	9.03	9.03	9.03	9.03	9.03	8.93	9.13
2,4-D	8.18	8.18	8.18	8.18	8.18	8.18	8.08	8.28
2,4-DCAA	7.09	7.09	7.09	7.09	7.09	7.09	6.99	7.19

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
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RETENTION TIMES OF INITIAL CALIBRATION

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Instrument ID: ECD_S **Calibration Date(s):** 10/23/2024 10/23/2024

Calibration Times: 11:28 13:04

GC Column: RTX-CLP2 ID: 0.32 (mm)

LAB FILE ID: RT 200 = PS028008.D RT 500 = PS028009.D

RT 750 = PS028010.D RT 1000 = PS028011.D RT 1500 = PS028012.D

COMPOUND	RT 200	RT 500	RT 750	RT 1000	RT 1500	MEAN RT	RT WINDOW FROM	RT WINDOW TO
2,4,5-TP(Silvex)	9.73	9.73	9.73	9.73	9.72	9.73	9.63	9.83
2,4-D	8.84	8.84	8.84	8.84	8.84	8.84	8.74	8.94
2,4-DCAA	7.61	7.62	7.61	7.62	7.61	7.61	7.51	7.71

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Fax : 908 789 8922

CALIBRATION FACTOR OF INITIAL CALIBRATION

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Instrument ID: ECD_S **Calibration Date(s):** 10/23/2024 10/23/2024

Calibration Times: 11:28 13:04

GC Column: RTX-CLP **ID:** 0.32 **(mm)**

LAB FILE ID: **CF 200 =** PS028008.D **CF 500 =** PS028009.D

CF 750 = PS028010.D **CF 1000 =** PS028011.D **CF 1500 =** PS028012.D

COMPOUND	CF 200	CF 500	CF 750	CF 1000	CF 1500	CF	% RSD
2,4,5-TP(Silvex)	19584000000	16293000000	15358800000	15287500000	14230600000	16150800000	13
2,4-D	4140980000	3388880000	3183890000	3192570000	3036110000	3388490000	13
2,4-DCAA	3343560000	2711910000	2549070000	2475610000	2404680000	2696970000	14

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

CALIBRATION FACTOR OF INITIAL CALIBRATION

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Instrument ID: ECD_S **Calibration Date(s):** 10/23/2024 10/23/2024

Calibration Times: 11:28 13:04

GC Column: RTX-CLP2 **ID:** 0.32 **(mm)**

LAB FILE ID: **CF 200 =** PS028008.D **CF 500 =** PS028009.D

CF 750 = PS028010.D **CF 1000 =** PS028011.D **CF 1500 =** PS028012.D

COMPOUND	CF 200	CF 500	CF 750	CF 1000	CF 1500	CF	% RSD
2,4,5-TP(Silvex)	4575720000	4585960000	4376840000	4595510000	4689140000	4564630000	3
2,4-D	1125240000	990045000	959343000	966564000	944531000	997145000	7
2,4-DCAA	1149150000	929743000	912345000	889645000	862510000	948678000	12

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

INITIAL CALIBRATION OF MULTICOMPONENT ANALYTES

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Instrument ID: _____ **Date(s) Analyzed:** _____ _____

GC Column: _____ **ID:** _____ (mm)

COMPOUND	AMOUNT (ng)	PEAK	RT	RT WINDOW FROM	RT WINDOW TO	CALIBRATION FACTOR
		1				
		2				
		3				
		4				
		5				

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028008.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 11:28
Operator : AR\AJ
Sample : HSTDICC200
Misc :
ALS Vial : 3 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
HSTDICC200

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 12:43:57 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 12:40:27 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.091	7.614	668.7E6	229.8E6	233.149	230.503
	Target Compounds						
1) T	Dalapon	2.538	2.613	1013.0E6	327.0E6	212.887	192.117
2) T	3,5-DICHL...	6.283	6.587	914.1E6	298.0E6	217.686	214.709
3) T	4-Nitroph...	6.887	7.149	415.9E6	161.8E6	213.251	216.628
5) T	DICAMBA	7.269	7.807	2430.2E6	660.5E6	212.222	198.732
6) T	MCPP	7.445	7.907	133.4E6	46625854	18.745	18.457
7) T	MCPA	7.589	8.146	217.2E6	114.4E6	20.139	22.573m
8) T	DICHLORPROP	7.955	8.513	669.5E6	212.3E6	219.426	218.490
9) T	2,4-D	8.177	8.840	778.5E6	211.5E6	217.992	206.410
10) T	Pentachlo...	8.463	9.349	9595.9E6	2603.5E6	222.383	199.159
11) T	2,4,5-TP ...	9.029	9.725	3721.0E6	869.4E6	217.873	192.647
12) T	2,4,5-T	9.314	10.139	3854.9E6	805.4E6	217.787	195.183
13) T	2,4-DB	9.877	10.702	593.7E6	112.5E6	216.692	212.499
14) T	DINOSEB	11.050	11.075	2573.1E6	726.9E6	220.080	208.003
15) T	Picloram	10.867	12.152	5081.6E6	783.6E6	217.301	180.911
16) T	DCPA	11.350	12.104	4426.8E6	941.4E6	224.735	198.286

(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

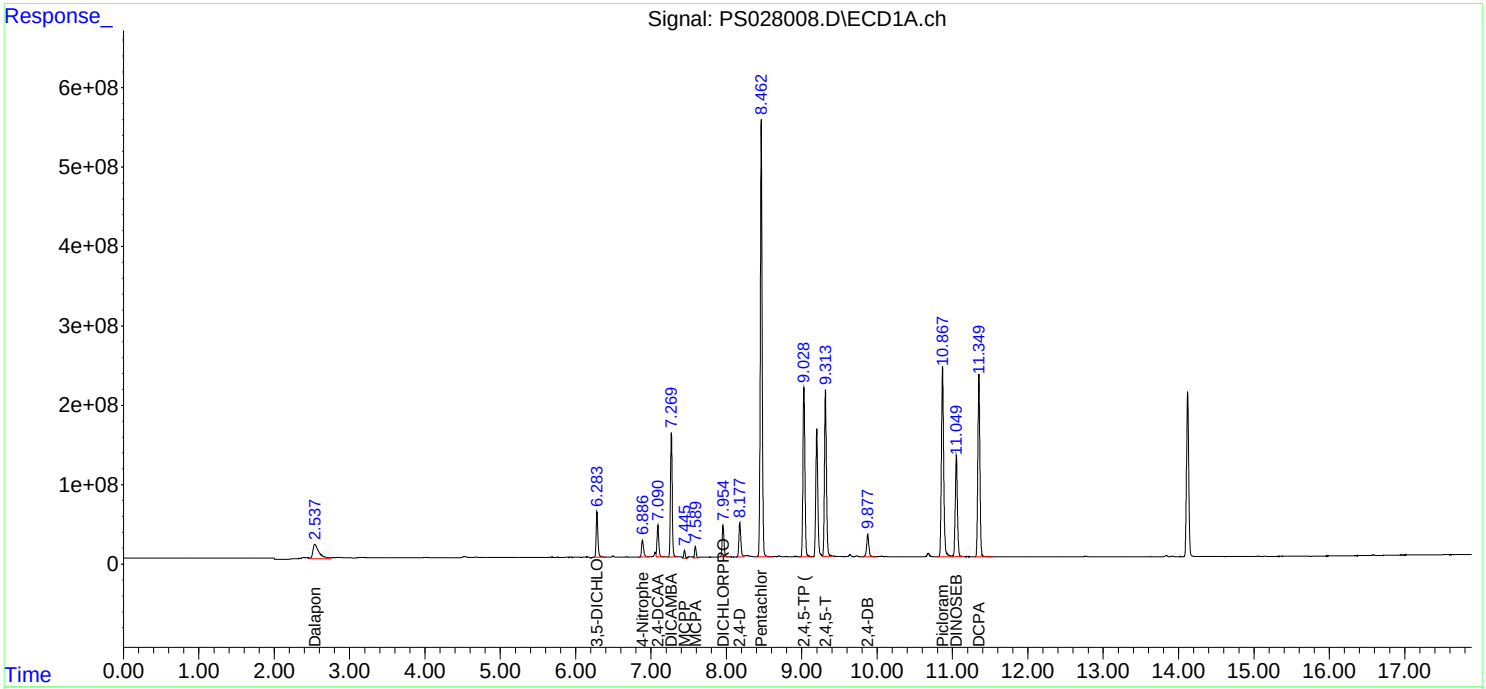
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028008.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 11:28
Operator : AR\AJ
Sample : HSTDICC200
Misc :
ALS Vial : 3 Sample Multiplier: 1

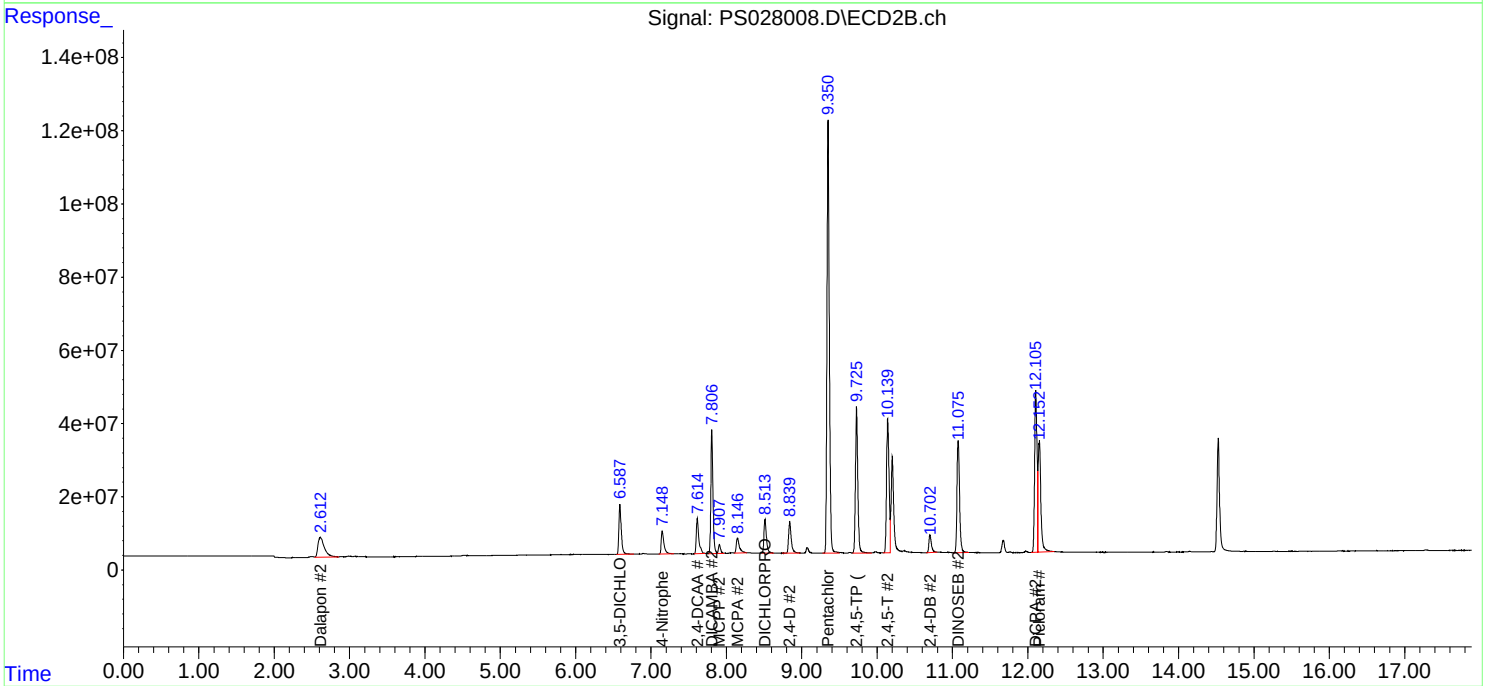
Instrument :
ECD_S
ClientSampleId :
HSTDICC200

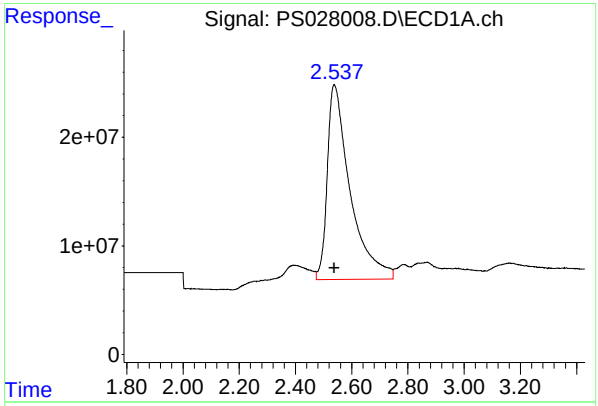
Manual Integrations APPROVED
Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 12:43:57 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 12:40:27 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm







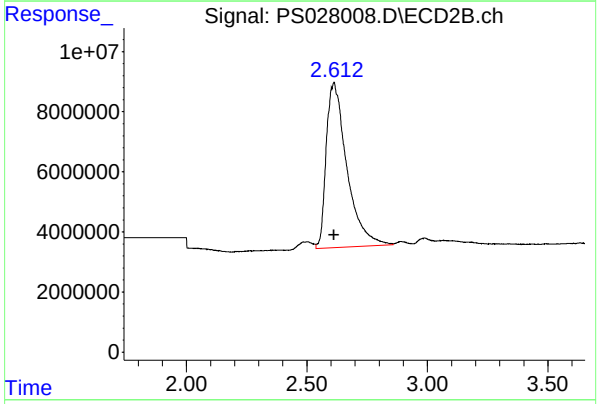
#1 Dalapon

R.T.: 2.538 min
Delta R.T.: 0.000 min
Response: 1013041330
Conc: 212.89 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC200

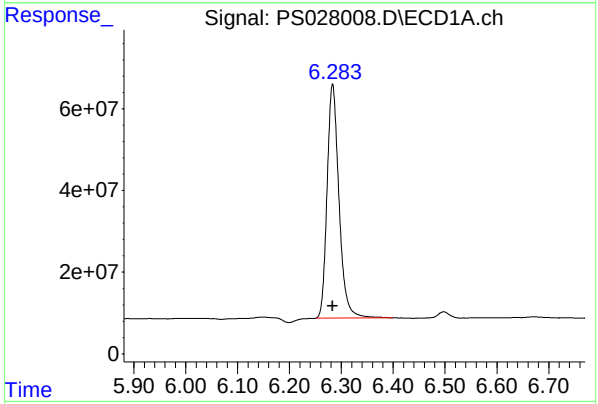
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



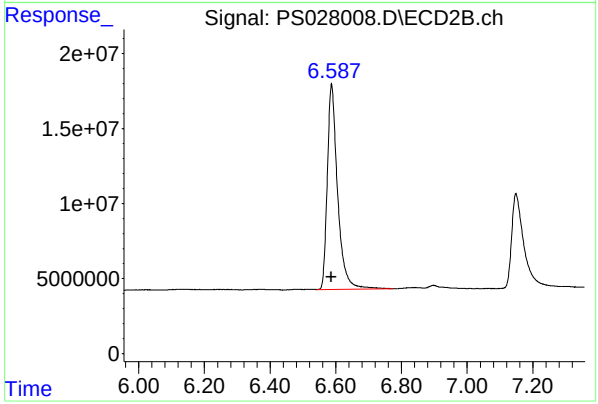
#1 Dalapon

R.T.: 2.613 min
Delta R.T.: 0.000 min
Response: 326976737
Conc: 192.12 ng/ml



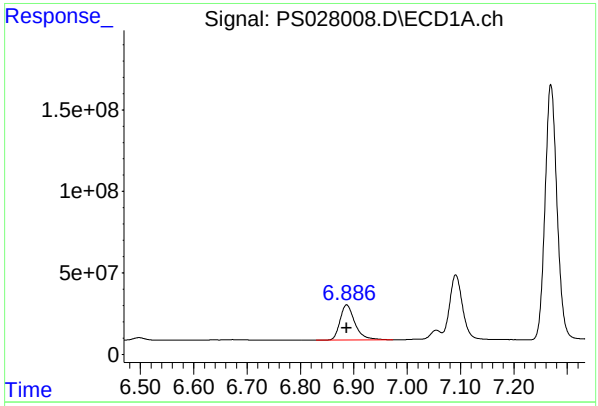
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.283 min
Delta R.T.: 0.000 min
Response: 914131685
Conc: 217.69 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.587 min
Delta R.T.: 0.000 min
Response: 297990208
Conc: 214.71 ng/ml



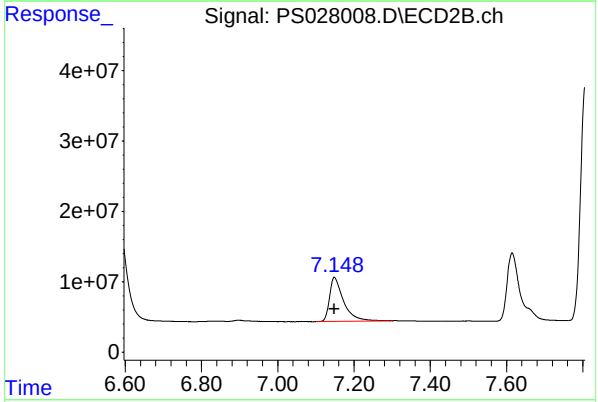
#3 4-Nitrophenol

R.T.: 6.887 min
Delta R.T.: 0.000 min
Response: 415944677
Conc: 213.25 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC200

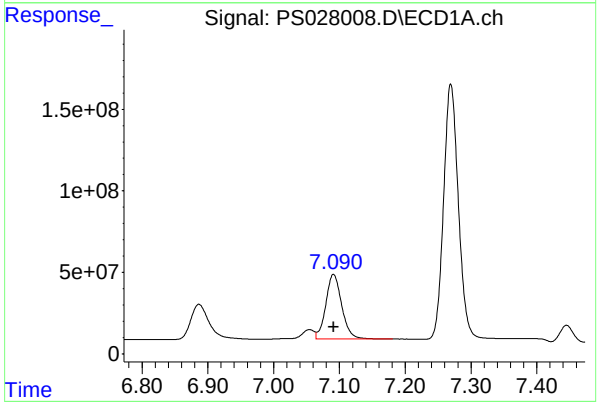
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



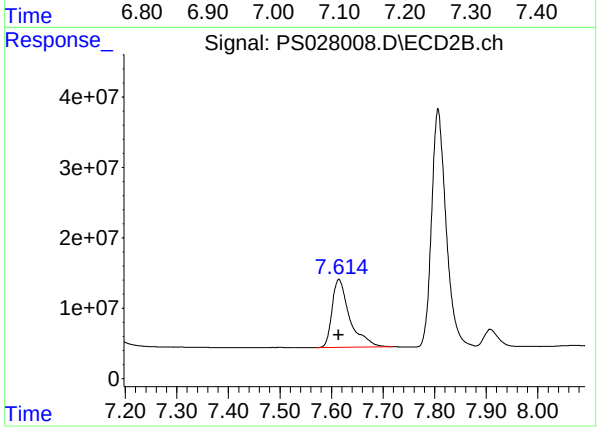
#3 4-Nitrophenol

R.T.: 7.149 min
Delta R.T.: 0.000 min
Response: 161758247
Conc: 216.63 ng/ml



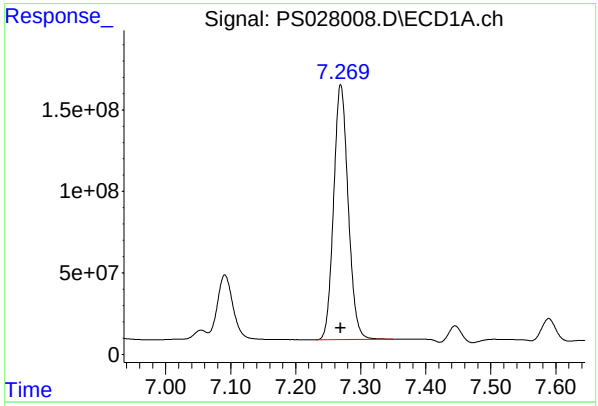
#4 2,4-DCAA

R.T.: 7.091 min
Delta R.T.: 0.000 min
Response: 668711034
Conc: 233.15 ng/ml



#4 2,4-DCAA

R.T.: 7.614 min
Delta R.T.: 0.000 min
Response: 229829096
Conc: 230.50 ng/ml



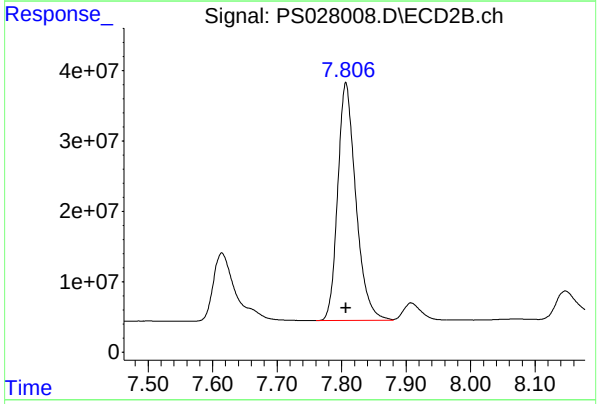
#5 DICAMBA

R.T.: 7.269 min
Delta R.T.: 0.000 min
Response: 2430197156
Conc: 212.22 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC200

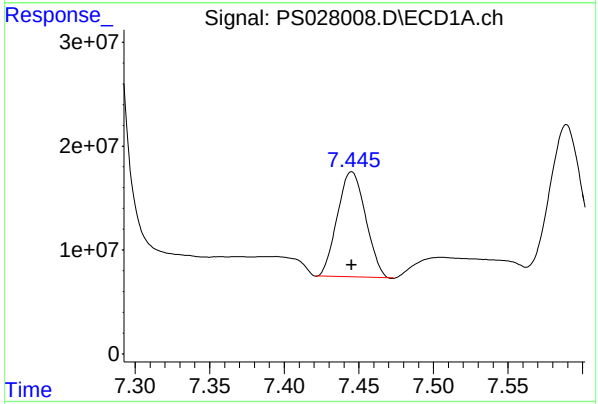
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



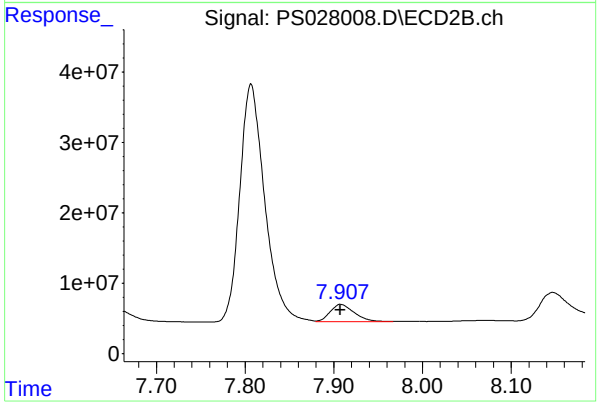
#5 DICAMBA

R.T.: 7.807 min
Delta R.T.: 0.000 min
Response: 660501195
Conc: 198.73 ng/ml



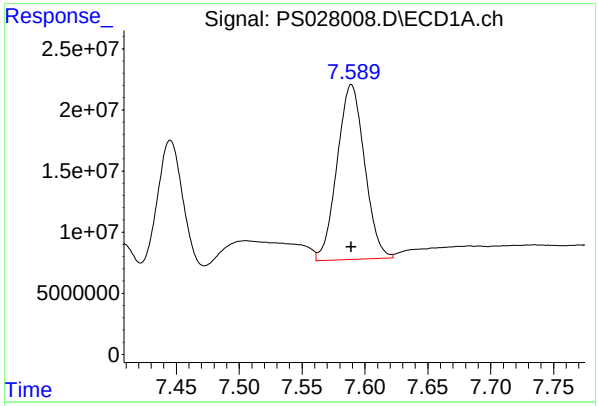
#6 MCPP

R.T.: 7.445 min
Delta R.T.: 0.000 min
Response: 133394294
Conc: 18.74 ug/ml



#6 MCPP

R.T.: 7.907 min
Delta R.T.: 0.000 min
Response: 46625854
Conc: 18.46 ug/ml



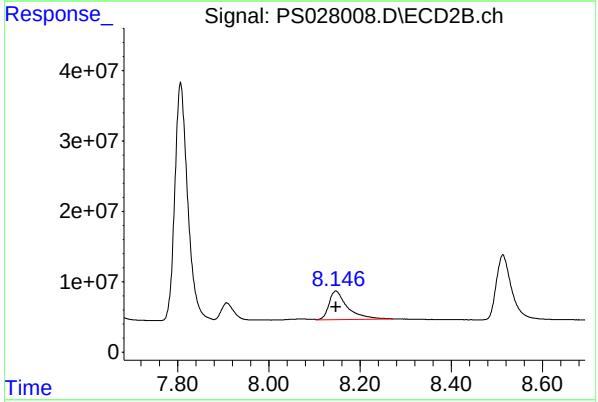
#7 MCPA

R.T.: 7.589 min
Delta R.T.: 0.000 mi
Response: 217193336
Conc: 20.14 ug/m

Instrument :
ECD_S
ClientSampleId :
HSTDICC200

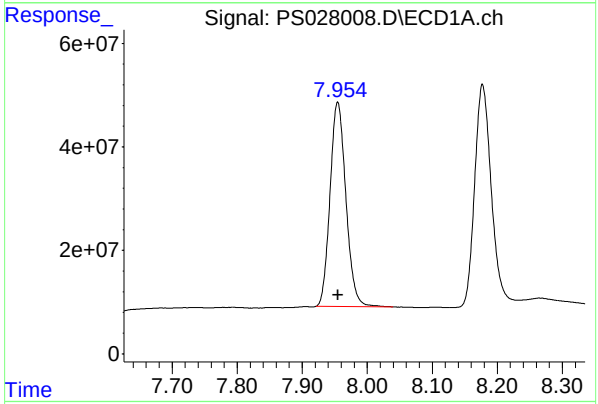
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



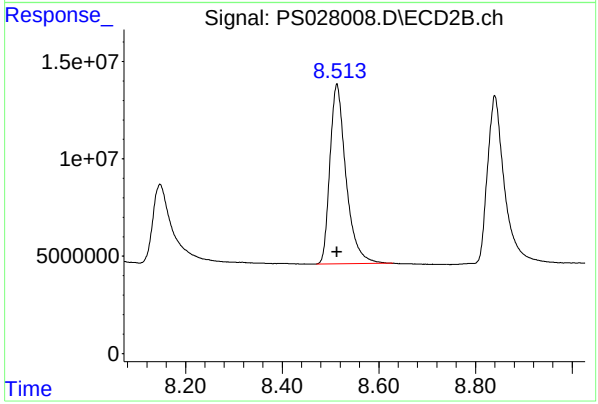
#7 MCPA

R.T.: 8.146 min
Delta R.T.: 0.000 min
Response: 114403425
Conc: 22.57 ug/ml m



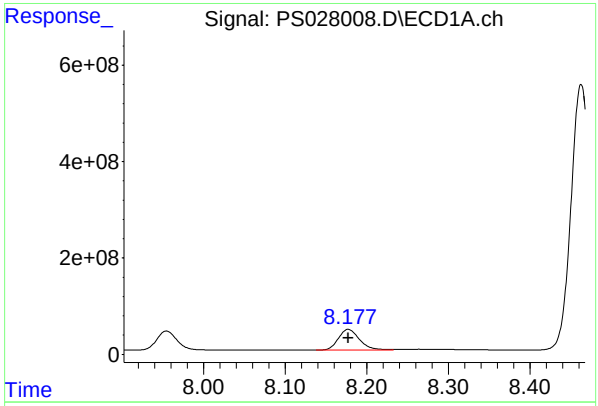
#8 DICHLORPROP

R.T.: 7.955 min
Delta R.T.: 0.000 min
Response: 669520635
Conc: 219.43 ng/ml



#8 DICHLORPROP

R.T.: 8.513 min
Delta R.T.: 0.000 min
Response: 212323354
Conc: 218.49 ng/ml



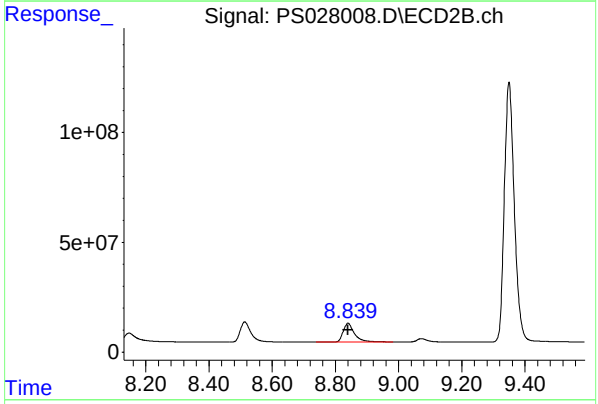
#9 2,4-D

R.T.: 8.177 min
Delta R.T.: 0.000 min
Response: 778504531
Conc: 217.99 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC200

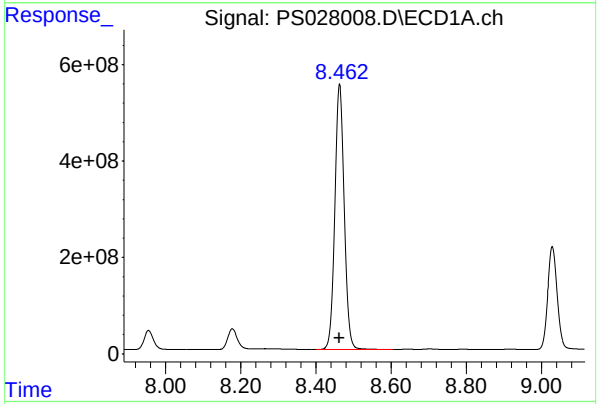
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



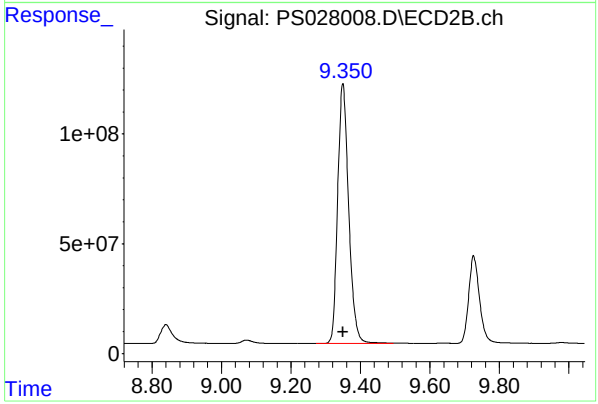
#9 2,4-D

R.T.: 8.840 min
Delta R.T.: 0.000 min
Response: 211545165
Conc: 206.41 ng/ml



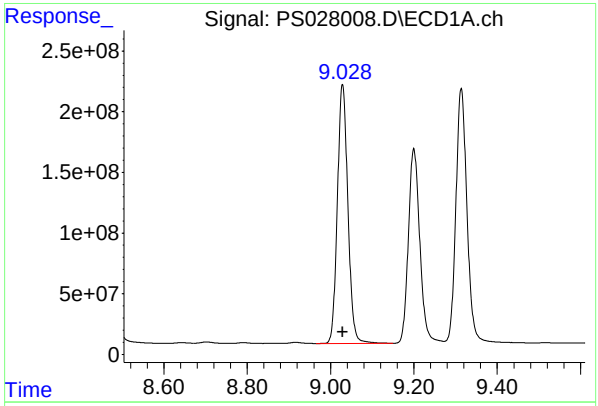
#10 Pentachlorophenol

R.T.: 8.463 min
Delta R.T.: 0.000 min
Response: 9595927268
Conc: 222.38 ng/ml



#10 Pentachlorophenol

R.T.: 9.349 min
Delta R.T.: 0.000 min
Response: 2603502793
Conc: 199.16 ng/ml



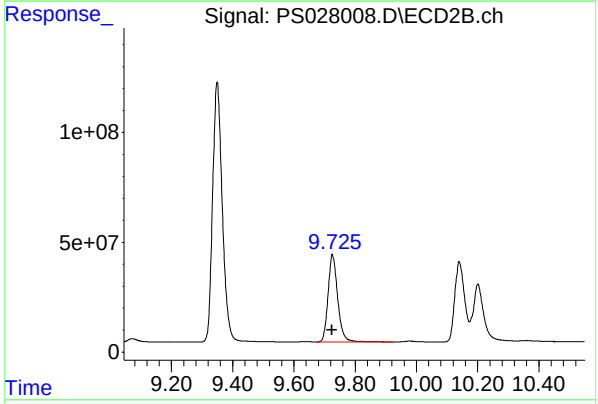
#11 2,4,5-TP (SILVEX)

R.T.: 9.029 min
Delta R.T.: 0.000 min
Response: 3720953254
Conc: 217.87 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC200

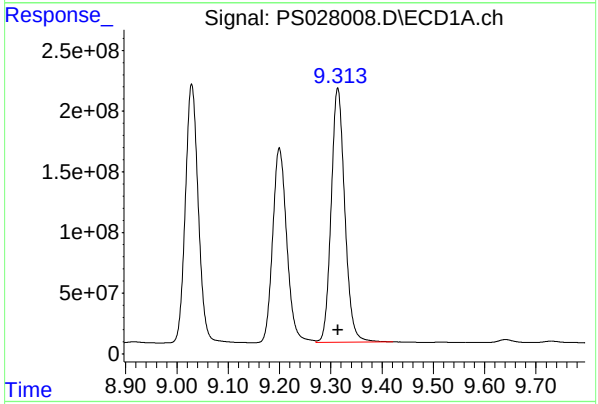
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



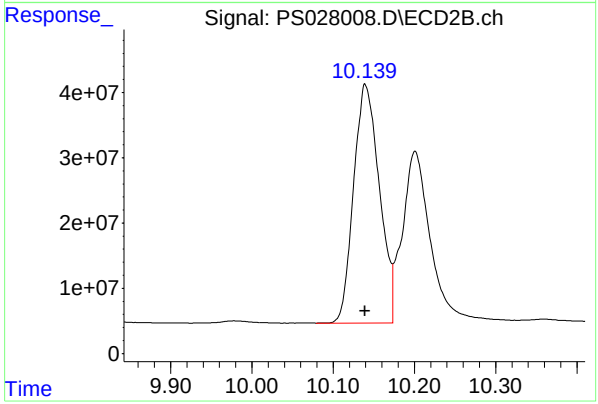
#11 2,4,5-TP (SILVEX)

R.T.: 9.725 min
Delta R.T.: 0.000 min
Response: 869386887
Conc: 192.65 ng/ml



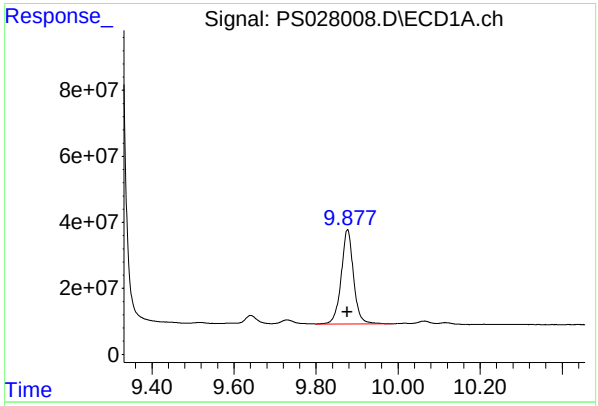
#12 2,4,5-T

R.T.: 9.314 min
Delta R.T.: 0.000 min
Response: 3854862745
Conc: 217.79 ng/ml



#12 2,4,5-T

R.T.: 10.139 min
Delta R.T.: 0.000 min
Response: 805420159
Conc: 195.18 ng/ml



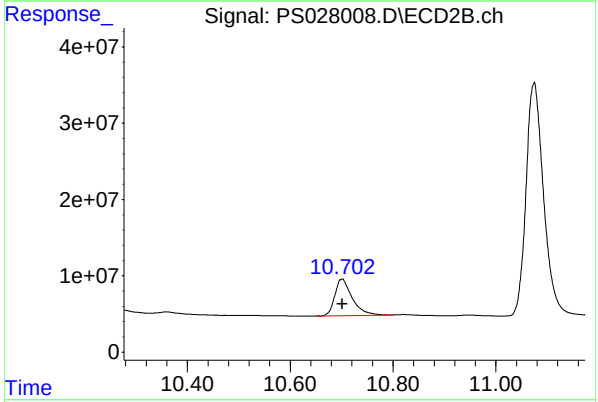
#13 2,4-DB

R.T.: 9.877 min
Delta R.T.: 0.000 min
Response: 593741904
Conc: 216.69 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC200

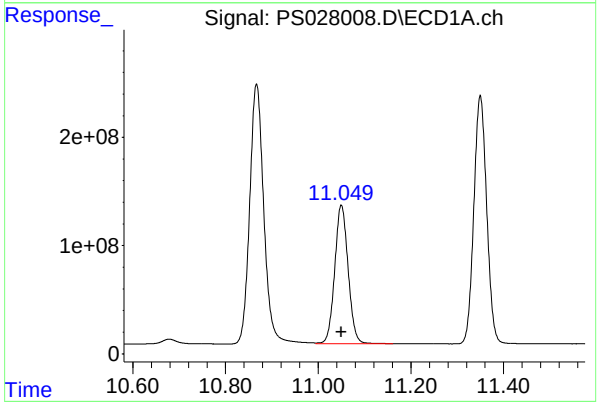
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



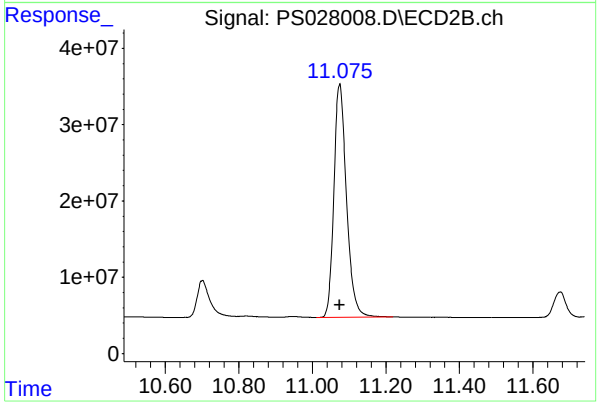
#13 2,4-DB

R.T.: 10.702 min
Delta R.T.: 0.000 min
Response: 112487765
Conc: 212.50 ng/ml



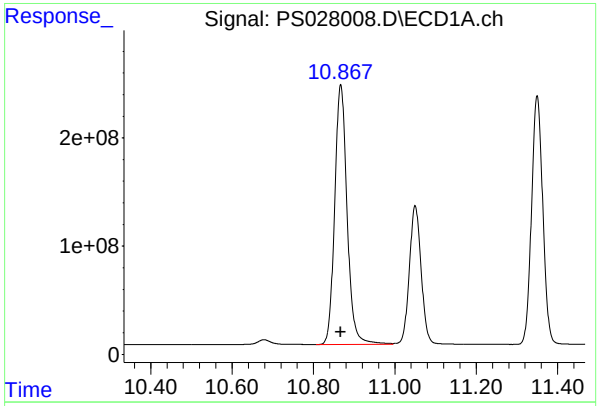
#14 DINOSEB

R.T.: 11.050 min
Delta R.T.: 0.000 min
Response: 2573134484
Conc: 220.08 ng/ml



#14 DINOSEB

R.T.: 11.075 min
Delta R.T.: 0.000 min
Response: 726910303
Conc: 208.00 ng/ml



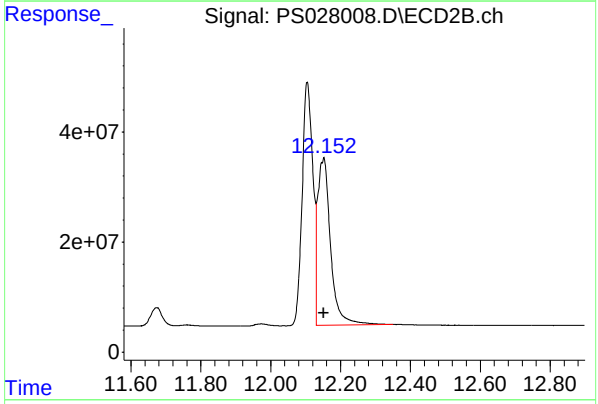
#15 Picloram

R.T.: 10.867 min
Delta R.T.: 0.000 min
Response: 5081574361
Conc: 217.30 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC200

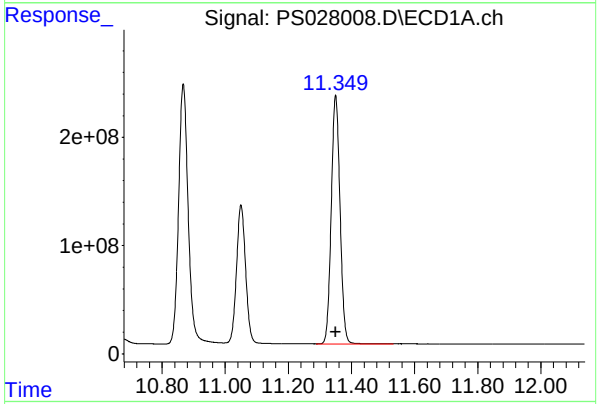
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



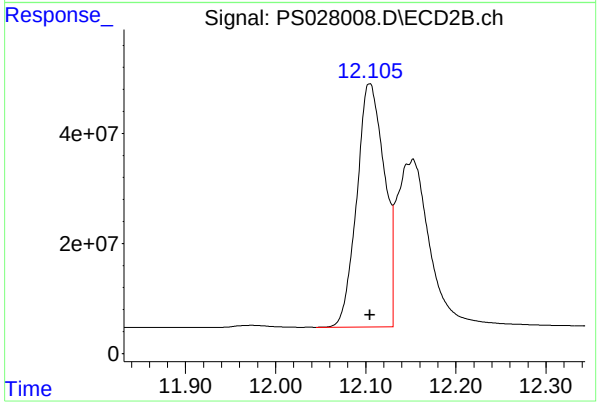
#15 Picloram

R.T.: 12.152 min
Delta R.T.: 0.000 min
Response: 783576534
Conc: 180.91 ng/ml



#16 DCPA

R.T.: 11.350 min
Delta R.T.: 0.000 min
Response: 4426789941
Conc: 224.73 ng/ml



#16 DCPA

R.T.: 12.104 min
Delta R.T.: 0.000 min
Response: 941356828
Conc: 198.29 ng/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028009.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 11:52
Operator : AR\AJ
Sample : HSTDICC500
Misc :
ALS Vial : 4 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
HSTDICC500

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 12:42:30 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 12:40:27 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.092	7.616	1356.0E6	464.9E6	515.476	504.722
	Target Compounds						
1) T	Dalapon	2.540	2.613	2056.5E6	758.2E6	472.248	458.197
2) T	3,5-DICHL...	6.284	6.587	1854.8E6	609.7E6	482.804	476.043
3) T	4-Nitroph...	6.886	7.149	837.8E6	314.2E6	469.846	464.945
5) T	DICAMBA	7.269	7.808	5159.5E6	1529.1E6	481.590	473.587
6) T	MCPP	7.448	7.910	333.1E6	121.1E6	46.741	47.492
7) T	MCPA	7.592	8.150	485.6E6	214.5E6	46.968	48.993
8) T	DICHLORPROP	7.955	8.515	1360.7E6	423.9E6	486.609	474.683
9) T	2,4-D	8.178	8.836	1592.8E6	465.3E6	484.659	477.402
10) T	Pentachlo...	8.463	9.350	19514.2E6	6275.0E6	494.366	491.867
11) T	2,4,5-TP ...	9.030	9.727	7739.2E6	2178.3E6	489.020	486.083
12) T	2,4,5-T	9.314	10.141	8004.5E6	1956.4E6	487.904	480.661
13) T	2,4-DB	9.876	10.702	1236.6E6	248.1E6	485.411	498.121
14) T	DINOSEB	11.051	11.076	5179.3E6	1556.1E6	484.306	470.290
15) T	Picloram	10.867	12.149	10616.1E6	2043.7E6	489.111	460.824
16) T	DCPA	11.351	12.107	8832.5E6	2239.3E6	490.188	479.525

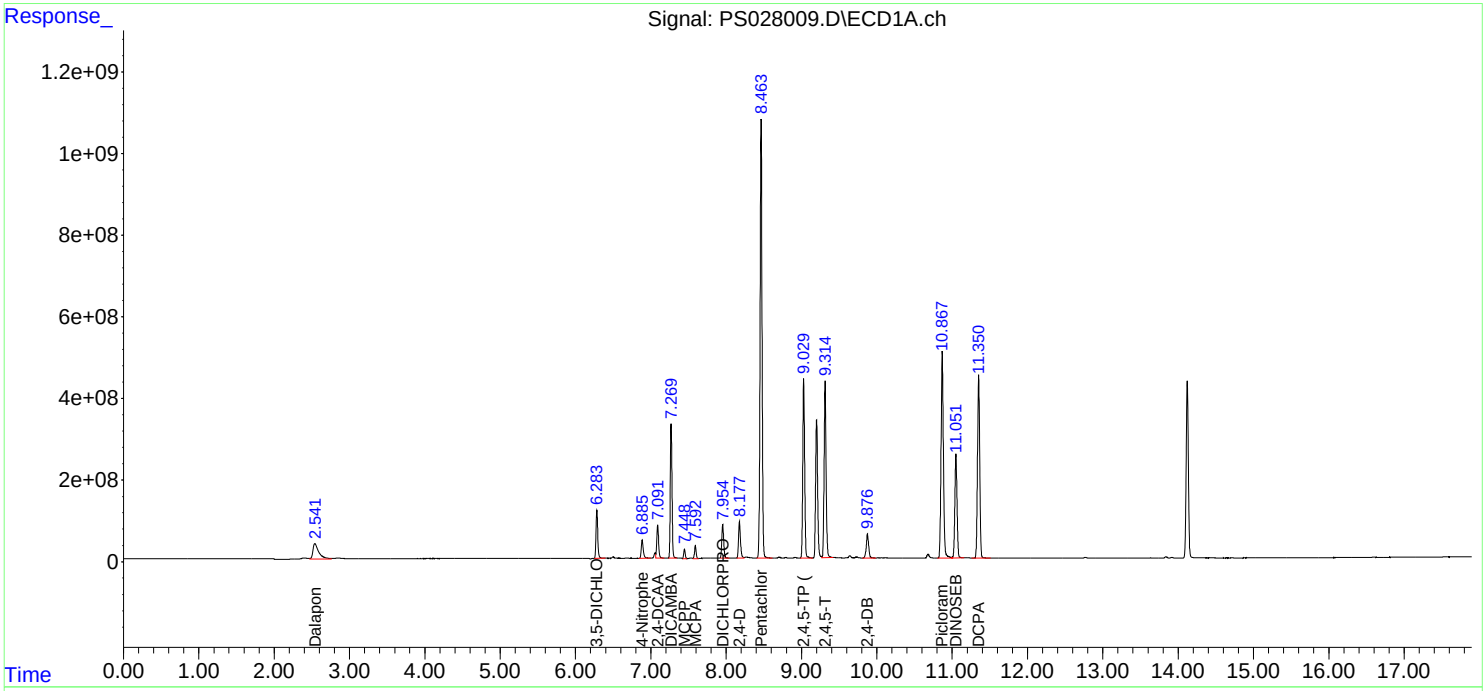
(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

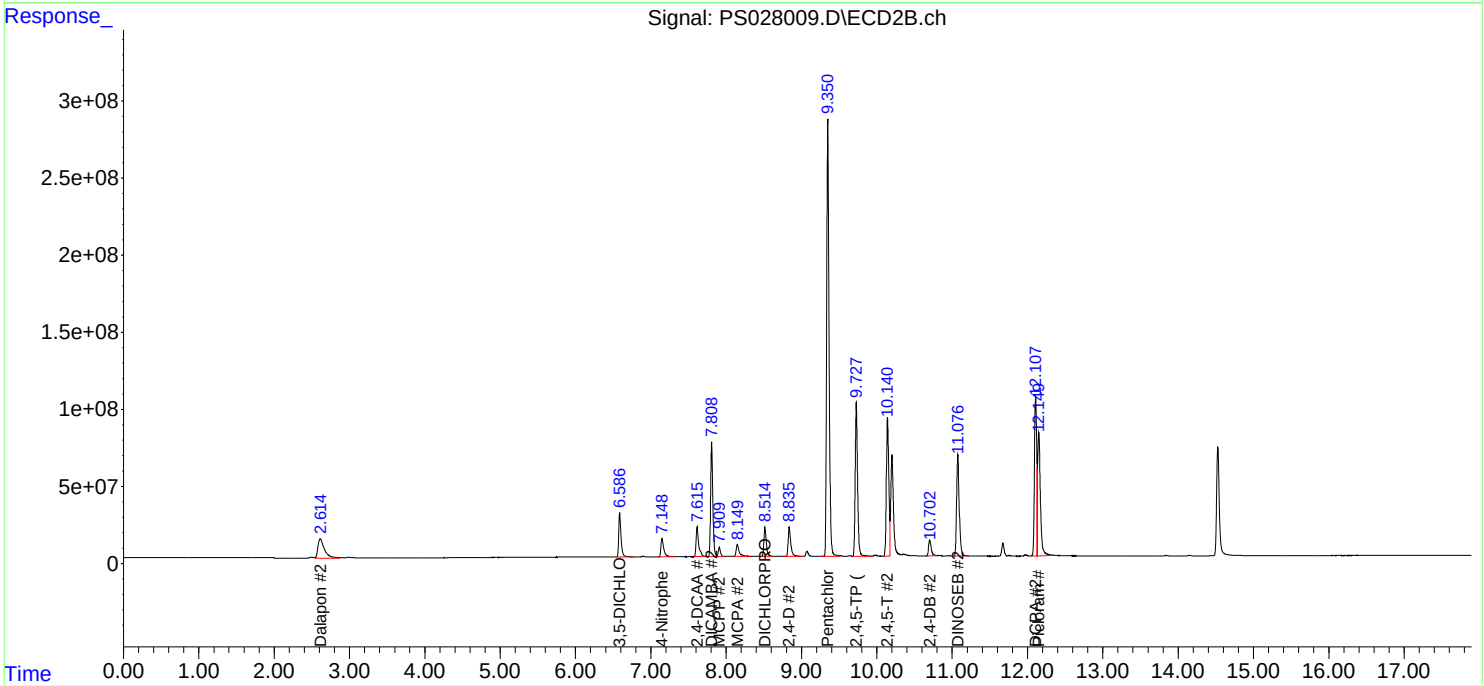
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028009.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 11:52
Operator : AR\AJ
Sample : HSTDICC500
Misc :
ALS Vial : 4 Sample Multiplier: 1

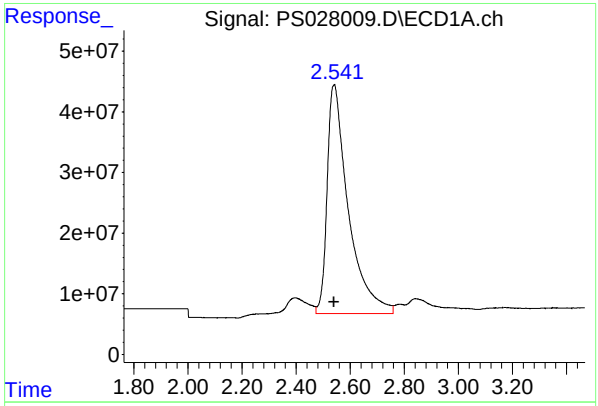
Instrument :
ECD_S
ClientSampleId :
HSTDICC500

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 12:42:30 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 12:40:27 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm



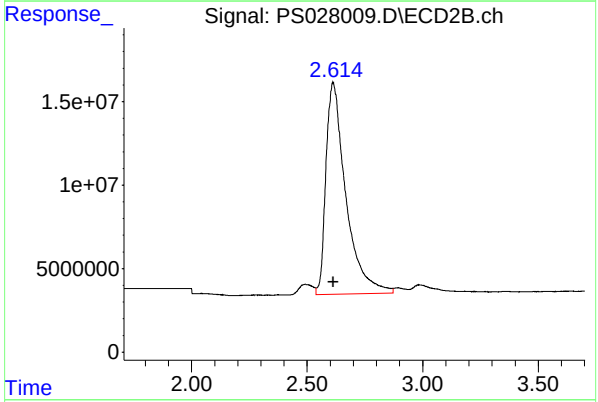




#1 Dalapon

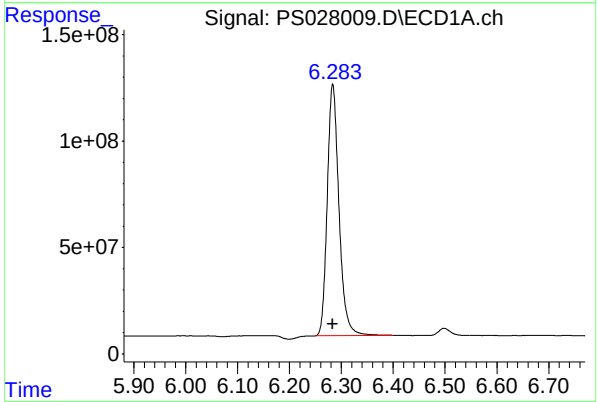
R.T.: 2.540 min
Delta R.T.: 0.000 min
Response: 2056544136
Conc: 472.25 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC500



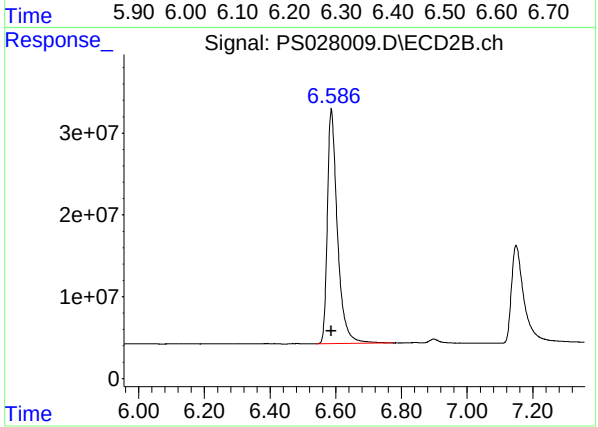
#1 Dalapon

R.T.: 2.613 min
Delta R.T.: 0.000 min
Response: 758162107
Conc: 458.20 ng/ml



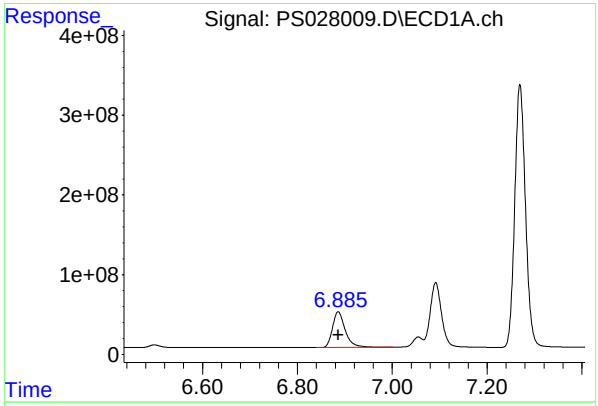
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.284 min
Delta R.T.: 0.000 min
Response: 1854755963
Conc: 482.80 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

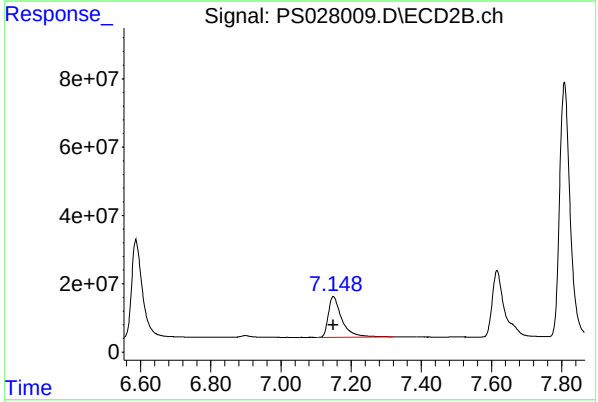
R.T.: 6.587 min
Delta R.T.: 0.000 min
Response: 609703376
Conc: 476.04 ng/ml



#3 4-Nitrophenol

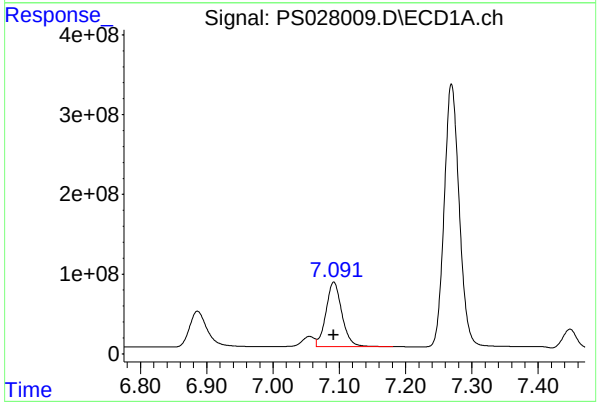
R.T.: 6.886 min
Delta R.T.: 0.000 min
Response: 837752166
Conc: 469.85 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC500



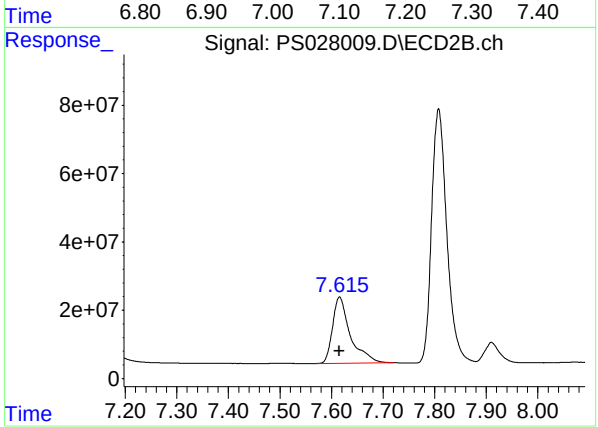
#3 4-Nitrophenol

R.T.: 7.149 min
Delta R.T.: 0.000 min
Response: 314150999
Conc: 464.95 ng/ml



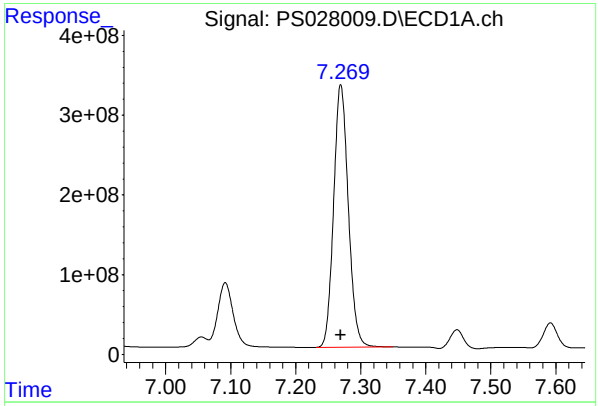
#4 2,4-DCAA

R.T.: 7.092 min
Delta R.T.: 0.000 min
Response: 1355952672
Conc: 515.48 ng/ml



#4 2,4-DCAA

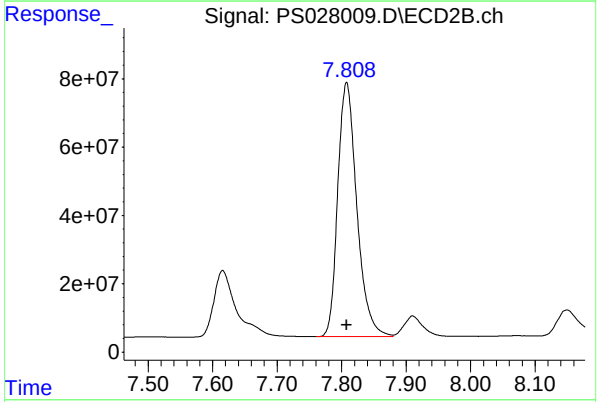
R.T.: 7.616 min
Delta R.T.: 0.000 min
Response: 464871340
Conc: 504.72 ng/ml



#5 DICAMBA

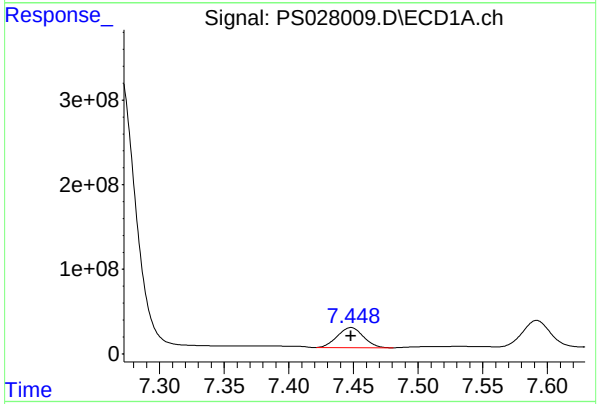
R.T.: 7.269 min
Delta R.T.: 0.000 min
Response: 5159504608
Conc: 481.59 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC500



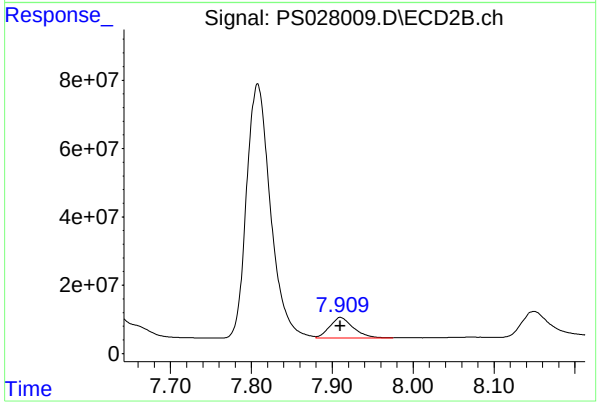
#5 DICAMBA

R.T.: 7.808 min
Delta R.T.: 0.000 min
Response: 1529079994
Conc: 473.59 ng/ml



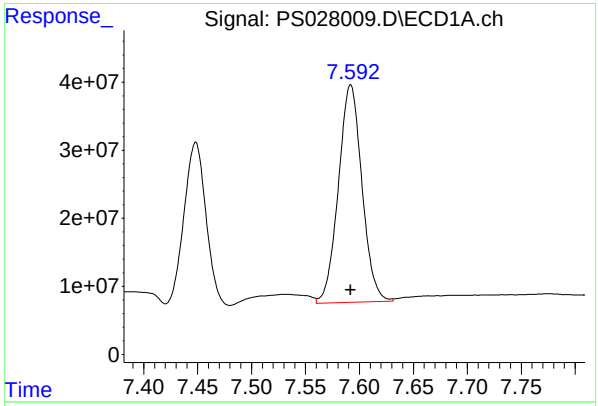
#6 MCPP

R.T.: 7.448 min
Delta R.T.: 0.000 min
Response: 333113493
Conc: 46.74 ug/ml



#6 MCPP

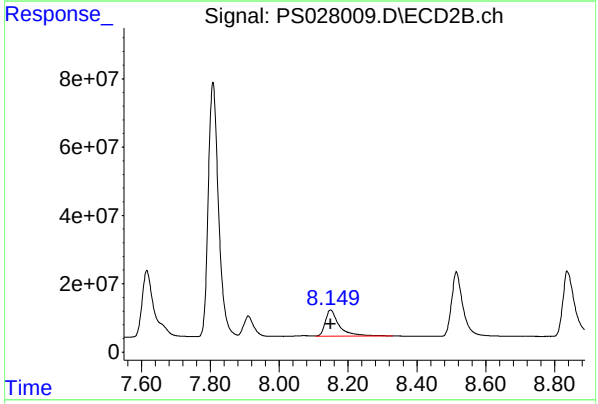
R.T.: 7.910 min
Delta R.T.: 0.000 min
Response: 121070776
Conc: 47.49 ug/ml



#7 MCPA

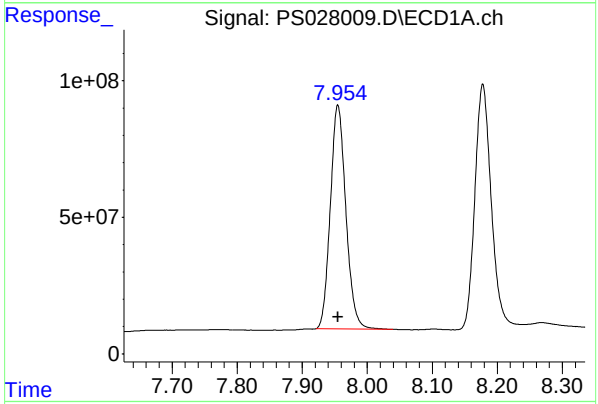
R.T.: 7.592 min
Delta R.T.: 0.000 min
Response: 485565967
Conc: 46.97 ug/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC500



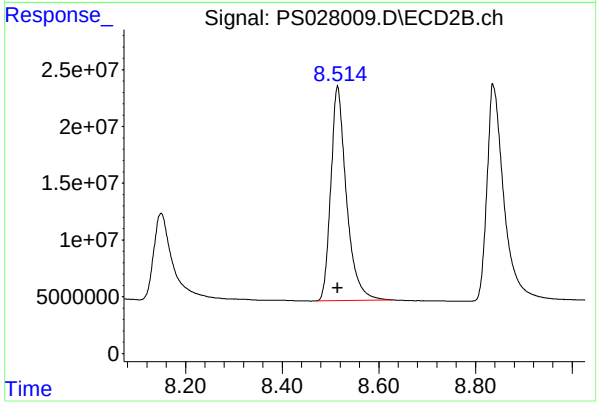
#7 MCPA

R.T.: 8.150 min
Delta R.T.: 0.000 min
Response: 214486723
Conc: 48.99 ug/ml



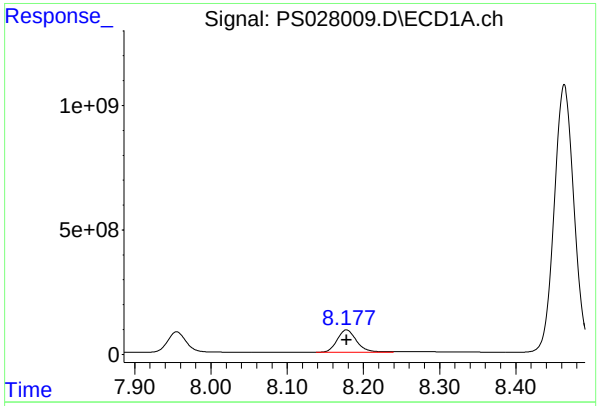
#8 DICHLORPROP

R.T.: 7.955 min
Delta R.T.: 0.000 min
Response: 1360666889
Conc: 486.61 ng/ml



#8 DICHLORPROP

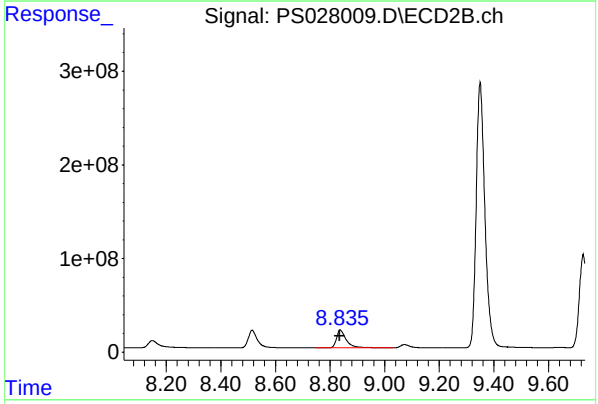
R.T.: 8.515 min
Delta R.T.: 0.000 min
Response: 423881273
Conc: 474.68 ng/ml



#9 2,4-D

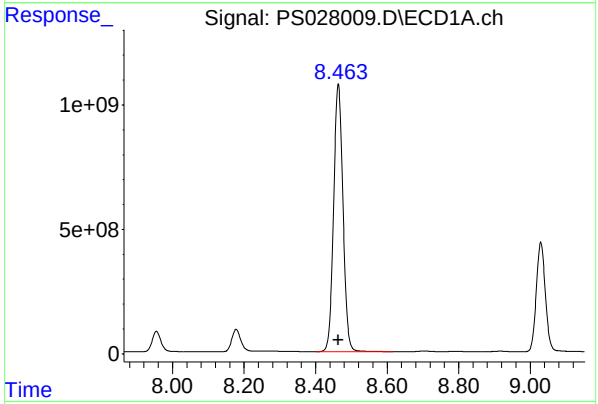
R.T.: 8.178 min
Delta R.T.: 0.000 min
Response: 1592773951
Conc: 484.66 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC500



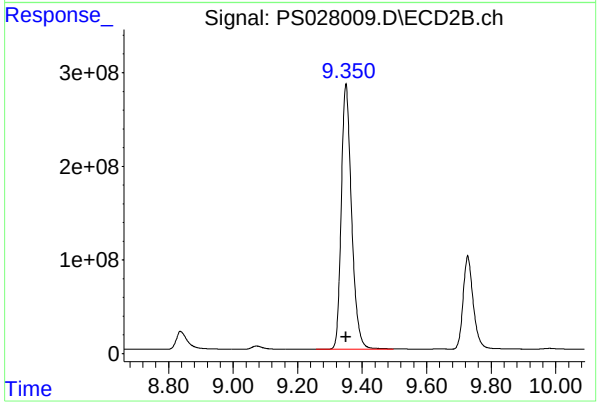
#9 2,4-D

R.T.: 8.836 min
Delta R.T.: 0.000 min
Response: 465321142
Conc: 477.40 ng/ml



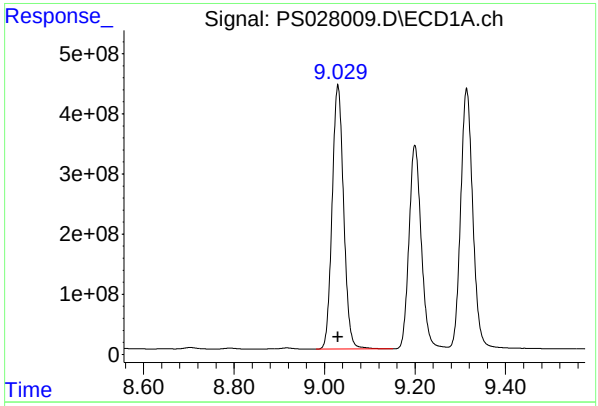
#10 Pentachlorophenol

R.T.: 8.463 min
Delta R.T.: 0.000 min
Response: 19514202026
Conc: 494.37 ng/ml



#10 Pentachlorophenol

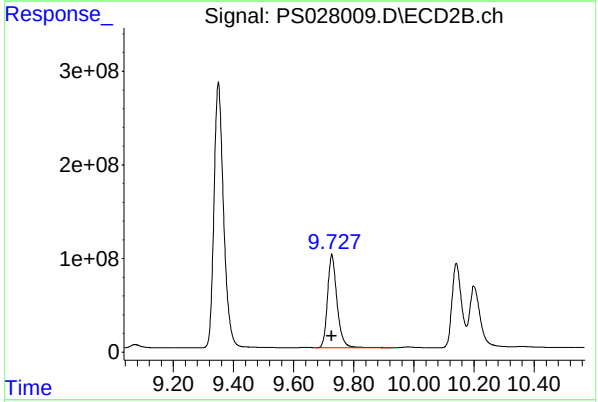
R.T.: 9.350 min
Delta R.T.: 0.000 min
Response: 6274960627
Conc: 491.87 ng/ml



#11 2,4,5-TP (SILVEX)

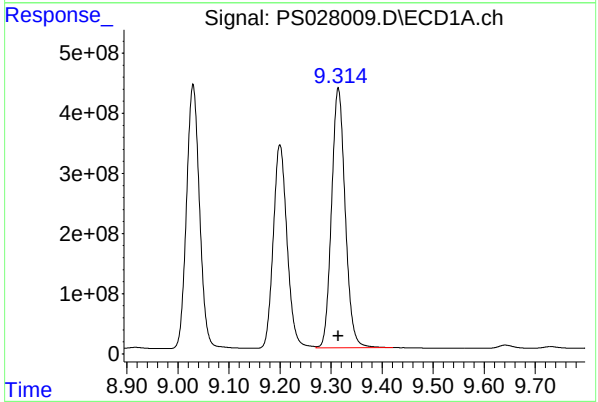
R.T.: 9.030 min
Delta R.T.: 0.000 min
Response: 7739154987
Conc: 489.02 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC500



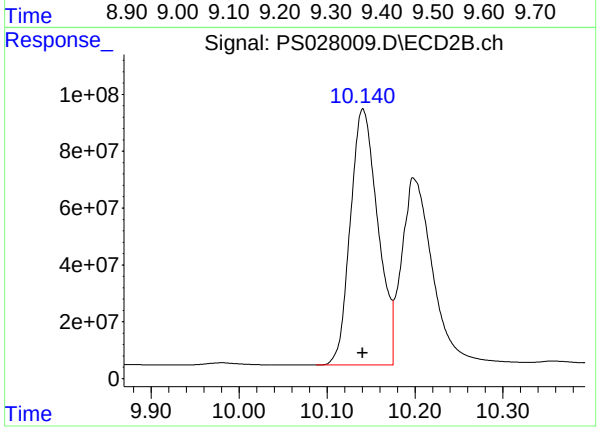
#11 2,4,5-TP (SILVEX)

R.T.: 9.727 min
Delta R.T.: 0.000 min
Response: 2178333060
Conc: 486.08 ng/ml



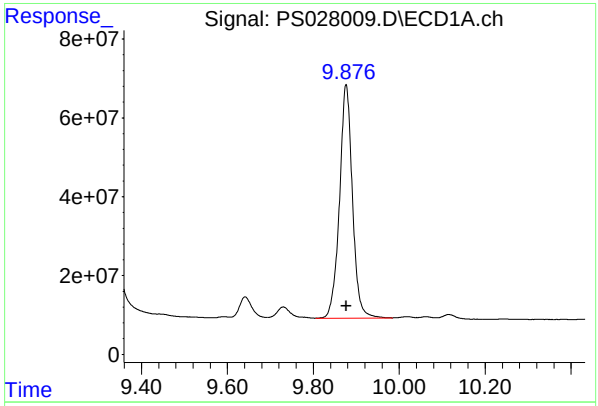
#12 2,4,5-T

R.T.: 9.314 min
Delta R.T.: 0.000 min
Response: 8004475584
Conc: 487.90 ng/ml



#12 2,4,5-T

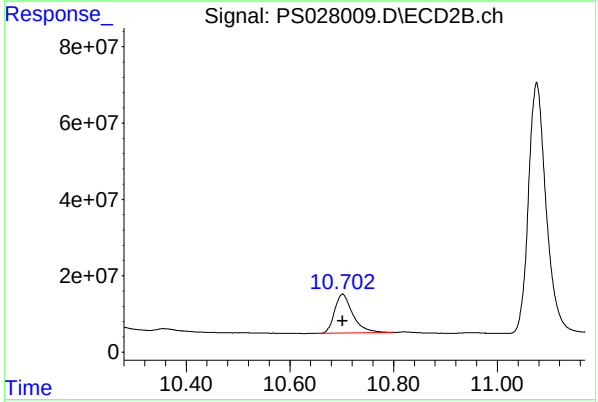
R.T.: 10.141 min
Delta R.T.: 0.000 min
Response: 1956393090
Conc: 480.66 ng/ml



#13 2,4-DB

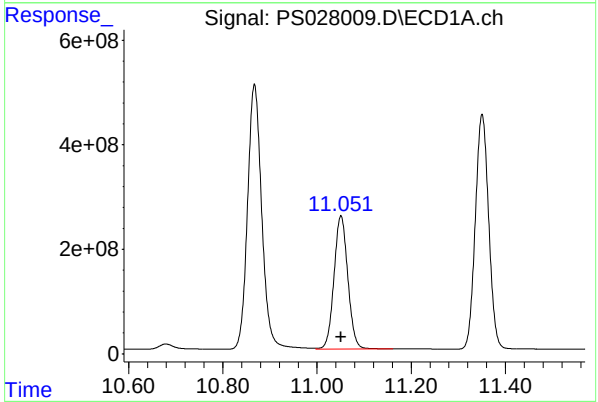
R.T.: 9.876 min
Delta R.T.: 0.000 min
Response: 1236612472
Conc: 485.41 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC500



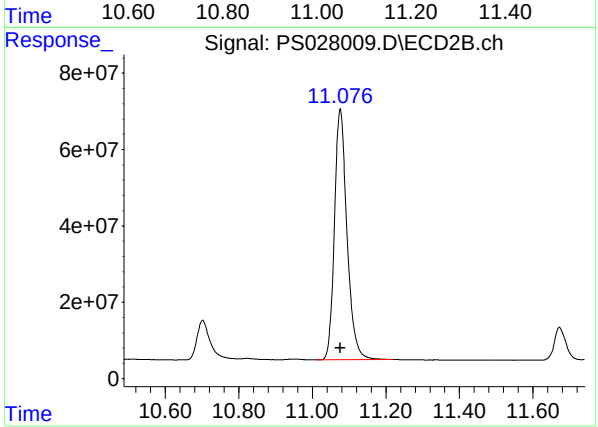
#13 2,4-DB

R.T.: 10.702 min
Delta R.T.: 0.000 min
Response: 248072160
Conc: 498.12 ng/ml



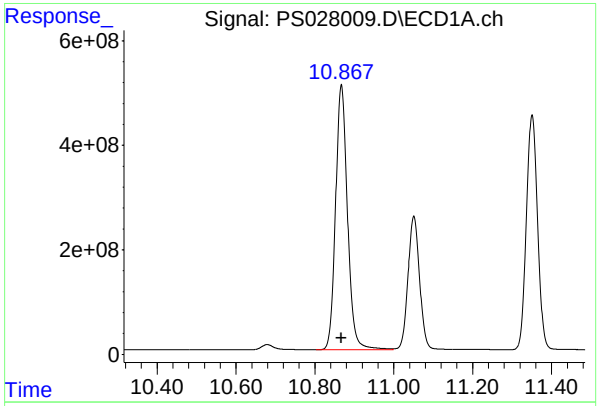
#14 DINOSEB

R.T.: 11.051 min
Delta R.T.: 0.000 min
Response: 5179301281
Conc: 484.31 ng/ml



#14 DINOSEB

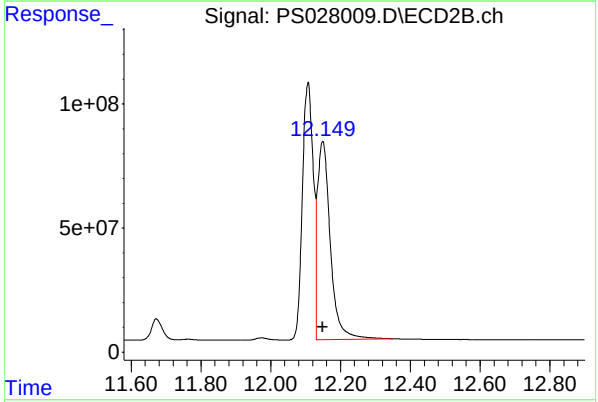
R.T.: 11.076 min
Delta R.T.: 0.000 min
Response: 1556093299
Conc: 470.29 ng/ml



#15 Picloram

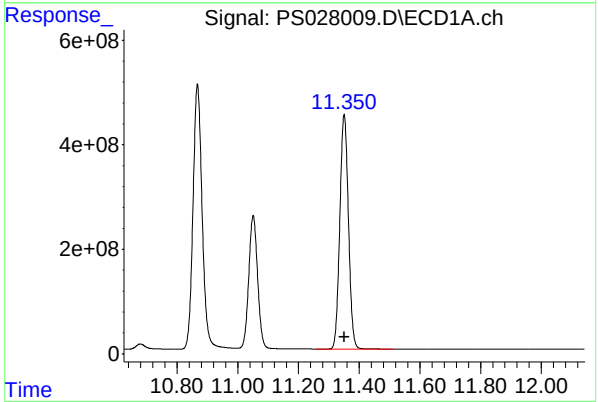
R.T.: 10.867 min
Delta R.T.: 0.000 min
Response: 10616086273
Conc: 489.11 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC500



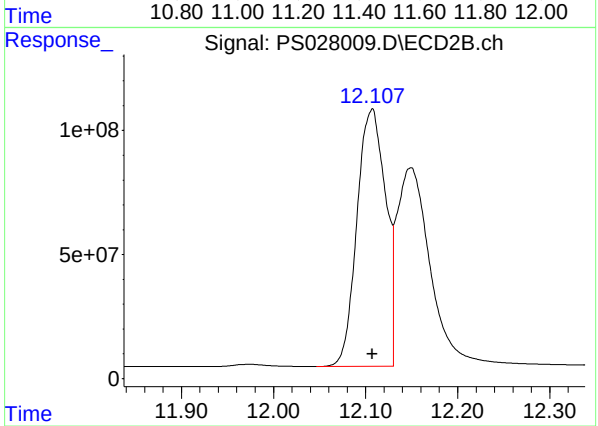
#15 Picloram

R.T.: 12.149 min
Delta R.T.: 0.000 min
Response: 2043695933
Conc: 460.82 ng/ml



#16 DCPA

R.T.: 11.351 min
Delta R.T.: 0.000 min
Response: 8832541756
Conc: 490.19 ng/ml



#16 DCPA

R.T.: 12.107 min
Delta R.T.: 0.000 min
Response: 2239260025
Conc: 479.53 ng/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028010.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 12:16
Operator : AR\AJ
Sample : HSTDICC750
Misc :
ALS Vial : 5 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
HSTDICC750

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 12:40:42 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 12:40:27 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.091	7.614	1911.8E6	684.3E6	750.000	750.000
	Target Compounds						
1) T	Dalapon	2.539	2.614	2859.5E6	1121.4E6	682.500	682.500
2) T	3,5-DICHL...	6.283	6.586	2576.9E6	872.1E6	697.500	697.500
3) T	4-Nitroph...	6.886	7.148	1177.2E6	451.1E6	682.500	682.500
5) T	DICAMBA	7.270	7.808	7366.7E6	2258.9E6	705.000	705.000
6) T	MCPP	7.449	7.912	505.2E6	177.8E6	70.500	70.500
7) T	MCPA	7.594	8.151	713.8E6	289.0E6	69.750	69.750
8) T	DICHLORPROP	7.955	8.514	1901.7E6	623.3E6	705.000	705.000
9) T	2,4-D	8.177	8.837	2244.6E6	676.3E6	705.000	705.000
10) T	Pentachlo...	8.463	9.348	26978.0E6	8766.9E6	712.500	712.500
11) T	2,4,5-TP ...	9.029	9.725	10943.1E6	3118.5E6	712.500	712.500
12) T	2,4,5-T	9.314	10.140	11371.6E6	2865.5E6	712.500	712.500
13) T	2,4-DB	9.876	10.701	1775.4E6	337.6E6	712.500	712.500
14) T	DINOSEB	11.051	11.075	7310.0E6	2331.3E6	705.000	705.000
15) T	Picloram	10.867	12.148	15005.3E6	3254.2E6	712.500	712.500
16) T	DCPA	11.350	12.107	12698.1E6	3365.5E6	720.000	720.000

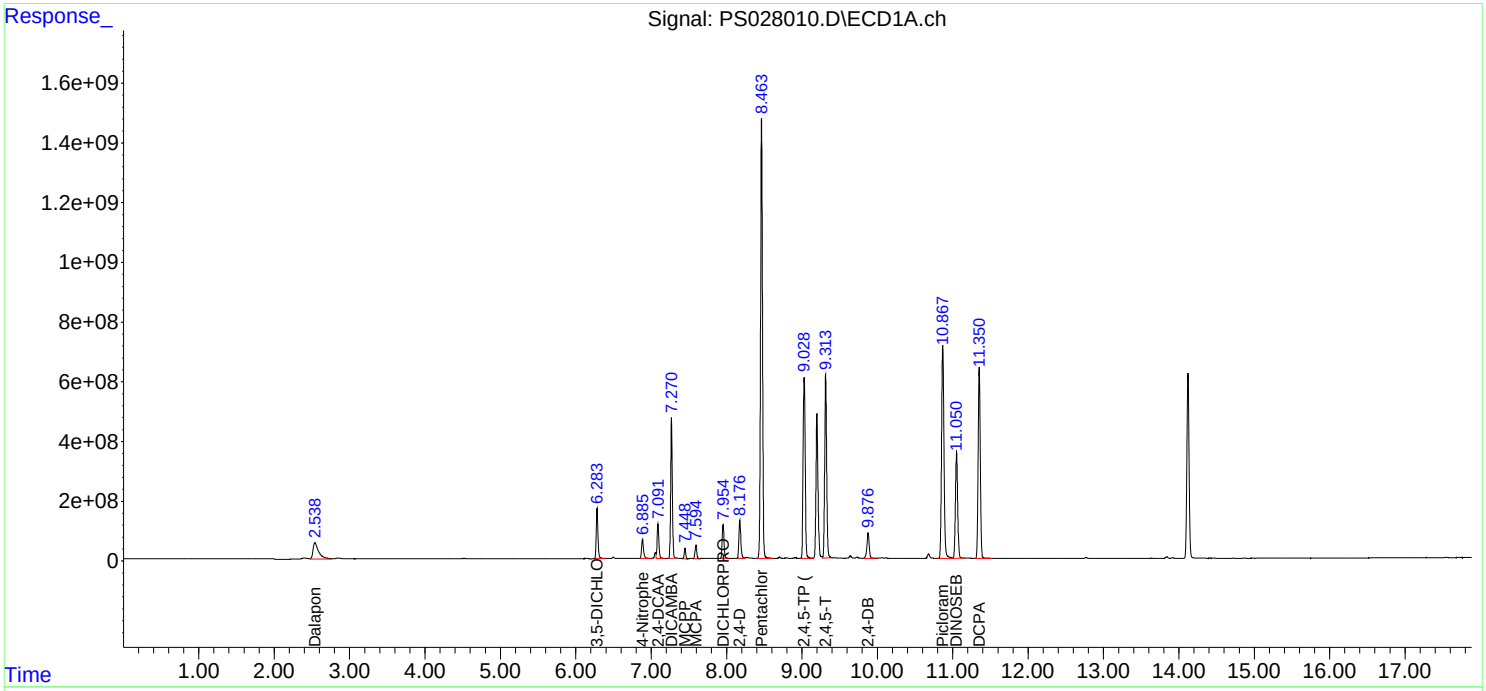
(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

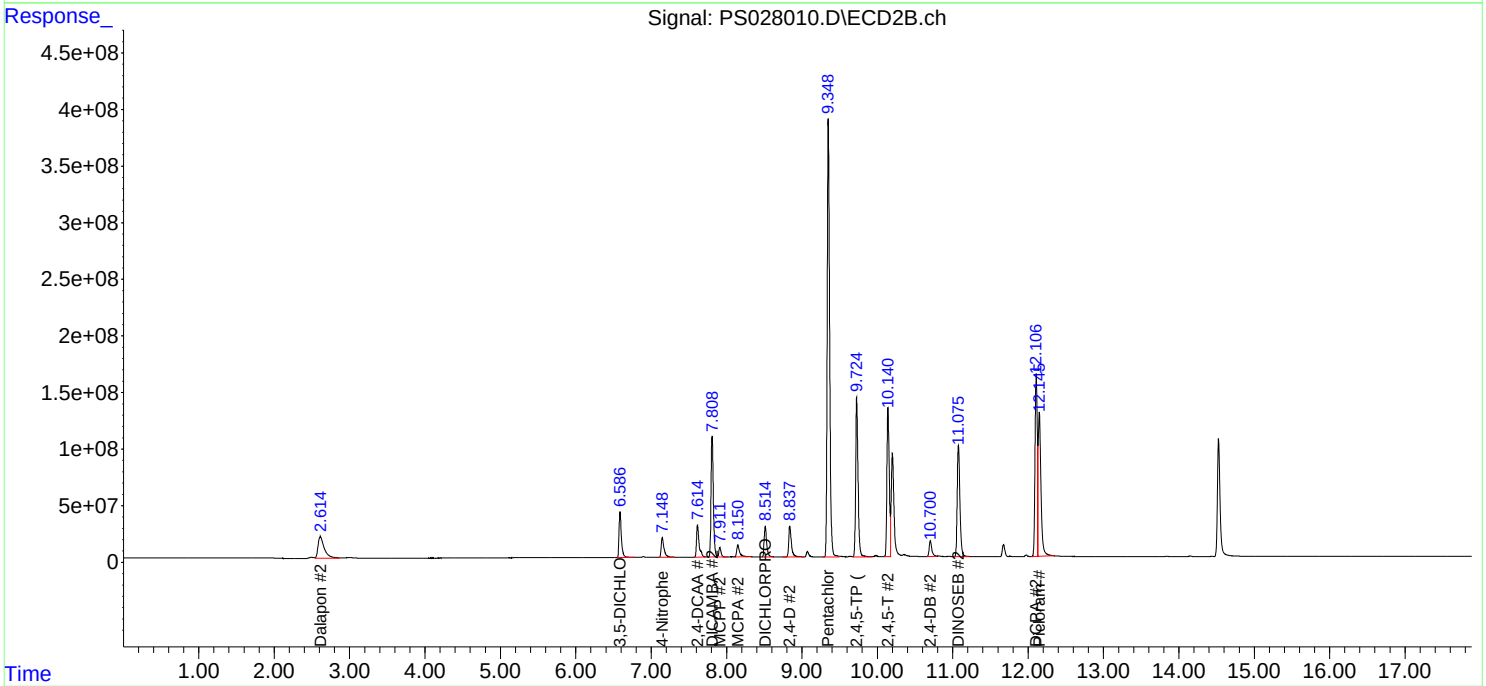
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028010.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 12:16
Operator : AR\AJ
Sample : HSTDICC750
Misc :
ALS Vial : 5 Sample Multiplier: 1

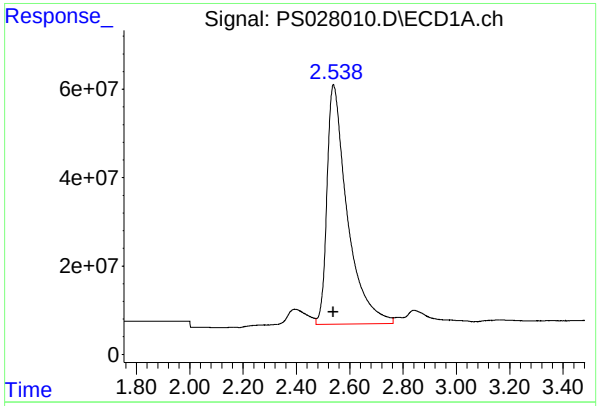
Instrument :
ECD_S
ClientSampleId :
HSTDICC750

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 12:40:42 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 12:40:27 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm



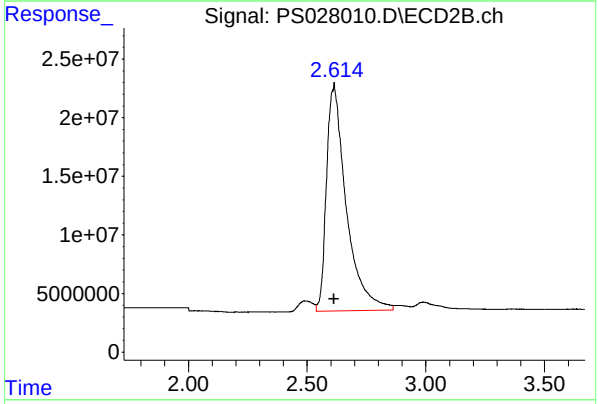




#1 Dalapon

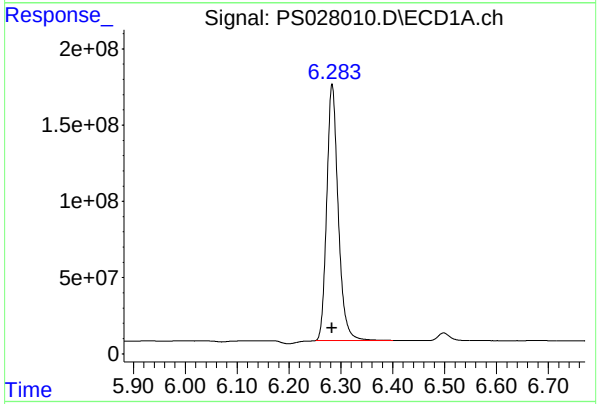
R.T.: 2.539 min
Delta R.T.: 0.000 min
Response: 2859476450
Conc: 682.50 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC750



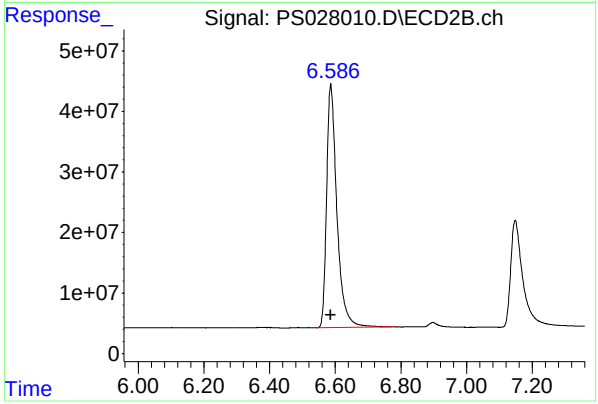
#1 Dalapon

R.T.: 2.614 min
Delta R.T.: 0.000 min
Response: 1121374912
Conc: 682.50 ng/ml



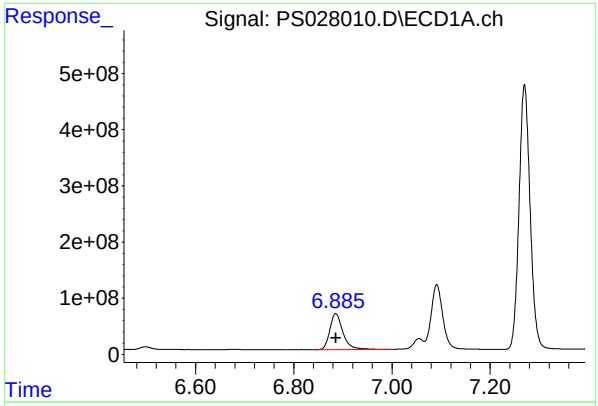
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.283 min
Delta R.T.: 0.000 min
Response: 2576948655
Conc: 697.50 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

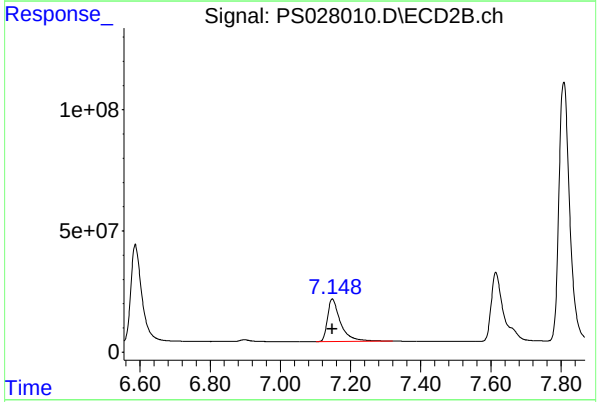
R.T.: 6.586 min
Delta R.T.: 0.000 min
Response: 872122945
Conc: 697.50 ng/ml



#3 4-Nitrophenol

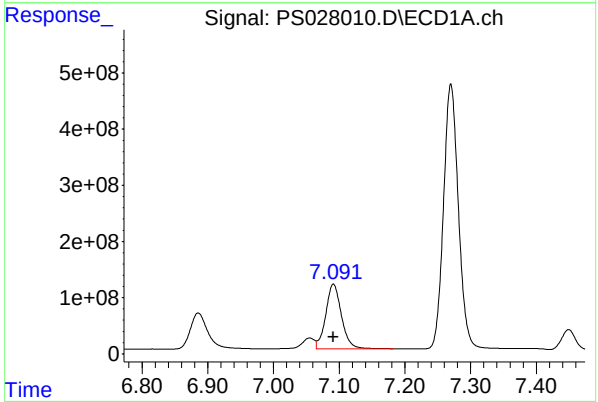
R.T.: 6.886 min
Delta R.T.: 0.000 min
Response: 1177213085
Conc: 682.50 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC750



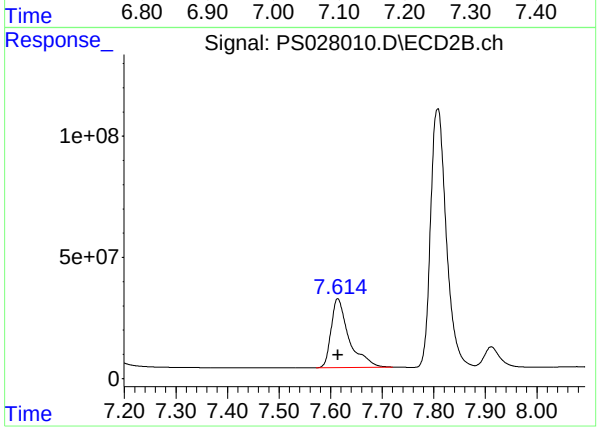
#3 4-Nitrophenol

R.T.: 7.148 min
Delta R.T.: 0.000 min
Response: 451067221
Conc: 682.50 ng/ml



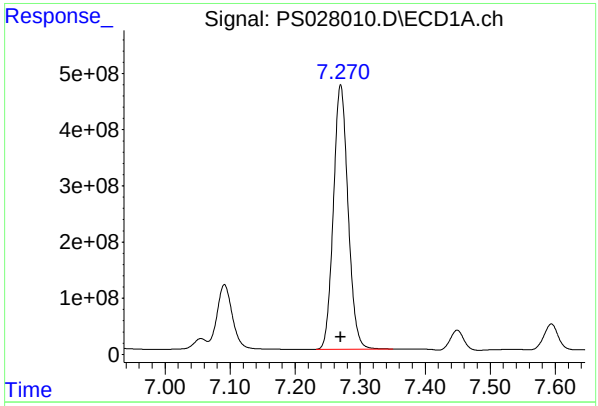
#4 2,4-DCAA

R.T.: 7.091 min
Delta R.T.: 0.000 min
Response: 1911801007
Conc: 750.00 ng/ml



#4 2,4-DCAA

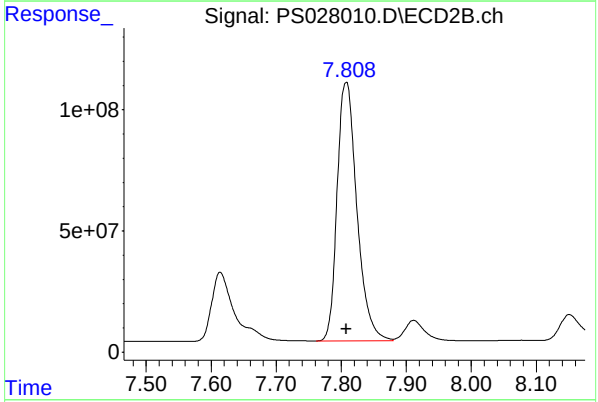
R.T.: 7.614 min
Delta R.T.: 0.000 min
Response: 684259091
Conc: 750.00 ng/ml



#5 DICAMBA

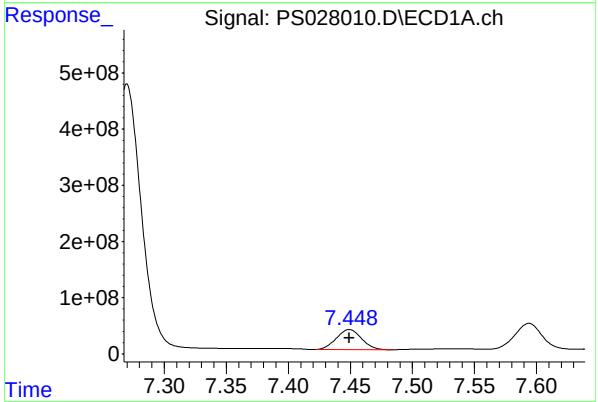
R.T.: 7.270 min
Delta R.T.: 0.000 min
Response: 7366748268
Conc: 705.00 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC750



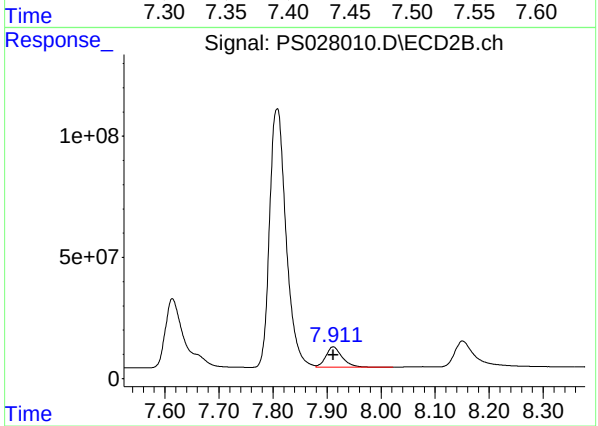
#5 DICAMBA

R.T.: 7.808 min
Delta R.T.: 0.000 min
Response: 2258872698
Conc: 705.00 ng/ml



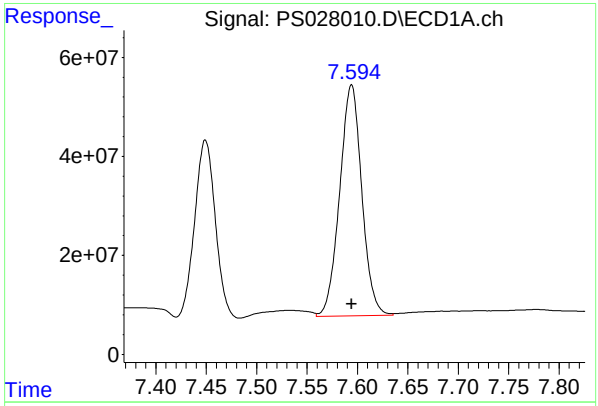
#6 MCPP

R.T.: 7.449 min
Delta R.T.: 0.000 min
Response: 505216518
Conc: 70.50 ug/ml



#6 MCPP

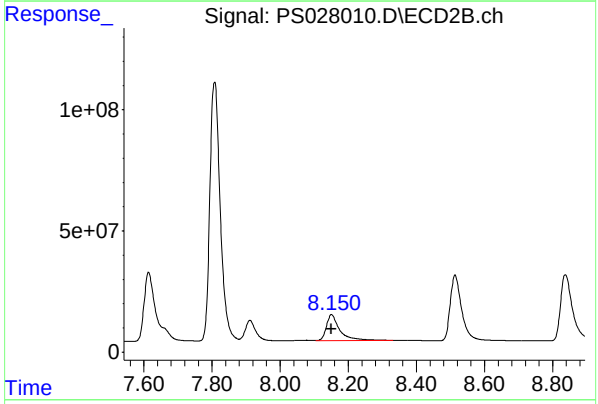
R.T.: 7.912 min
Delta R.T.: 0.000 min
Response: 177847004
Conc: 70.50 ug/ml



#7 MCPA

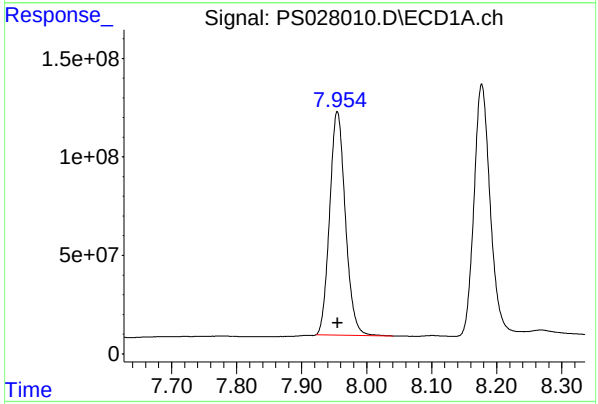
R.T.: 7.594 min
Delta R.T.: 0.000 min
Response: 713839334
Conc: 69.75 ug/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC750



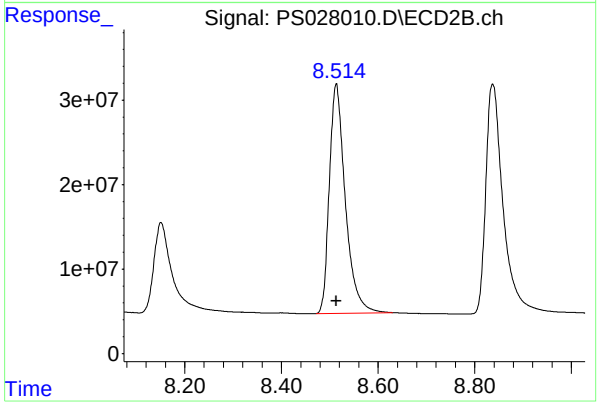
#7 MCPA

R.T.: 8.151 min
Delta R.T.: 0.000 min
Response: 288983847
Conc: 69.75 ug/ml



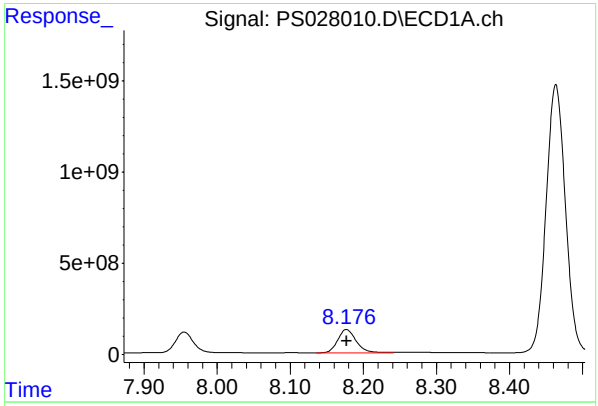
#8 DICHLORPROP

R.T.: 7.955 min
Delta R.T.: 0.000 min
Response: 1901672661
Conc: 705.00 ng/ml



#8 DICHLORPROP

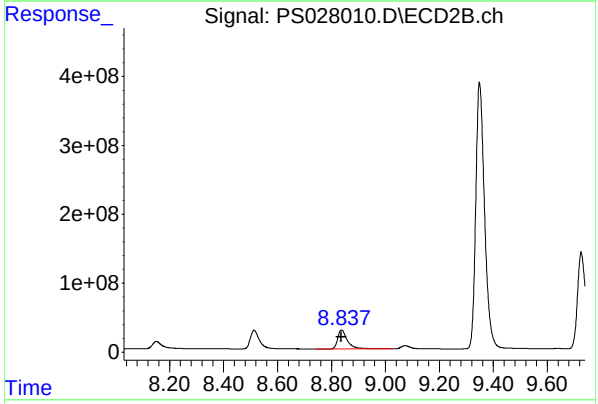
R.T.: 8.514 min
Delta R.T.: 0.000 min
Response: 623275586
Conc: 705.00 ng/ml



#9 2,4-D

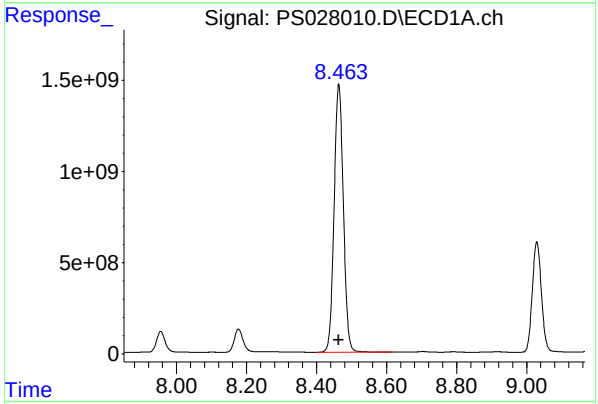
R.T.: 8.177 min
Delta R.T.: 0.000 min
Response: 2244639243
Conc: 705.00 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC750



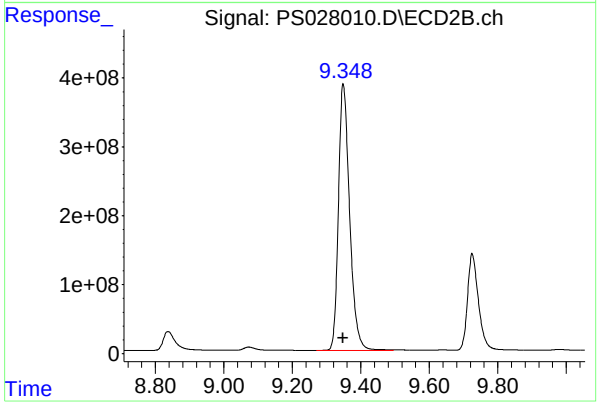
#9 2,4-D

R.T.: 8.837 min
Delta R.T.: 0.000 min
Response: 676337085
Conc: 705.00 ng/ml



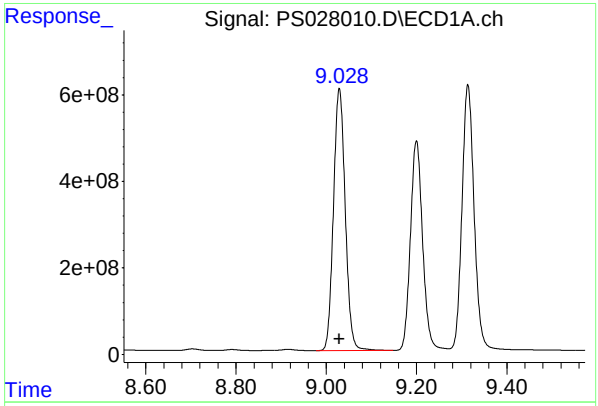
#10 Pentachlorophenol

R.T.: 8.463 min
Delta R.T.: 0.000 min
Response: 26978029754
Conc: 712.50 ng/ml



#10 Pentachlorophenol

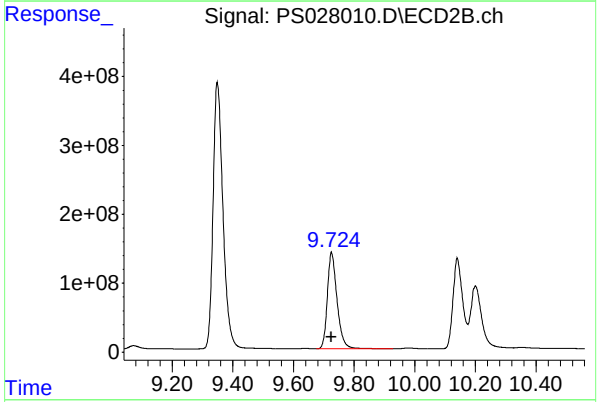
R.T.: 9.348 min
Delta R.T.: 0.000 min
Response: 8766902290
Conc: 712.50 ng/ml



#11 2,4,5-TP (SILVEX)

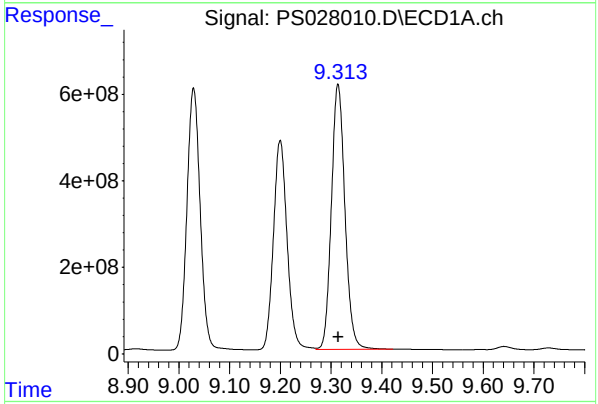
R.T.: 9.029 min
Delta R.T.: 0.000 min
Response: 10943120362
Conc: 712.50 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC750



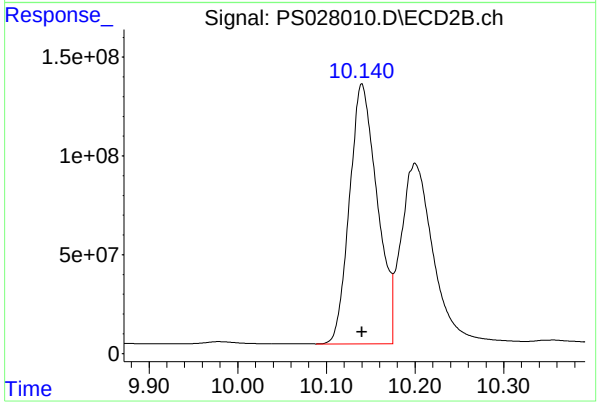
#11 2,4,5-TP (SILVEX)

R.T.: 9.725 min
Delta R.T.: 0.000 min
Response: 3118496903
Conc: 712.50 ng/ml



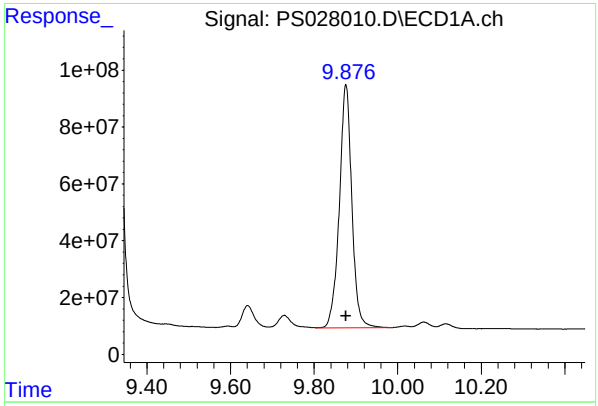
#12 2,4,5-T

R.T.: 9.314 min
Delta R.T.: 0.000 min
Response: 11371601181
Conc: 712.50 ng/ml



#12 2,4,5-T

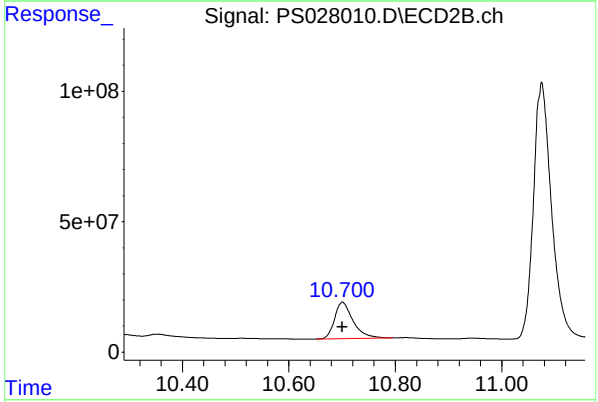
R.T.: 10.140 min
Delta R.T.: 0.000 min
Response: 2865469589
Conc: 712.50 ng/ml



#13 2,4-DB

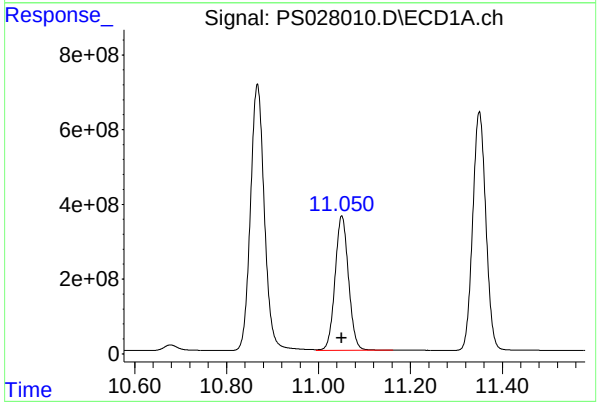
R.T.: 9.876 min
Delta R.T.: 0.000 min
Response: 1775350604
Conc: 712.50 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC750



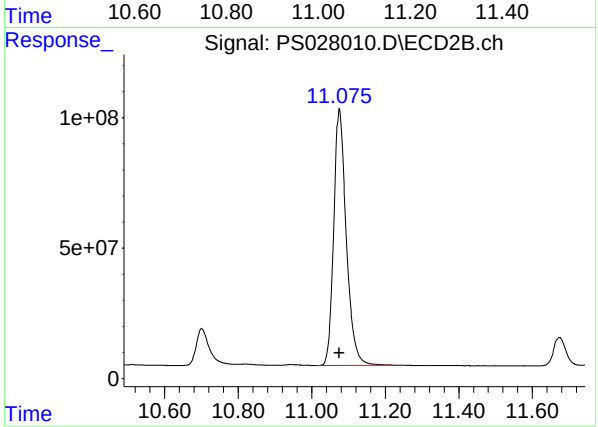
#13 2,4-DB

R.T.: 10.701 min
Delta R.T.: 0.000 min
Response: 337563867
Conc: 712.50 ng/ml



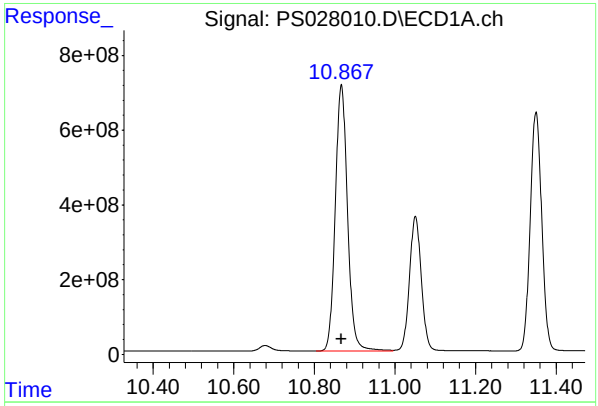
#14 DINOSEB

R.T.: 11.051 min
Delta R.T.: 0.000 min
Response: 7309966303
Conc: 705.00 ng/ml



#14 DINOSEB

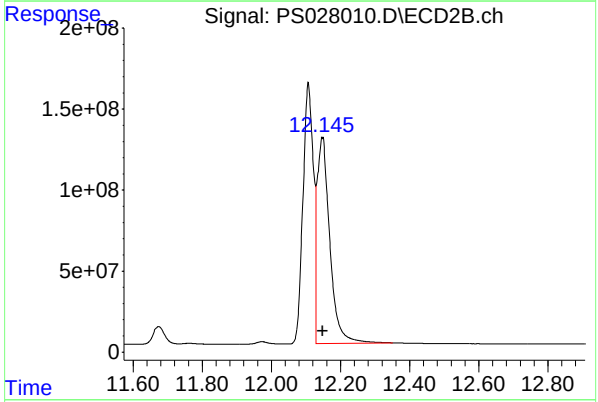
R.T.: 11.075 min
Delta R.T.: 0.000 min
Response: 2331264120
Conc: 705.00 ng/ml



#15 Picloram

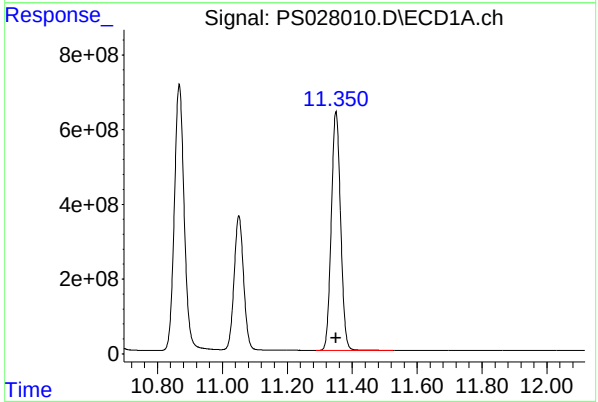
R.T.: 10.867 min
Delta R.T.: 0.000 min
Response: 15005285314
Conc: 712.50 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC750



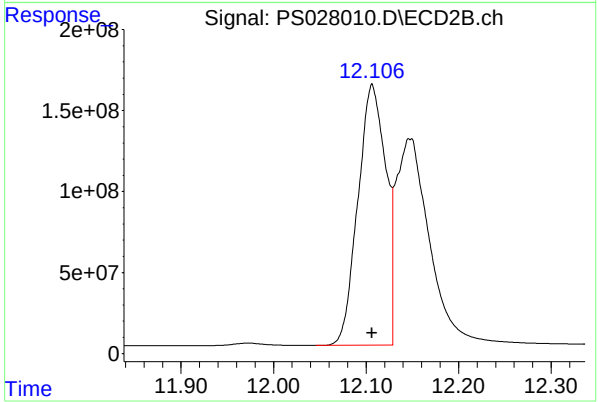
#15 Picloram

R.T.: 12.148 min
Delta R.T.: 0.000 min
Response: 3254152913
Conc: 712.50 ng/ml



#16 DCPA

R.T.: 11.350 min
Delta R.T.: 0.000 min
Response: 12698069366
Conc: 720.00 ng/ml



#16 DCPA

R.T.: 12.107 min
Delta R.T.: 0.000 min
Response: 3365538876
Conc: 720.00 ng/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028011.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 12:40
Operator : AR\AJ
Sample : HSTDICC1000
Misc :
ALS Vial : 6 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
HSTDICC1000

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 13:01:00 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:00:51 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.091	7.615	2475.6E6	889.6E6	887.954m	916.953
	Target Compounds						
1) T	Dalapon	2.540	2.618	3945.2E6	1529.9E6	847.927	901.668
2) T	3,5-DICHL...	6.283	6.586	3428.2E6	1165.0E6	842.087	860.358
3) T	4-Nitroph...	6.886	7.147	1578.4E6	571.4E6	832.283	796.925
5) T	DICAMBA	7.270	7.807	9790.7E6	3216.8E6	874.773	960.752
6) T	MCPP	7.451	7.913	713.2E6	254.0E6	98.584	98.830
7) T	MCPA	7.596	8.153	964.1E6	394.8E6	90.272	81.189
8) T	DICHLORPROP	7.955	8.512	2530.0E6	843.2E6	854.364	884.711
9) T	2,4-D	8.177	8.838	3001.0E6	908.6E6	863.210	899.309
10) T	Pentachlo...	8.464	9.348	34721.9E6	12305.5E6	836.669	943.483
11) T	2,4,5-TP ...	9.029	9.726	14523.1E6	4365.7E6	873.267	962.992
12) T	2,4,5-T	9.314	10.139	14963.1E6	3810.9E6	869.302	929.998
13) T	2,4-DB	9.876	10.700	2383.1E6	439.6E6	888.517	857.406
14) T	DINOSEB	11.051	11.075	9692.8E6	3073.9E6	854.237	893.958
15) T	Picloram	10.867	12.151	20142.9E6	4581.3E6	881.934	1028.558
16) T	DCPA	11.351	12.106	16624.8E6	4257.6E6	870.283	911.822

(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028011.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 12:40
Operator : AR\AJ
Sample : HSTDICC1000
Misc :
ALS Vial : 6 Sample Multiplier: 1

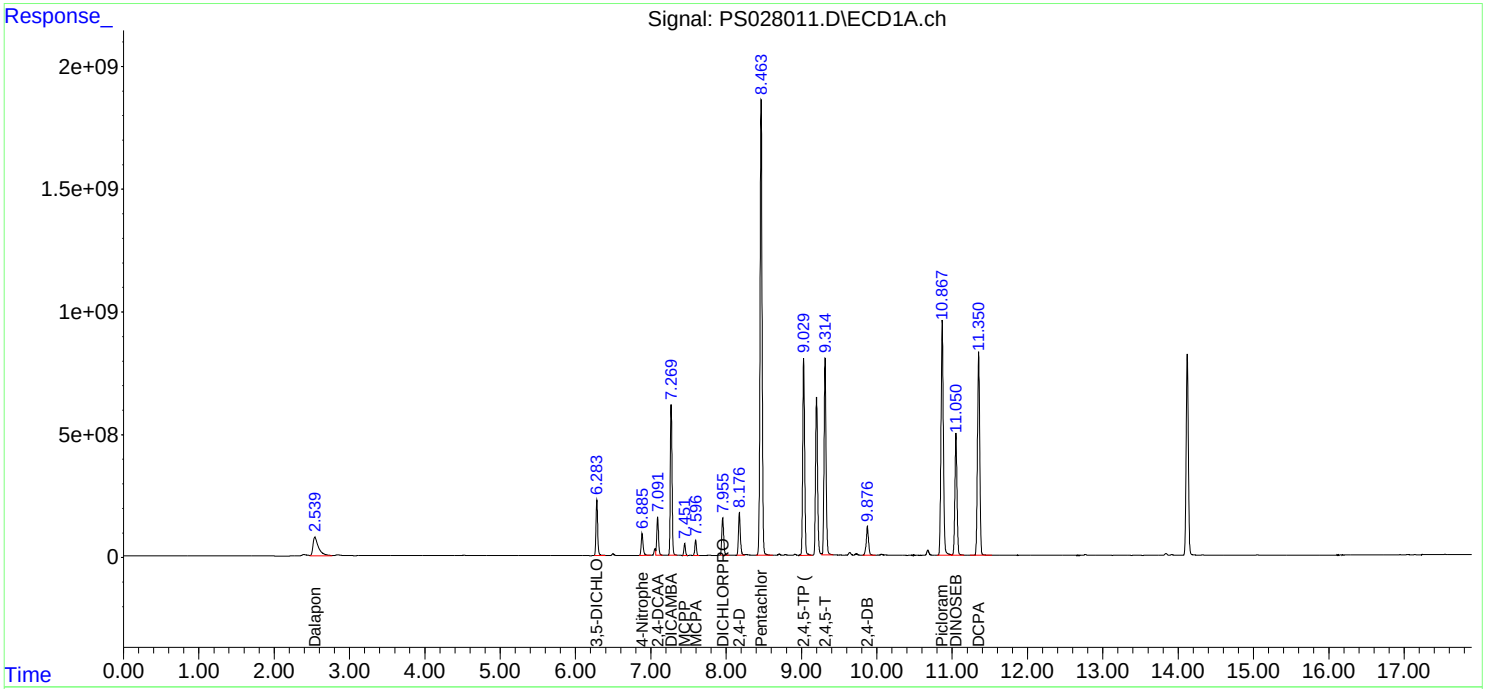
Instrument :
ECD_S
ClientSampleId :
HSTDICC1000

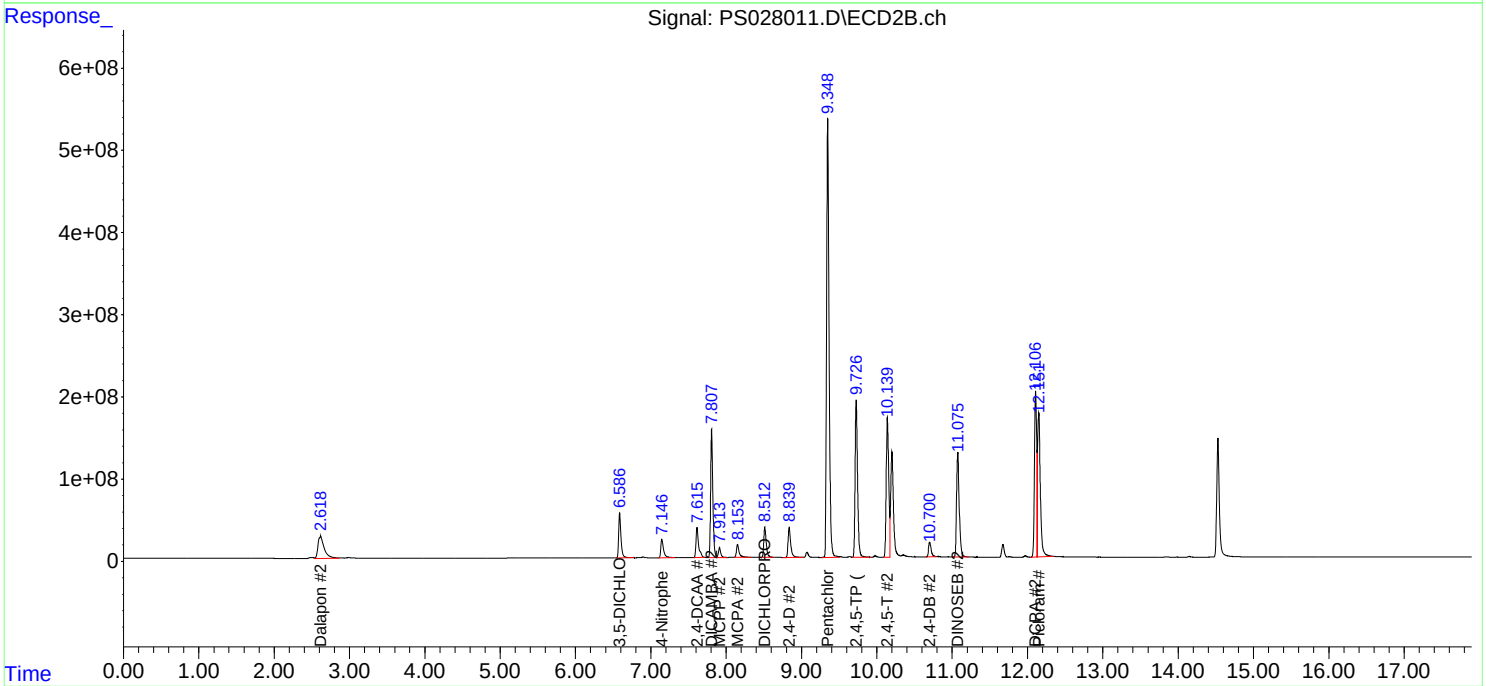
Manual Integrations APPROVED

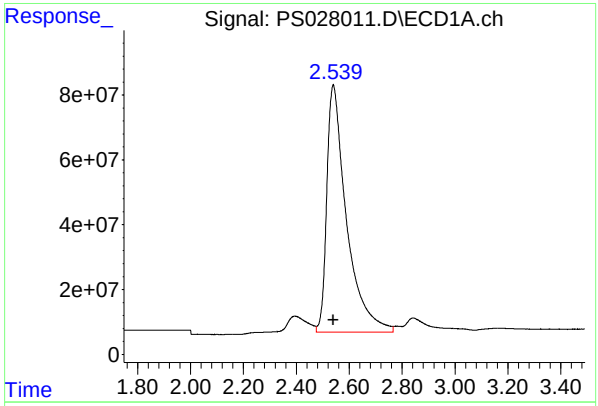
Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 13:01:00 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:00:51 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm







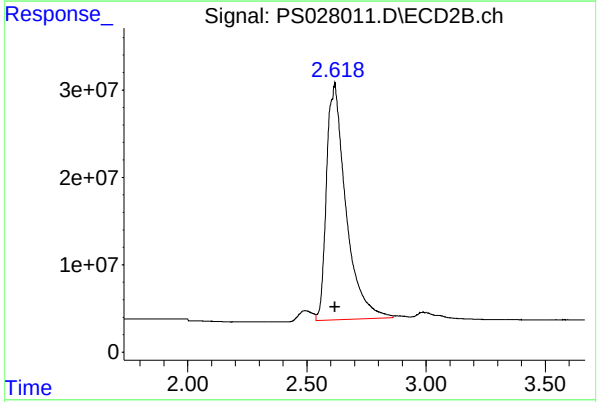
#1 Dalapon

R.T.: 2.540 min
Delta R.T.: 0.000 min
Response: 3945226296
Conc: 847.93 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1000

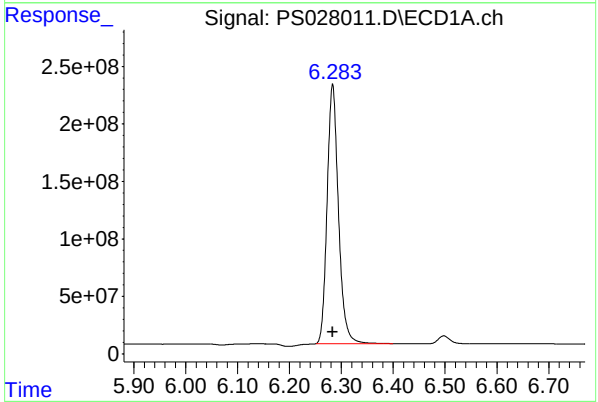
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



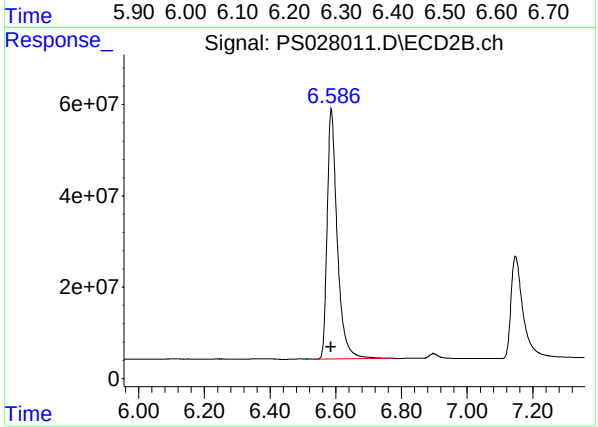
#1 Dalapon

R.T.: 2.618 min
Delta R.T.: 0.000 min
Response: 1529940783
Conc: 901.67 ng/ml



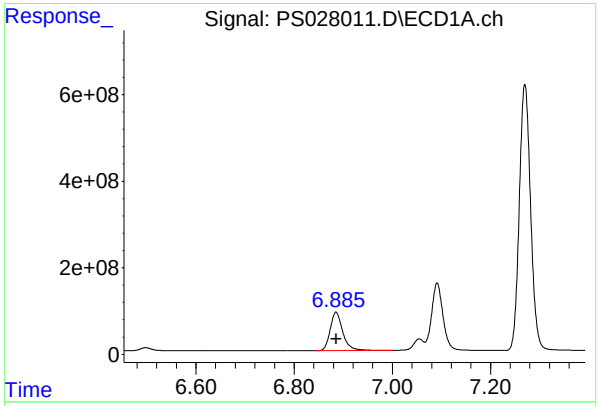
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.283 min
Delta R.T.: 0.000 min
Response: 3428171979
Conc: 842.09 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.586 min
Delta R.T.: 0.000 min
Response: 1164995358
Conc: 860.36 ng/ml



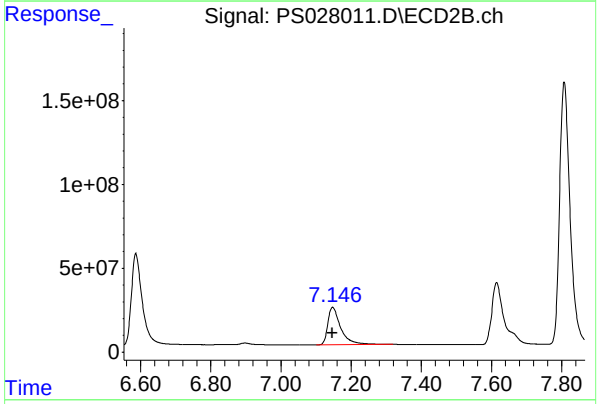
#3 4-Nitrophenol

R.T.: 6.886 min
Delta R.T.: 0.000 mi
Response: 1578426624
Conc: 832.28 ng/m

Instrument :
ECD_S
ClientSampleId :
HSTDICC1000

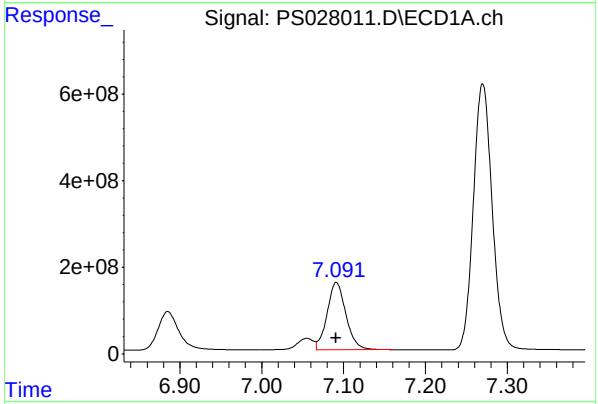
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



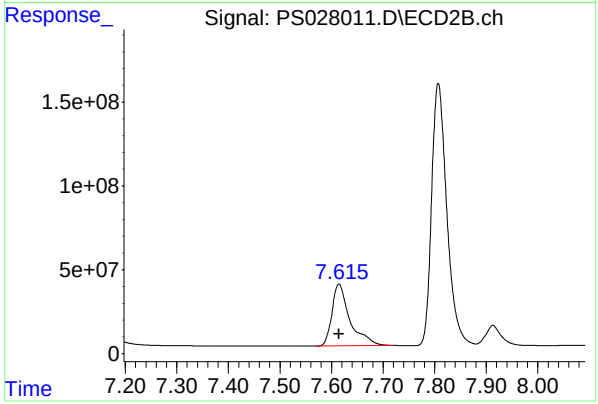
#3 4-Nitrophenol

R.T.: 7.147 min
Delta R.T.: 0.000 min
Response: 571404392
Conc: 796.93 ng/ml



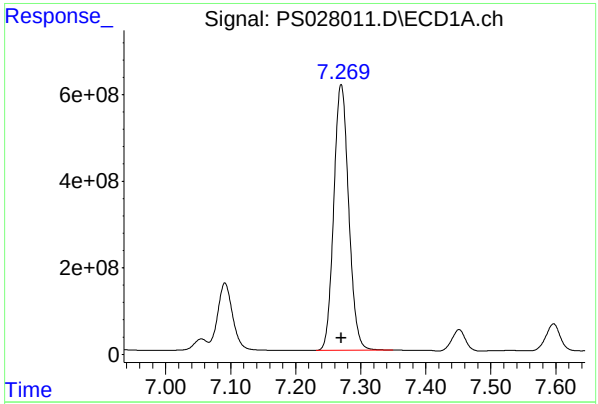
#4 2,4-DCAA

R.T.: 7.091 min
Delta R.T.: 0.000 min
Response: 2475612195
Conc: 887.95 ng/ml m



#4 2,4-DCAA

R.T.: 7.615 min
Delta R.T.: 0.000 min
Response: 889645476
Conc: 916.95 ng/ml



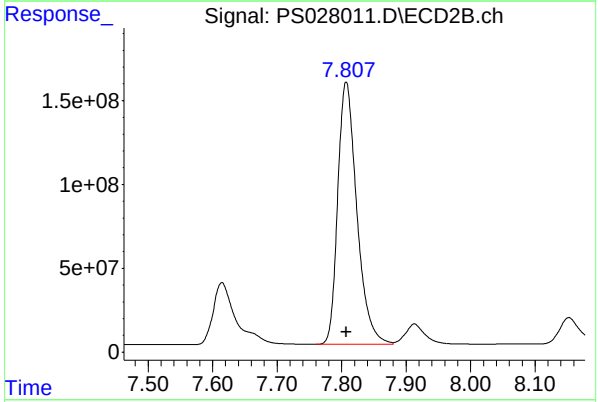
#5 DICAMBA

R.T.: 7.270 min
Delta R.T.: 0.000 min
Response: 9790723073
Conc: 874.77 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1000

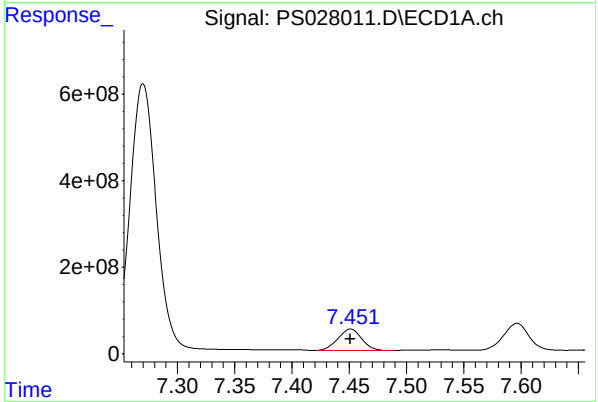
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



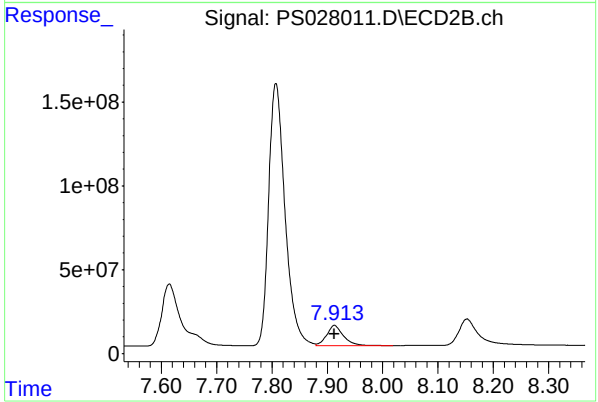
#5 DICAMBA

R.T.: 7.807 min
Delta R.T.: 0.000 min
Response: 3216809384
Conc: 960.75 ng/ml



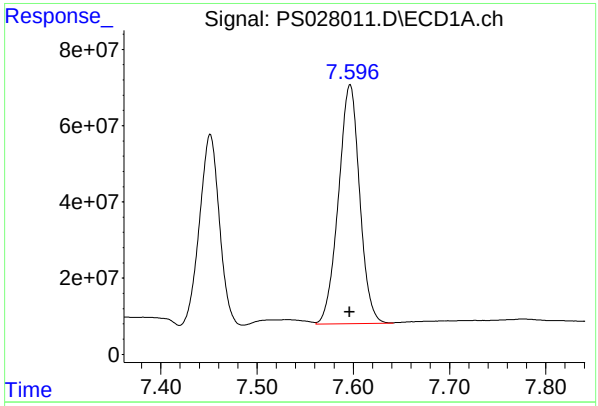
#6 MCPP

R.T.: 7.451 min
Delta R.T.: 0.000 min
Response: 713153779
Conc: 98.58 ug/ml



#6 MCPP

R.T.: 7.913 min
Delta R.T.: 0.000 min
Response: 254017787
Conc: 98.83 ug/ml



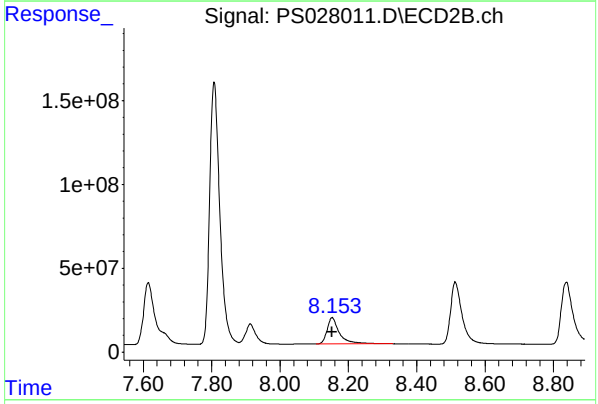
#7 MCPA

R.T.: 7.596 min
Delta R.T.: 0.000 min
Response: 964110105
Conc: 90.27 ug/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1000

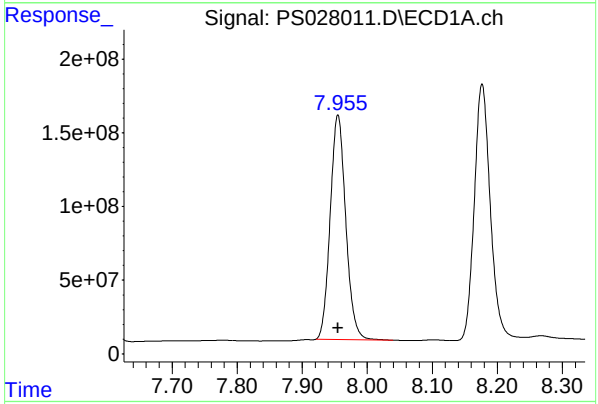
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



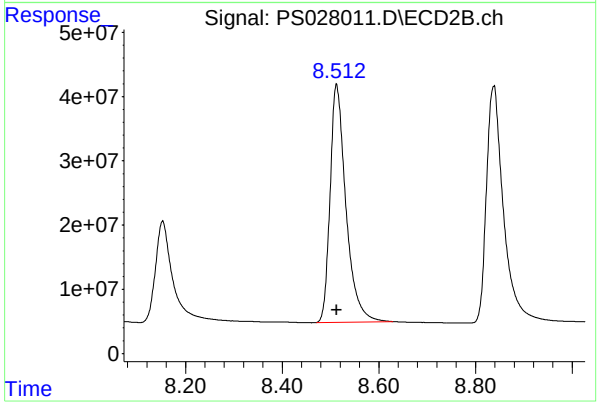
#7 MCPA

R.T.: 8.153 min
Delta R.T.: 0.000 min
Response: 394771120
Conc: 81.19 ug/ml



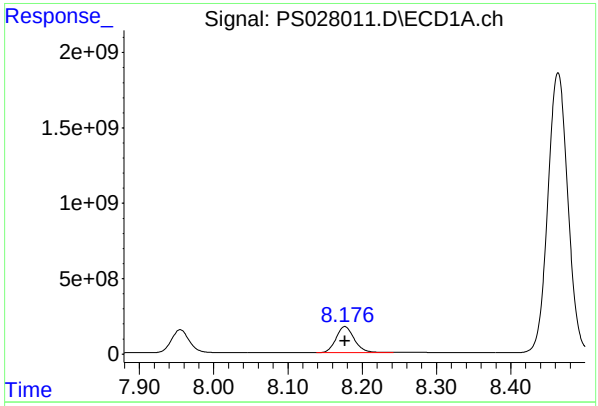
#8 DICHLORPROP

R.T.: 7.955 min
Delta R.T.: 0.000 min
Response: 2530040993
Conc: 854.36 ng/ml



#8 DICHLORPROP

R.T.: 8.512 min
Delta R.T.: 0.000 min
Response: 843210546
Conc: 884.71 ng/ml



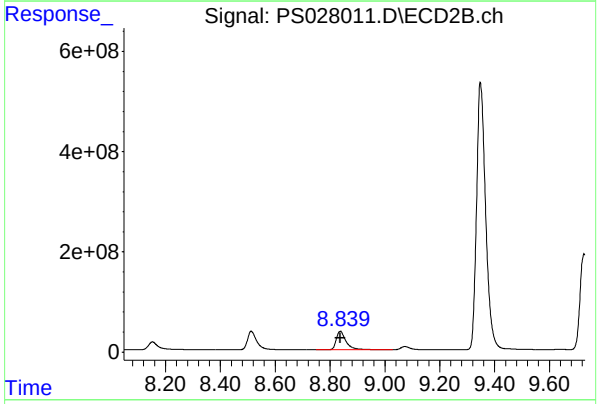
#9 2,4-D

R.T.: 8.177 min
Delta R.T.: 0.000 min
Response: 3001018645
Conc: 863.21 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1000

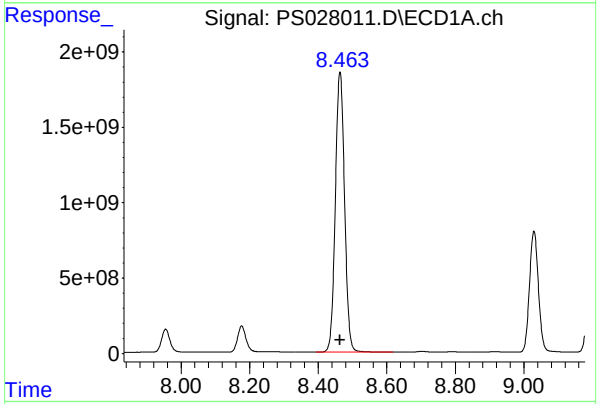
Manual Integrations
APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



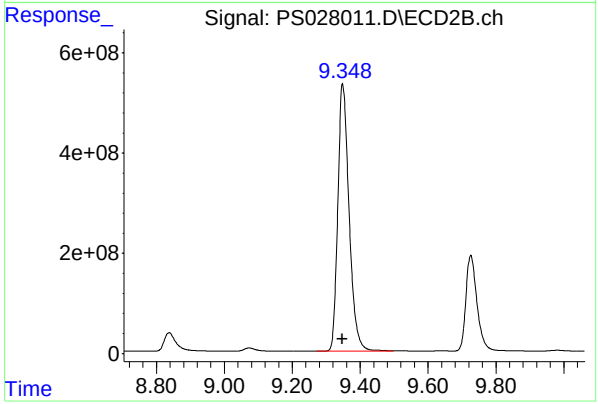
#9 2,4-D

R.T.: 8.838 min
Delta R.T.: 0.000 min
Response: 908570262
Conc: 899.31 ng/ml



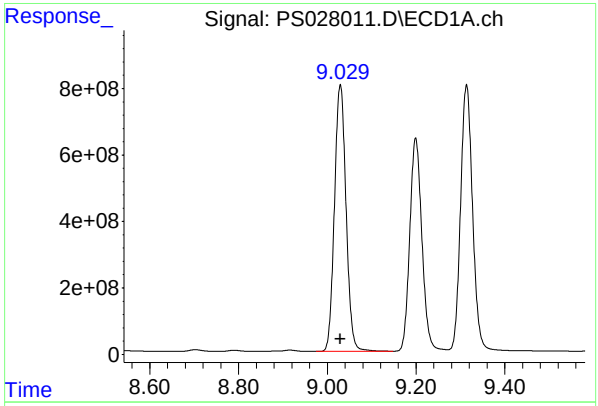
#10 Pentachlorophenol

R.T.: 8.464 min
Delta R.T.: 0.000 min
Response: 34721933334
Conc: 836.67 ng/ml



#10 Pentachlorophenol

R.T.: 9.348 min
Delta R.T.: 0.000 min
Response: 12305547577
Conc: 943.48 ng/ml



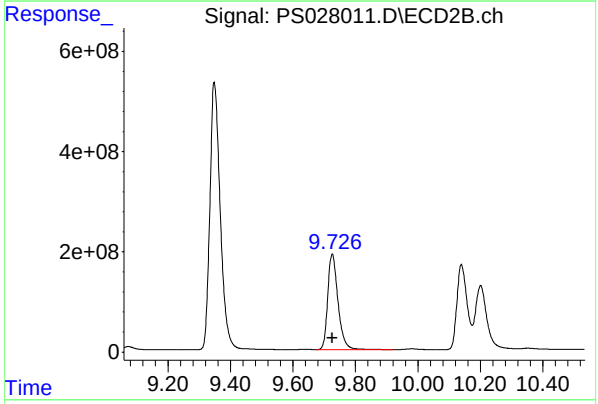
#11 2,4,5-TP (SILVEX)

R.T.: 9.029 min
Delta R.T.: 0.000 min
Response: 14523136142
Conc: 873.27 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1000

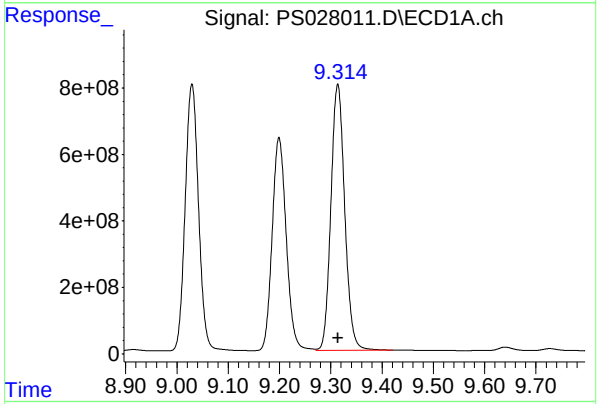
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



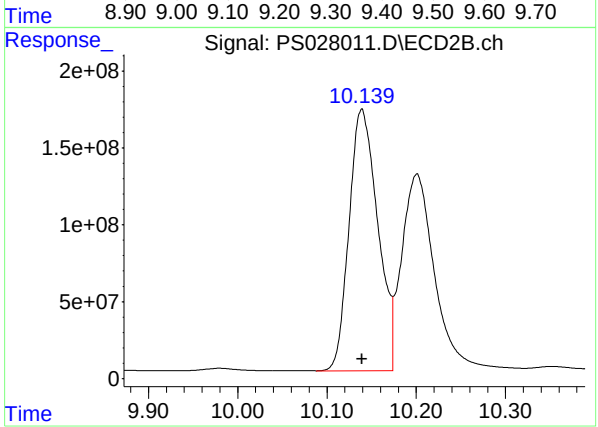
#11 2,4,5-TP (SILVEX)

R.T.: 9.726 min
Delta R.T.: 0.000 min
Response: 4365730233
Conc: 962.99 ng/ml



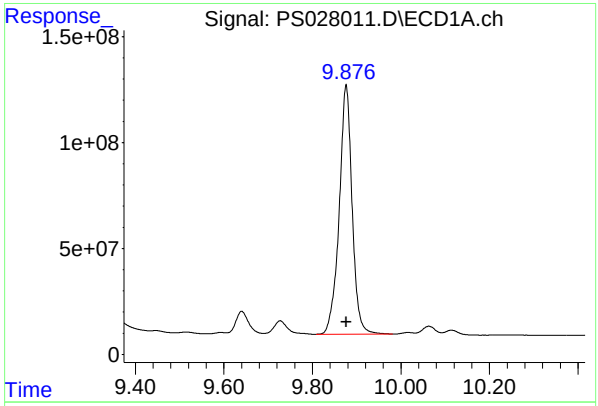
#12 2,4,5-T

R.T.: 9.314 min
Delta R.T.: 0.000 min
Response: 14963093536
Conc: 869.30 ng/ml



#12 2,4,5-T

R.T.: 10.139 min
Delta R.T.: 0.000 min
Response: 3810886220
Conc: 930.00 ng/ml



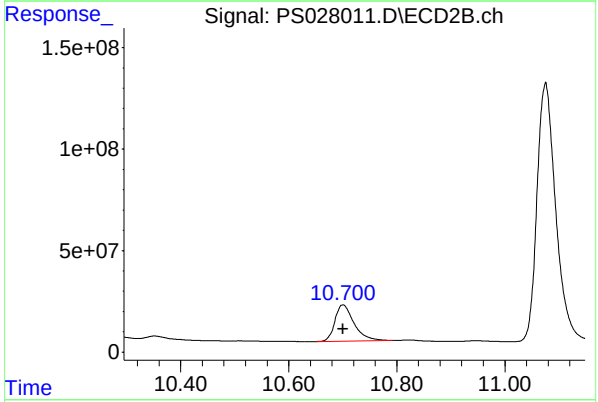
#13 2,4-DB

R.T.: 9.876 min
Delta R.T.: 0.000 min
Response: 2383146575
Conc: 888.52 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1000

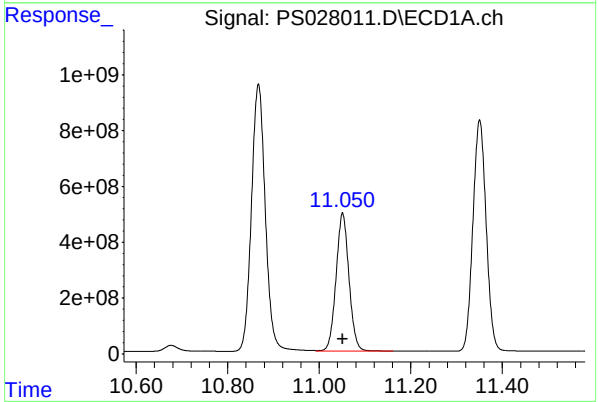
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



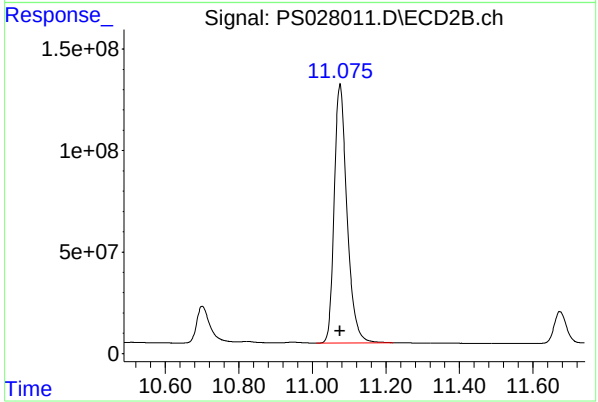
#13 2,4-DB

R.T.: 10.700 min
Delta R.T.: 0.000 min
Response: 439592313
Conc: 857.41 ng/ml



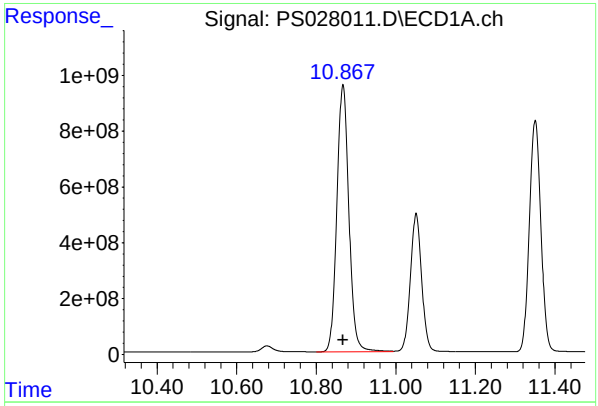
#14 DINOSEB

R.T.: 11.051 min
Delta R.T.: 0.000 min
Response: 9692799063
Conc: 854.24 ng/ml



#14 DINOSEB

R.T.: 11.075 min
Delta R.T.: 0.000 min
Response: 3073937960
Conc: 893.96 ng/ml



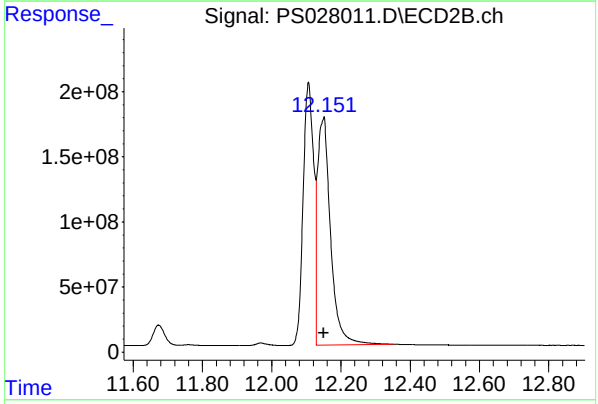
#15 Picloram

R.T.: 10.867 min
Delta R.T.: 0.000 min
Response: 20142899116
Conc: 881.93 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1000

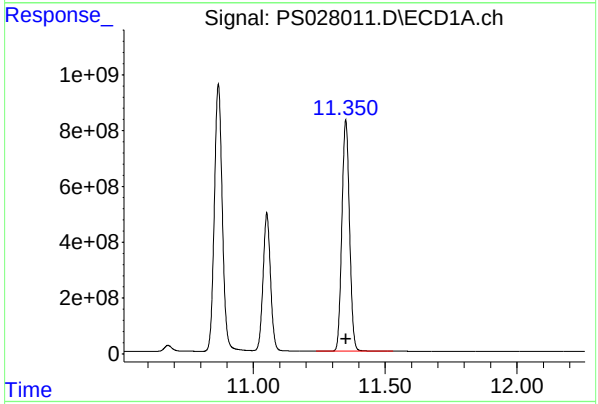
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/24/2024
Supervised By :Ankita Jodhani 10/24/2024



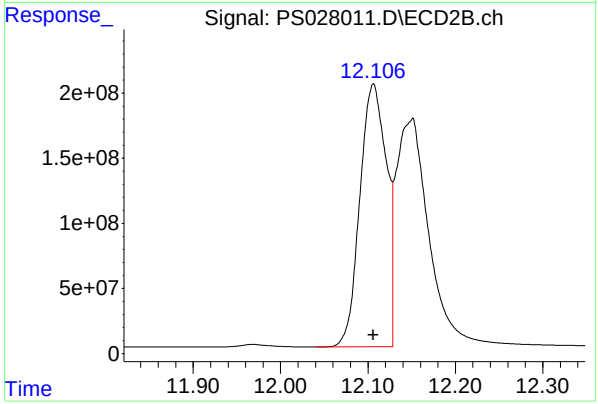
#15 Picloram

R.T.: 12.151 min
Delta R.T.: 0.000 min
Response: 4581251052
Conc: 1028.56 ng/ml



#16 DCPA

R.T.: 11.351 min
Delta R.T.: 0.000 min
Response: 16624809816
Conc: 870.28 ng/ml



#16 DCPA

R.T.: 12.106 min
Delta R.T.: 0.000 min
Response: 4257615336
Conc: 911.82 ng/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028012.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 13:04
Operator : AR\AJ
Sample : HSTDICC1500
Misc :
ALS Vial : 7 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
HSTDICC1500

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 13:22:04 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:21:53 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.092	7.613	3607.0E6	1293.8E6	1337.439	1363.756
	Target Compounds						
1) T	Dalapon	2.539	2.605	5693.3E6	2375.0E6	1249.509	1392.628
2) T	3,5-DICHL...	6.283	6.586	4883.8E6	1773.3E6	1234.209	1325.841
3) T	4-Nitroph...	6.885	7.148	2274.2E6	803.0E6	1229.014	1161.649
5) T	DICAMBA	7.270	7.807	13980.2E6	4414.0E6	1278.268	1335.679
6) T	MCPP	7.455	7.916	1089.5E6	372.8E6	148.582	144.225
7) T	MCPA	7.602	8.156	1436.7E6	538.2E6	135.489	115.458
8) T	DICHLORPROP	7.955	8.513	3628.2E6	1230.1E6	1258.171	1312.846
9) T	2,4-D	8.177	8.836	4280.9E6	1331.8E6	1263.373	1335.602
10) T	Pentachlo...	8.464	9.349	45399.3E6	16900.3E6	1147.259	1319.706
11) T	2,4,5-TP ...	9.029	9.724	20278.7E6	6682.0E6	1255.585	1463.869
12) T	2,4,5-T	9.314	10.140	20921.3E6	5944.0E6	1252.283	1445.378
13) T	2,4-DB	9.876	10.699	3471.3E6	716.7E6	1318.417	1403.185
14) T	DINOSEB	11.051	11.076	13602.5E6	4328.4E6	1235.828	1286.360
15) T	Picloram	10.867	12.149	28455.7E6	7079.1E6	1278.026	1553.519
16) T	DCPA	11.351	12.106	23084.7E6	6520.9E6	1248.604	1405.011

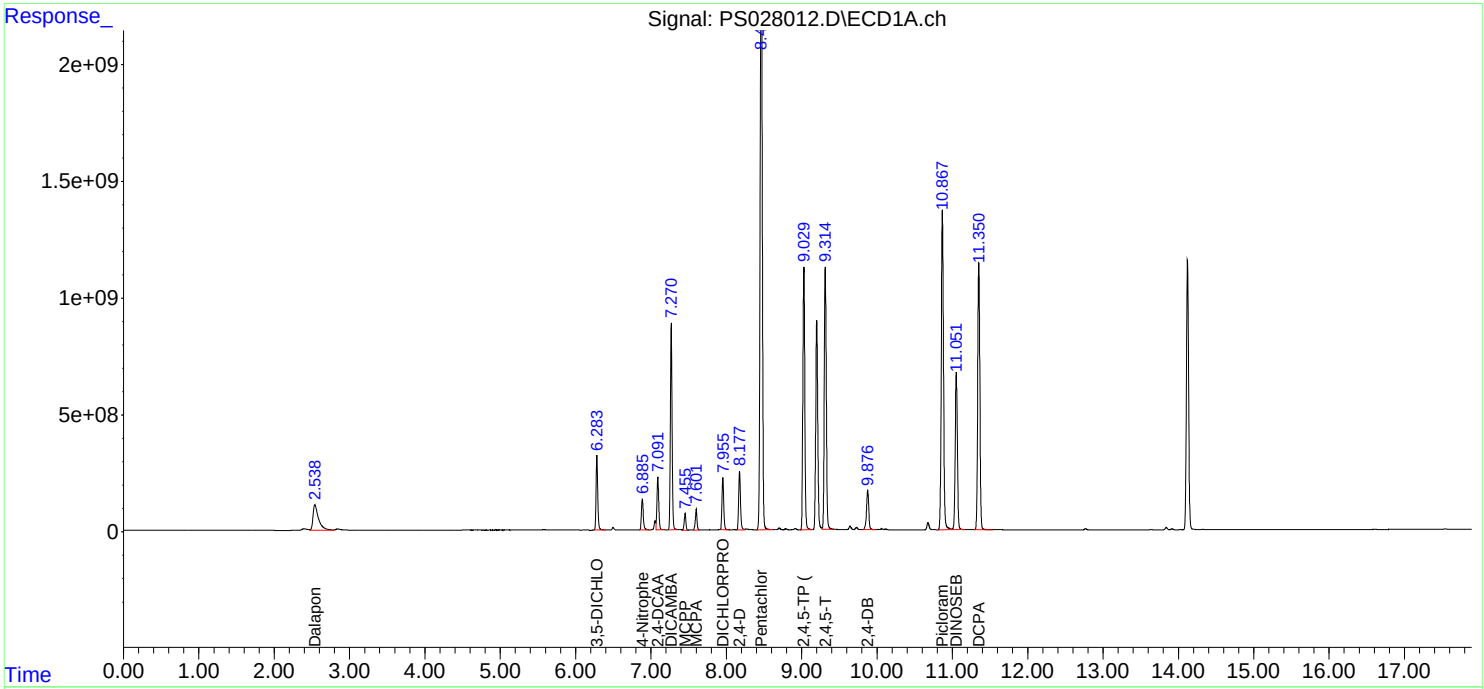
(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

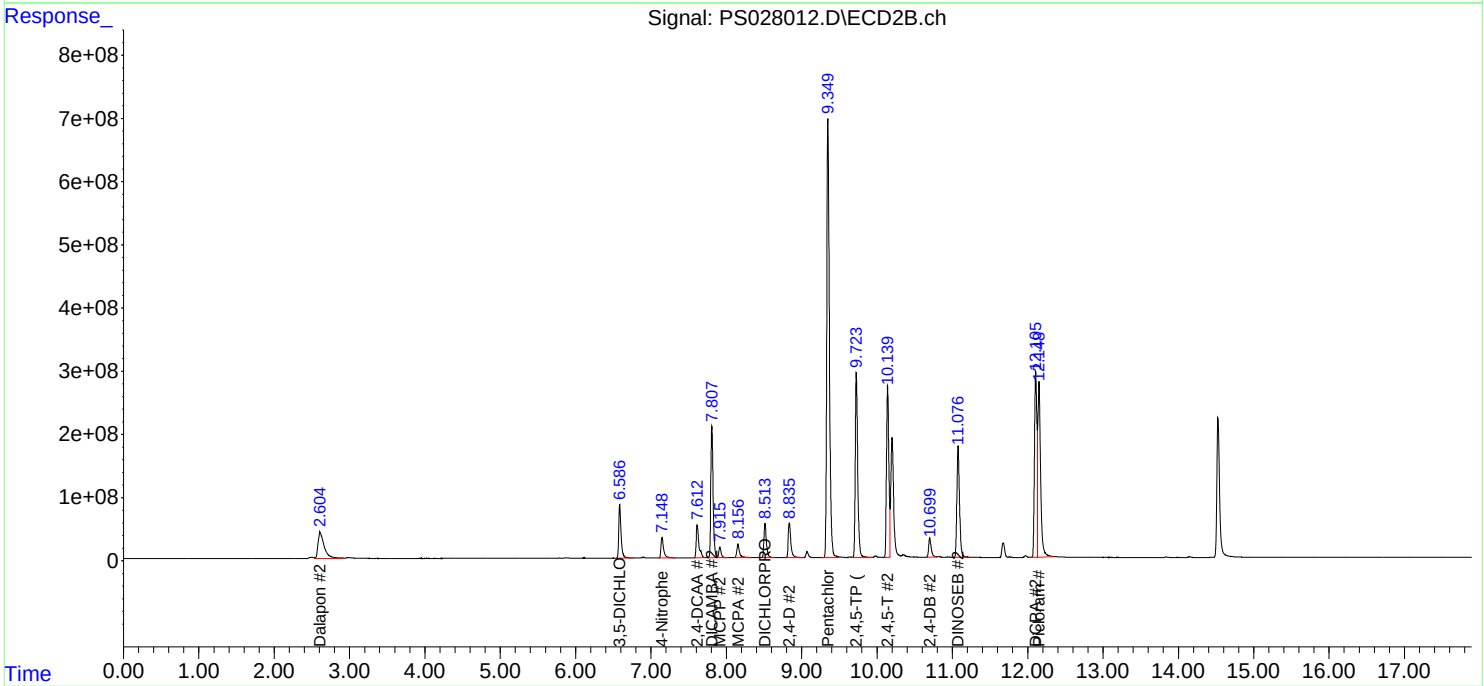
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028012.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 13:04
Operator : AR\AJ
Sample : HSTDICC1500
Misc :
ALS Vial : 7 Sample Multiplier: 1

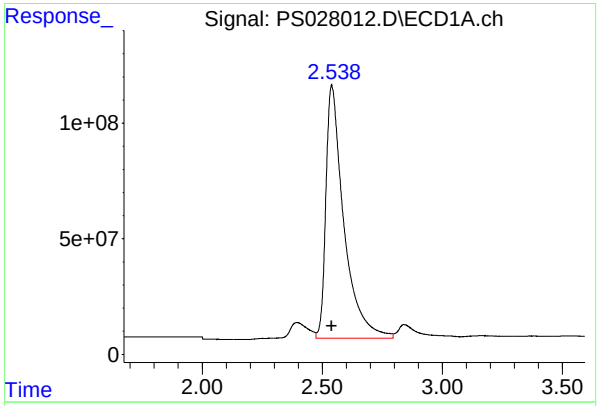
Instrument :
ECD_S
ClientSampleId :
HSTDICC1500

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 13:22:04 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:21:53 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm



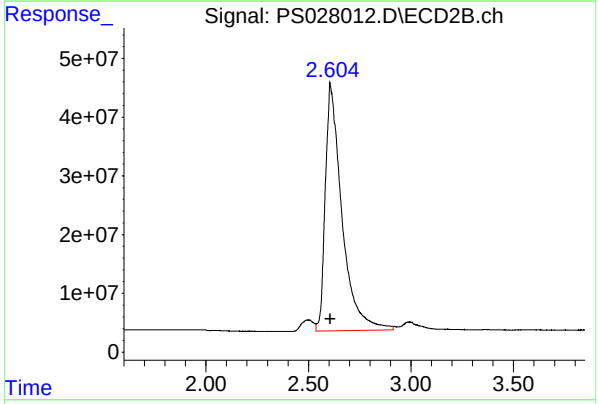




#1 Dalapon

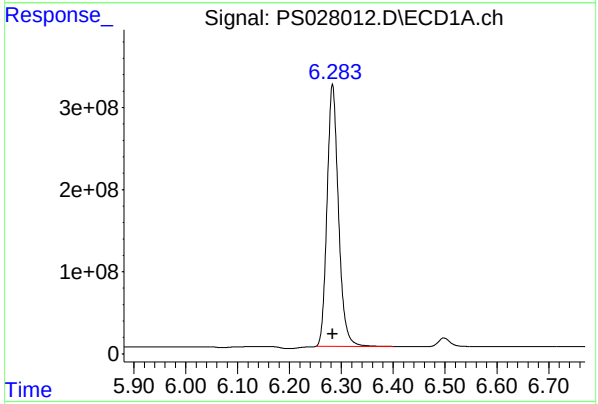
R.T.: 2.539 min
Delta R.T.: 0.000 min
Response: 5693280587
Conc: 1249.51 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1500



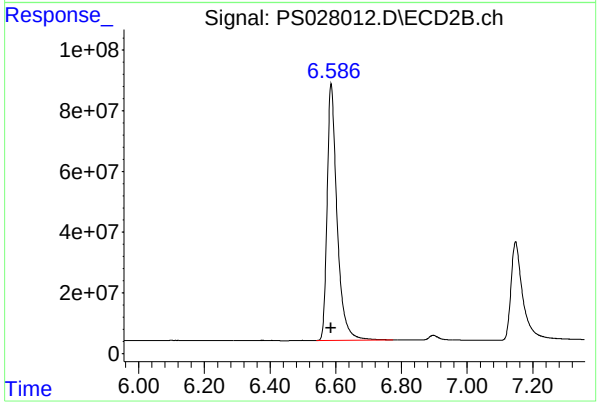
#1 Dalapon

R.T.: 2.605 min
Delta R.T.: 0.000 min
Response: 2375014687
Conc: 1392.63 ng/ml



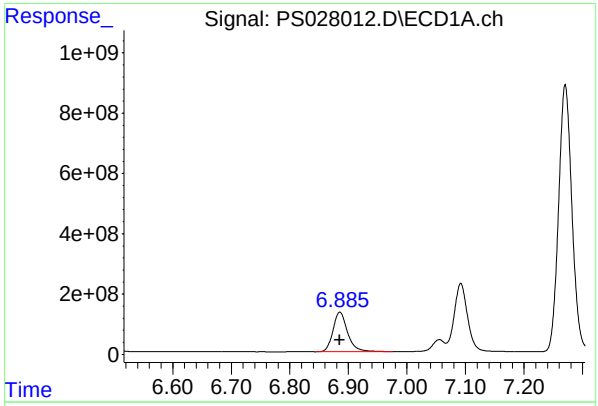
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.283 min
Delta R.T.: 0.000 min
Response: 4883784317
Conc: 1234.21 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

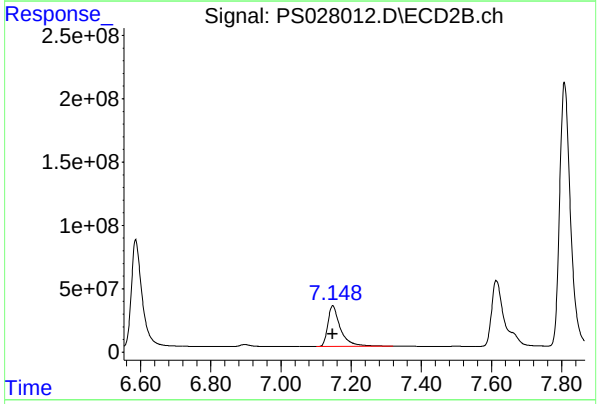
R.T.: 6.586 min
Delta R.T.: 0.000 min
Response: 1773318027
Conc: 1325.84 ng/ml



#3 4-Nitrophenol

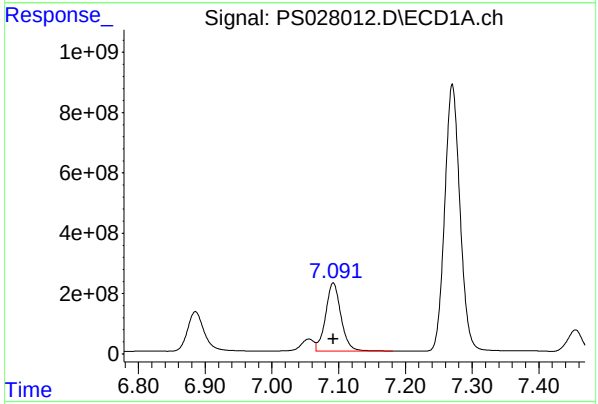
R.T.: 6.885 min
Delta R.T.: 0.000 min
Response: 2274187639
Conc: 1229.01 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1500



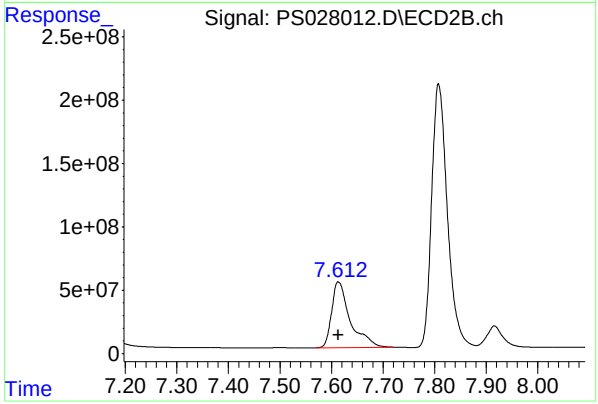
#3 4-Nitrophenol

R.T.: 7.148 min
Delta R.T.: 0.000 min
Response: 803008351
Conc: 1161.65 ng/ml



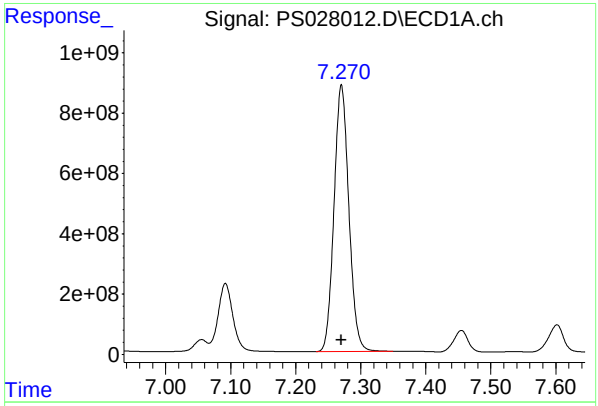
#4 2,4-DCAA

R.T.: 7.092 min
Delta R.T.: 0.000 min
Response: 3607027032
Conc: 1337.44 ng/ml



#4 2,4-DCAA

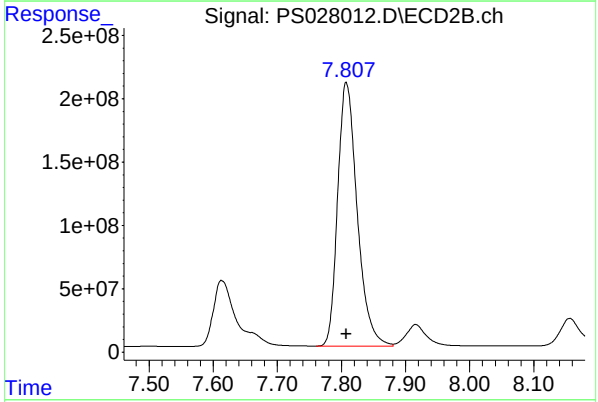
R.T.: 7.613 min
Delta R.T.: 0.000 min
Response: 1293764711
Conc: 1363.76 ng/ml



#5 DICAMBA

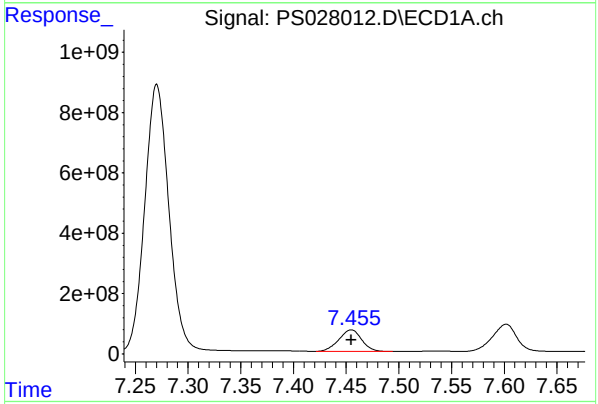
R.T.: 7.270 min
Delta R.T.: 0.000 min
Response: 13980226892
Conc: 1278.27 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1500



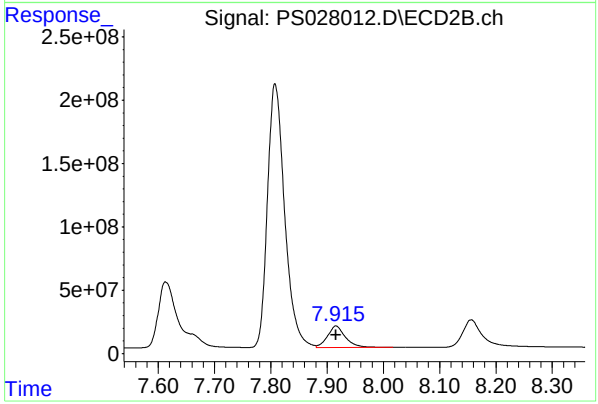
#5 DICAMBA

R.T.: 7.807 min
Delta R.T.: 0.000 min
Response: 4413981681
Conc: 1335.68 ng/ml



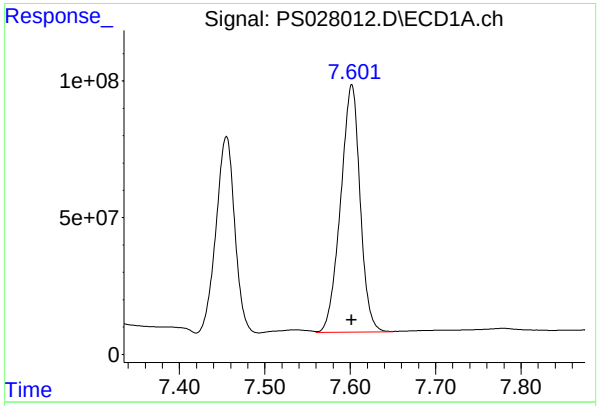
#6 MCPP

R.T.: 7.455 min
Delta R.T.: 0.000 min
Response: 1089487301
Conc: 148.58 ug/ml



#6 MCPP

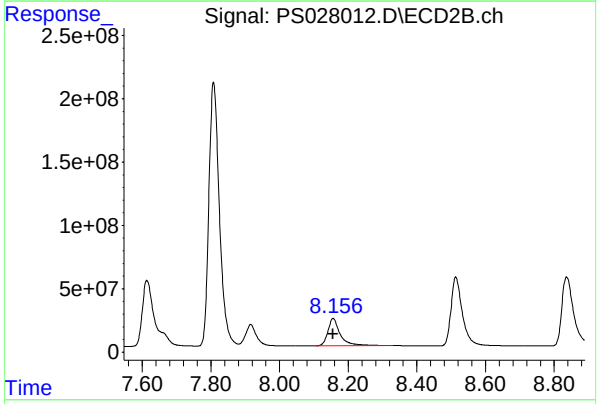
R.T.: 7.916 min
Delta R.T.: 0.000 min
Response: 372826502
Conc: 144.22 ug/ml



#7 MCPA

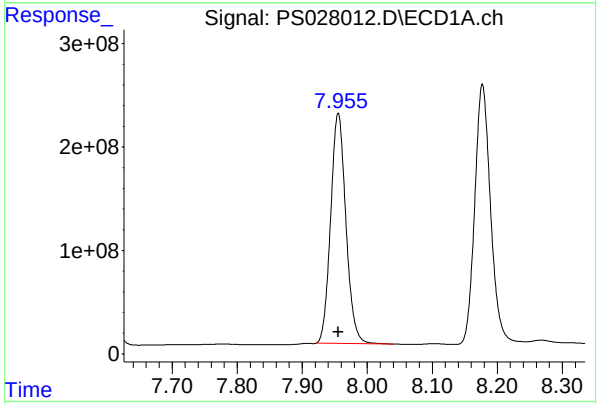
R.T.: 7.602 min
Delta R.T.: 0.000 min
Response: 1436703363
Conc: 135.49 ug/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1500



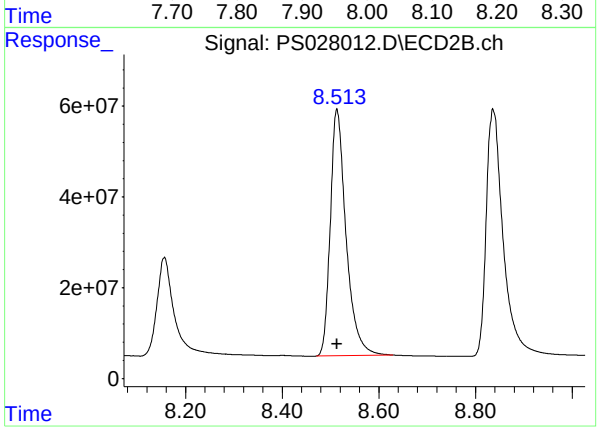
#7 MCPA

R.T.: 8.156 min
Delta R.T.: 0.000 min
Response: 538211749
Conc: 115.46 ug/ml



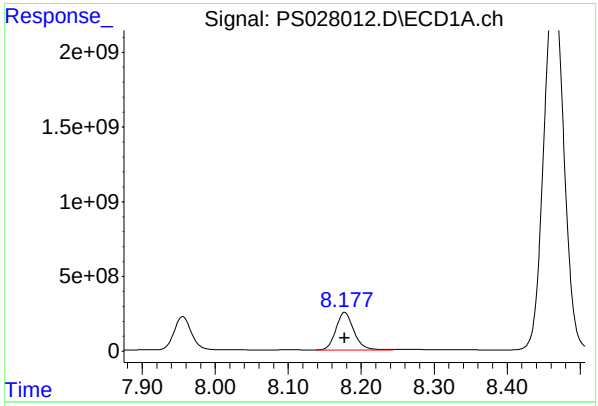
#8 DICHLORPROP

R.T.: 7.955 min
Delta R.T.: 0.000 min
Response: 3628167881
Conc: 1258.17 ng/ml



#8 DICHLORPROP

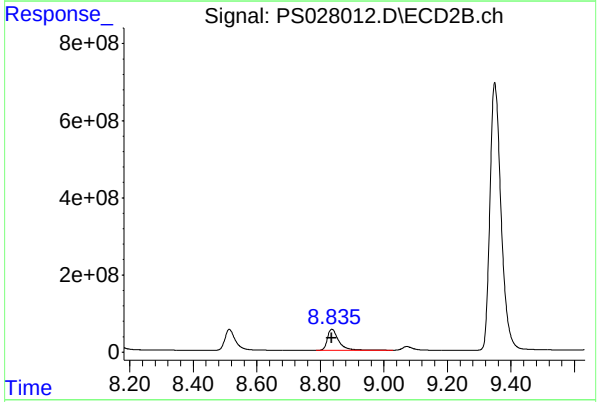
R.T.: 8.513 min
Delta R.T.: 0.000 min
Response: 1230072961
Conc: 1312.85 ng/ml



#9 2,4-D

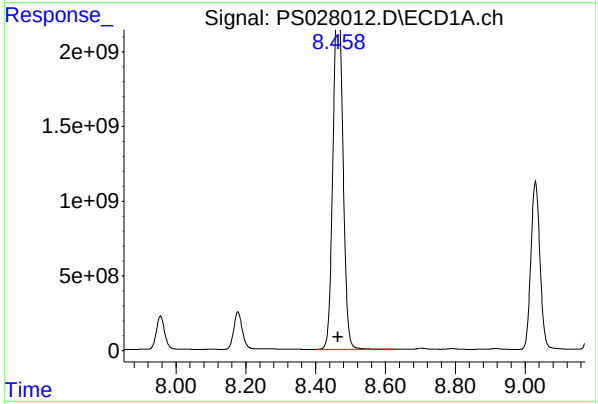
R.T.: 8.177 min
Delta R.T.: 0.000 min
Response: 4280921358
Conc: 1263.37 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1500



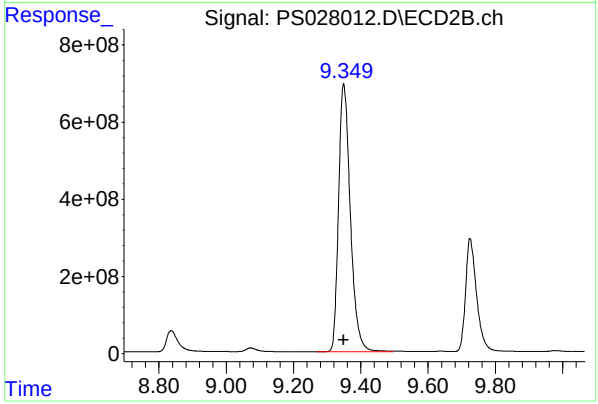
#9 2,4-D

R.T.: 8.836 min
Delta R.T.: 0.000 min
Response: 1331788219
Conc: 1335.60 ng/ml



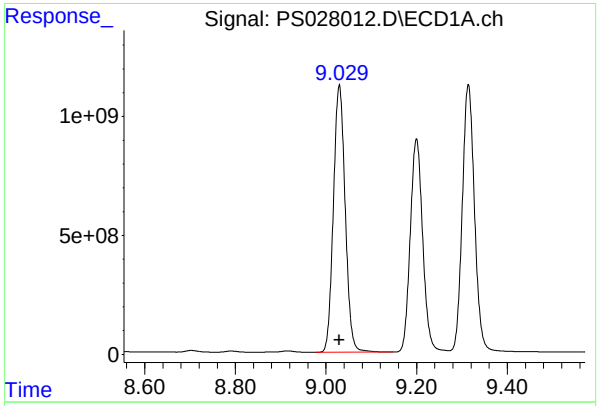
#10 Pentachlorophenol

R.T.: 8.464 min
Delta R.T.: 0.000 min
Response: 45399291819
Conc: 1147.26 ng/ml



#10 Pentachlorophenol

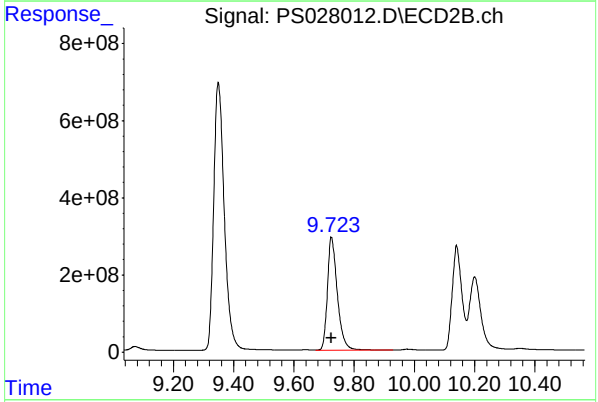
R.T.: 9.349 min
Delta R.T.: 0.000 min
Response: 16900312784
Conc: 1319.71 ng/ml



#11 2,4,5-TP (SILVEX)

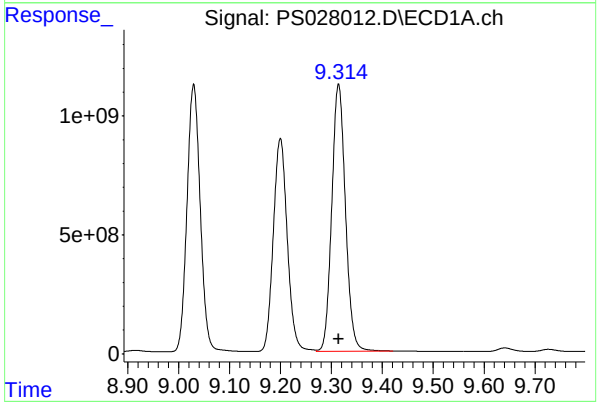
R.T.: 9.029 min
Delta R.T.: 0.000 min
Response: 20278659324
Conc: 1255.58 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1500



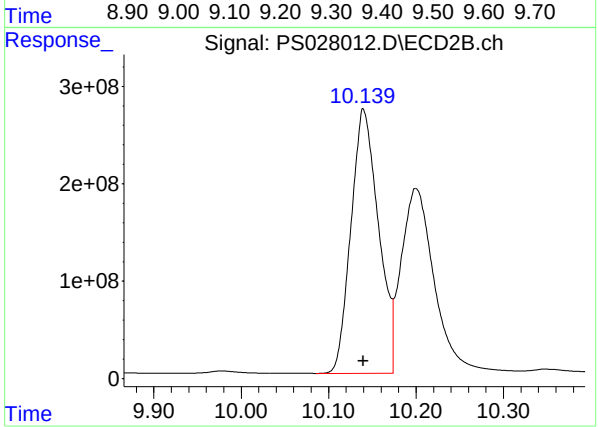
#11 2,4,5-TP (SILVEX)

R.T.: 9.724 min
Delta R.T.: 0.000 min
Response: 6682024249
Conc: 1463.87 ng/ml



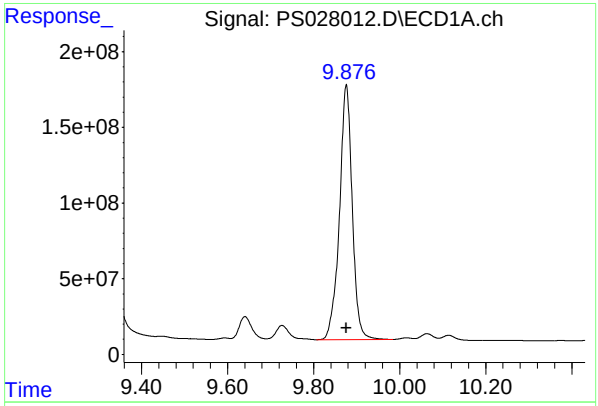
#12 2,4,5-T

R.T.: 9.314 min
Delta R.T.: 0.000 min
Response: 20921300839
Conc: 1252.28 ng/ml



#12 2,4,5-T

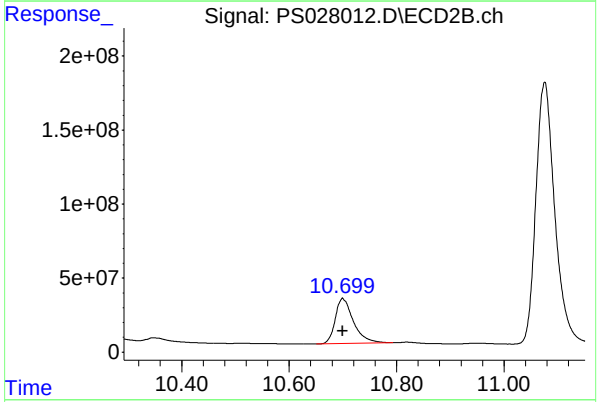
R.T.: 10.140 min
Delta R.T.: 0.000 min
Response: 5944029826
Conc: 1445.38 ng/ml



#13 2,4-DB

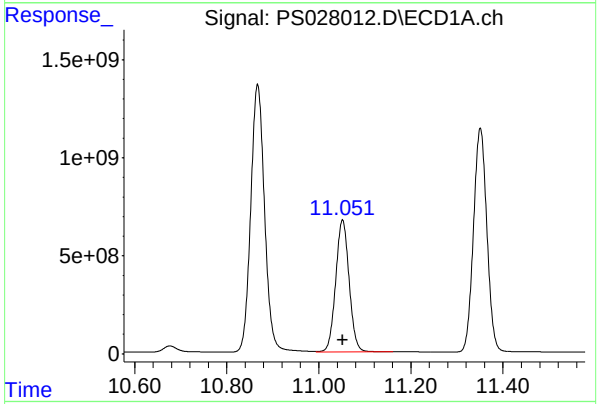
R.T.: 9.876 min
Delta R.T.: 0.000 min
Response: 3471299331
Conc: 1318.42 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1500



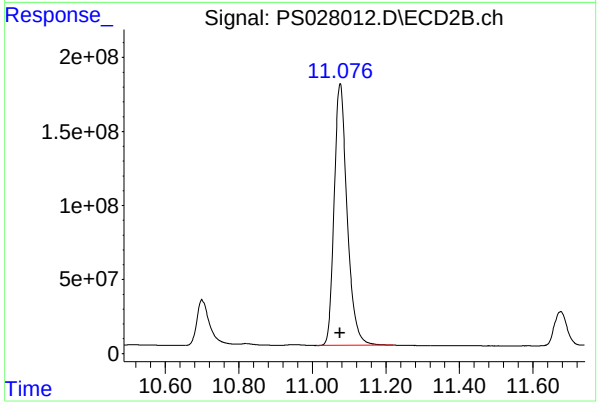
#13 2,4-DB

R.T.: 10.699 min
Delta R.T.: 0.000 min
Response: 716670513
Conc: 1403.19 ng/ml



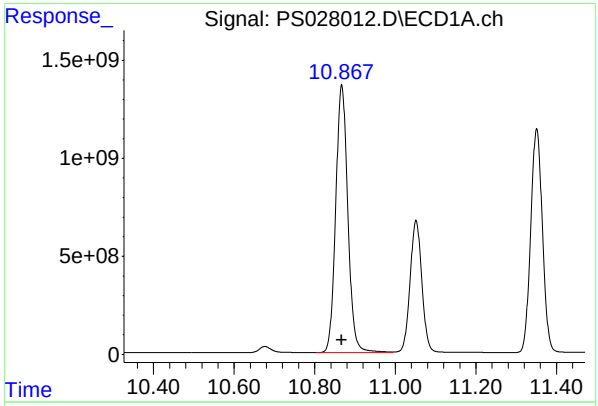
#14 DINOSEB

R.T.: 11.051 min
Delta R.T.: 0.000 min
Response: 13602535498
Conc: 1235.83 ng/ml



#14 DINOSEB

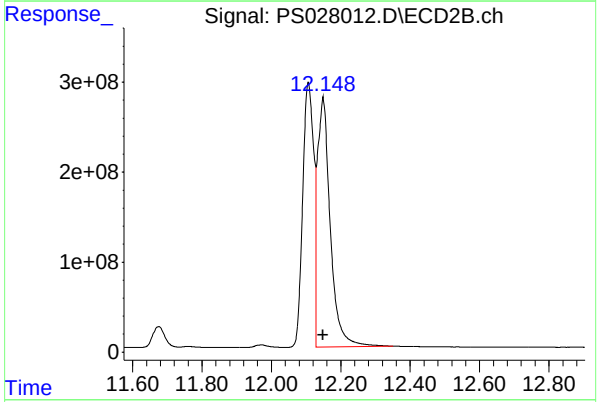
R.T.: 11.076 min
Delta R.T.: 0.000 min
Response: 4328355061
Conc: 1286.36 ng/ml



#15 Picloram

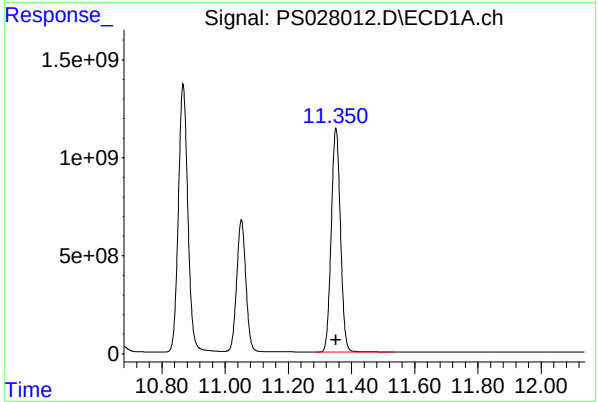
R.T.: 10.867 min
Delta R.T.: 0.000 min
Response: 28455704592
Conc: 1278.03 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDICC1500



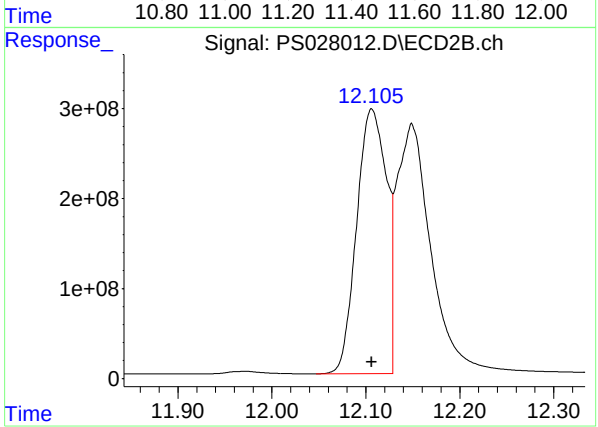
#15 Picloram

R.T.: 12.149 min
Delta R.T.: 0.000 min
Response: 7079064785
Conc: 1553.52 ng/ml



#16 DCPA

R.T.: 11.351 min
Delta R.T.: 0.000 min
Response: 23084720411
Conc: 1248.60 ng/ml



#16 DCPA

R.T.: 12.106 min
Delta R.T.: 0.000 min
Response: 6520877435
Conc: 1405.01 ng/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028013.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 13:28
Operator : AR\AJ
Sample : HSTDICV750
Misc :
ALS Vial : 8 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
ICVPS102324

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 24 05:23:48 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.25µm

		Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
		System Monitoring Compounds						
4)	S	2,4-DCAA	7.092	7.613	1976.3E6	674.6E6	732.803	711.122
		Target Compounds						
1)	T	Dalapon	2.540	2.620	3067.2E6	1186.5E6	673.166	695.713
2)	T	3,5-DICHL...	6.283	6.587	2675.0E6	918.2E6	676.020	686.492
3)	T	4-Nitroph...	6.886	7.147	1223.9E6	457.9E6	661.442	662.392
5)	T	DICAMBA	7.270	7.809	7642.3E6	2263.7E6	698.769	684.985
6)	T	MCPP	7.450	7.912	530.4E6	181.0E6	72.328	70.022
7)	T	MCPA	7.595	8.151	744.4E6	299.7E6	70.205	65.123
8)	T	DICHLORPROP	7.955	8.514	1982.4E6	651.6E6	687.456	695.472
9)	T	2,4-D	8.177	8.837	2340.8E6	676.7E6	690.823	678.616
10)	T	Pentachlo...	8.463	9.350	27910.1E6	9173.5E6	705.301	716.338
11)	T	2,4,5-TP ...	9.029	9.725	11422.8E6	3315.0E6	707.260	726.235
12)	T	2,4,5-T	9.314	10.138	11841.8E6	3031.7E6	708.814	737.205
13)	T	2,4-DB	9.876	10.700	1862.0E6	352.1E6	707.209	689.473
14)	T	DINOSEB	11.051	11.076	7650.9E6	2256.6E6	695.102	670.652
15)	T	Picloram	10.867	12.150	15870.8E6	3215.9E6	712.804	705.742
16)	T	DCPA	11.350	12.107	13233.5E6	3580.0E6	715.770	771.356

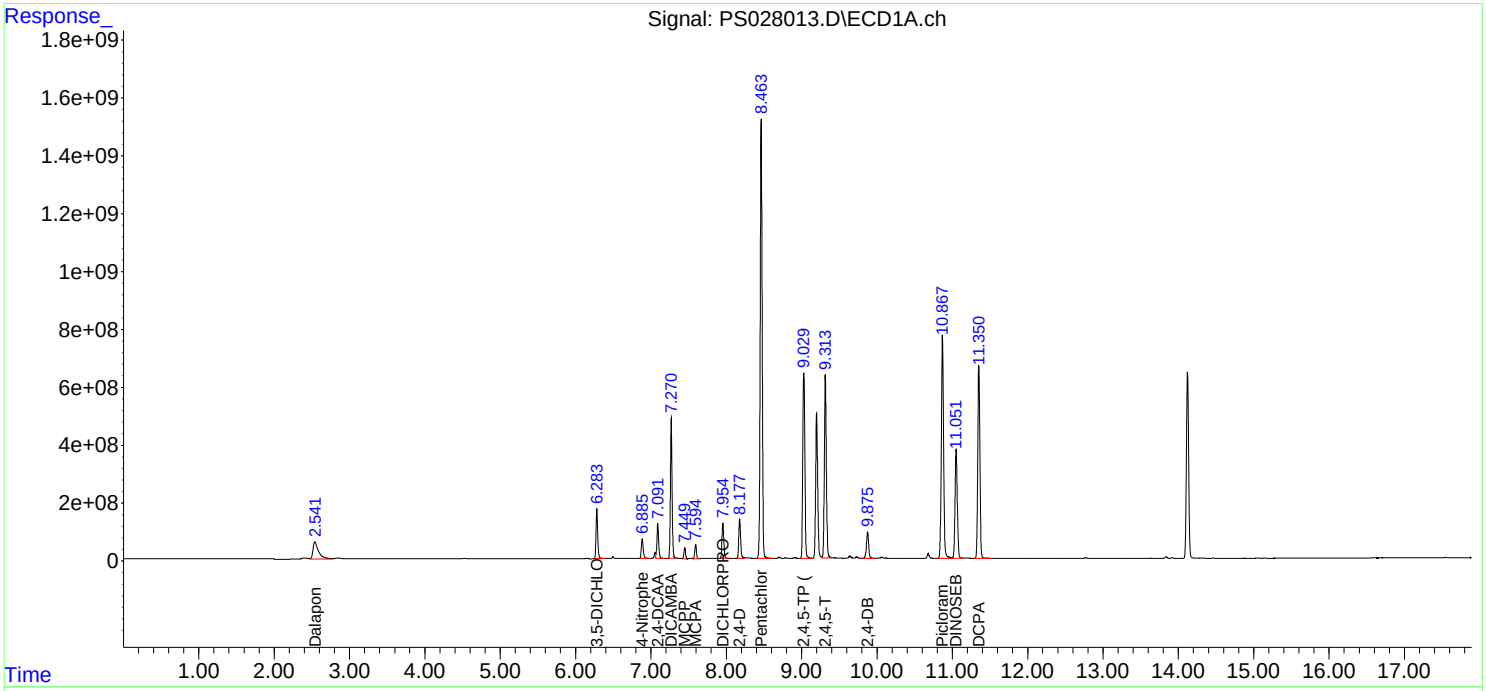
(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

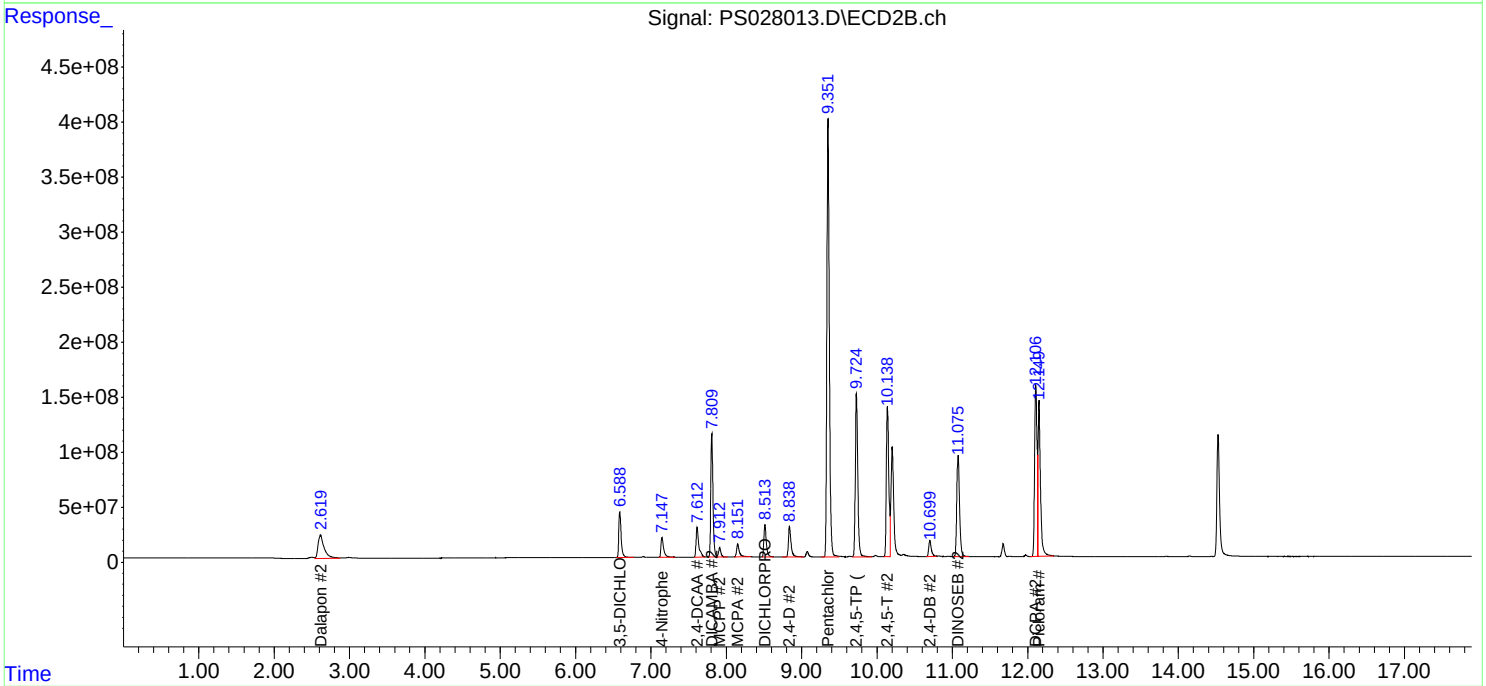
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028013.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 13:28
Operator : AR\AJ
Sample : HSTDICV750
Misc :
ALS Vial : 8 Sample Multiplier: 1

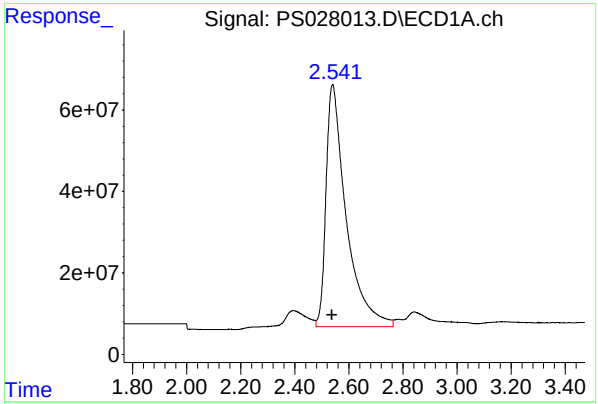
Instrument :
ECD_S
ClientSampleId :
ICVPS102324

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 24 05:23:48 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm



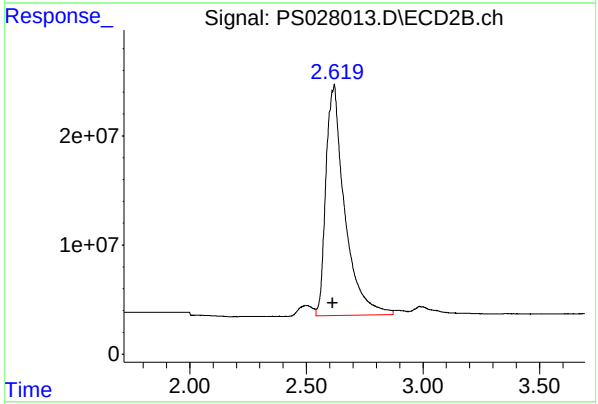




#1 Dalapon

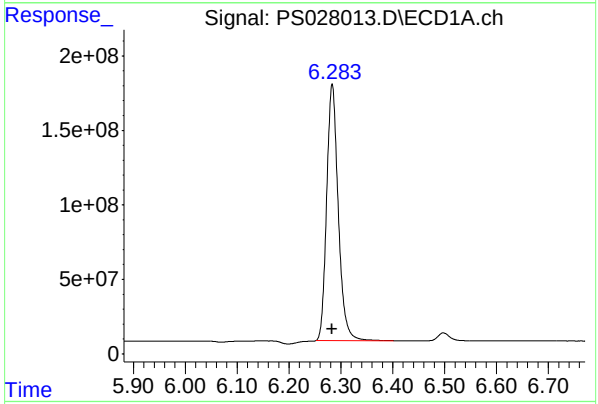
R.T.: 2.540 min
Delta R.T.: 0.002 min
Response: 3067221149
Conc: 673.17 ng/ml

Instrument :
ECD_S
ClientSampleId :
ICVPS102324



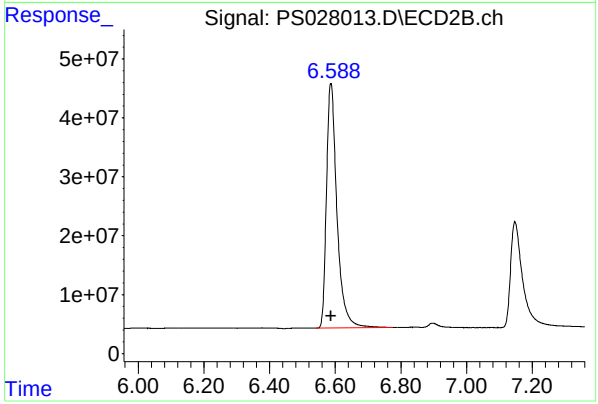
#1 Dalapon

R.T.: 2.620 min
Delta R.T.: 0.007 min
Response: 1186482013
Conc: 695.71 ng/ml



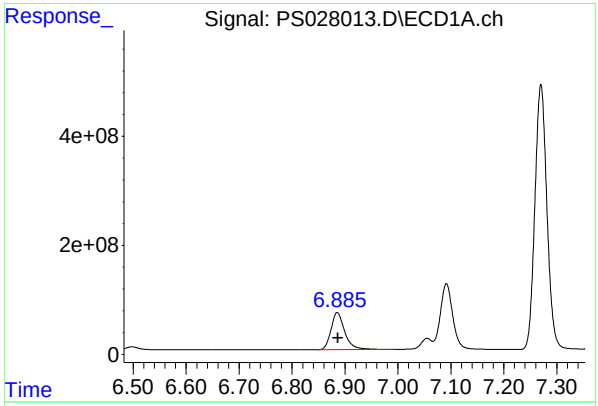
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.283 min
Delta R.T.: 0.000 min
Response: 2675021165
Conc: 676.02 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

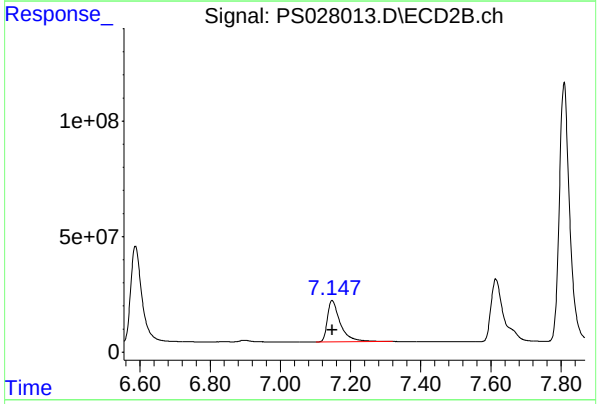
R.T.: 6.587 min
Delta R.T.: 0.000 min
Response: 918186330
Conc: 686.49 ng/ml



#3 4-Nitrophenol

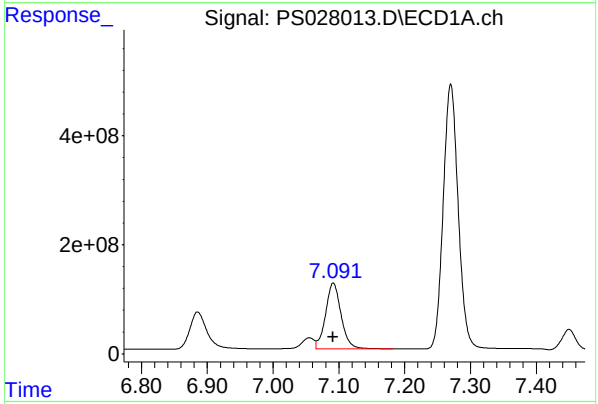
R.T.: 6.886 min
Delta R.T.: -0.001 min
Response: 1223943346
Conc: 661.44 ng/ml

Instrument :
ECD_S
ClientSampleId :
ICVPS102324



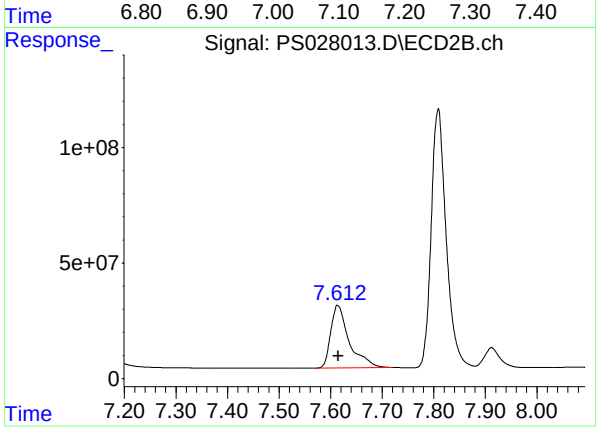
#3 4-Nitrophenol

R.T.: 7.147 min
Delta R.T.: -0.002 min
Response: 457888628
Conc: 662.39 ng/ml



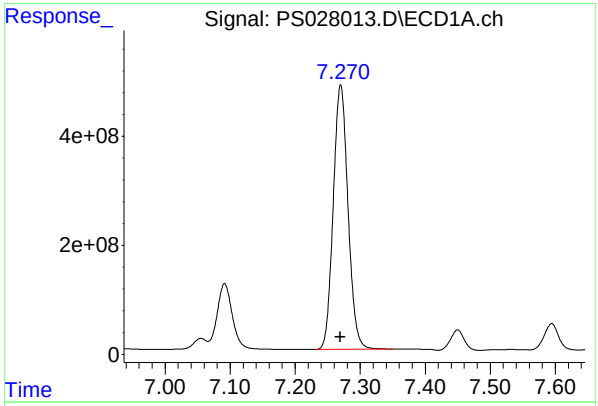
#4 2,4-DCAA

R.T.: 7.092 min
Delta R.T.: 0.000 min
Response: 1976345413
Conc: 732.80 ng/ml



#4 2,4-DCAA

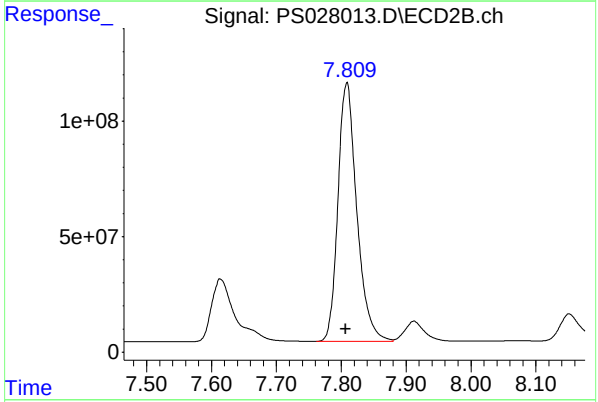
R.T.: 7.613 min
Delta R.T.: -0.001 min
Response: 674625212
Conc: 711.12 ng/ml



#5 DICAMBA

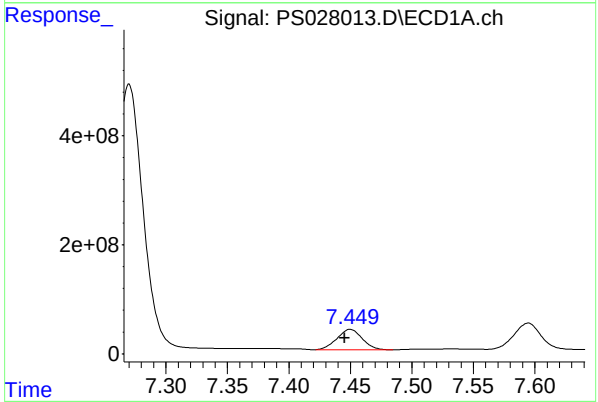
R.T.: 7.270 min
Delta R.T.: 0.000 min
Response: 7642334766
Conc: 698.77 ng/ml

Instrument :
ECD_S
ClientSampleId :
ICVPS102324



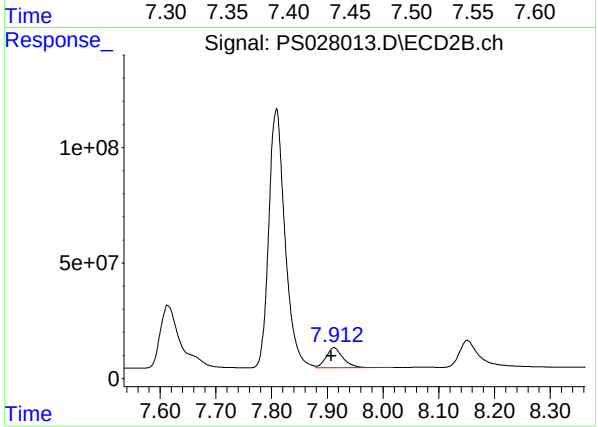
#5 DICAMBA

R.T.: 7.809 min
Delta R.T.: 0.002 min
Response: 2263652135
Conc: 684.99 ng/ml



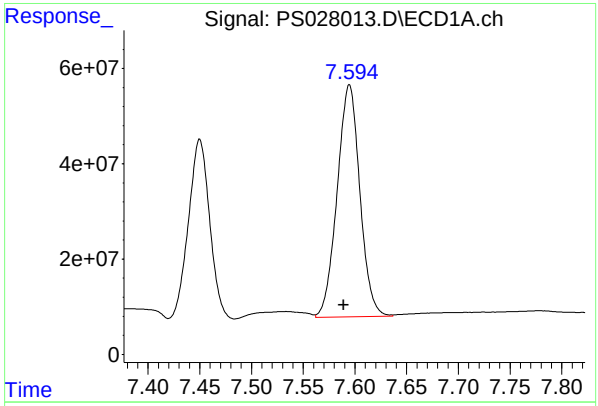
#6 MCPP

R.T.: 7.450 min
Delta R.T.: 0.005 min
Response: 530351332
Conc: 72.33 ug/ml



#6 MCPP

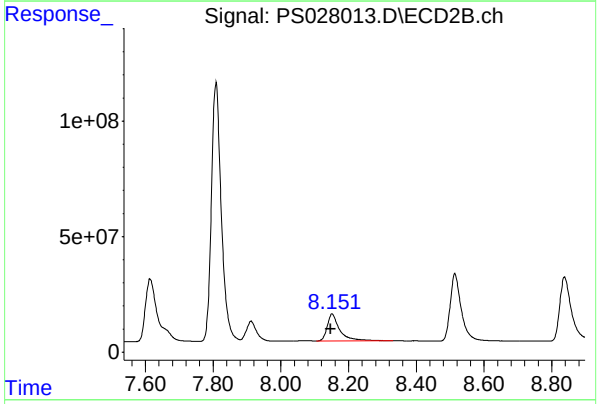
R.T.: 7.912 min
Delta R.T.: 0.005 min
Response: 181010016
Conc: 70.02 ug/ml



#7 MCPA

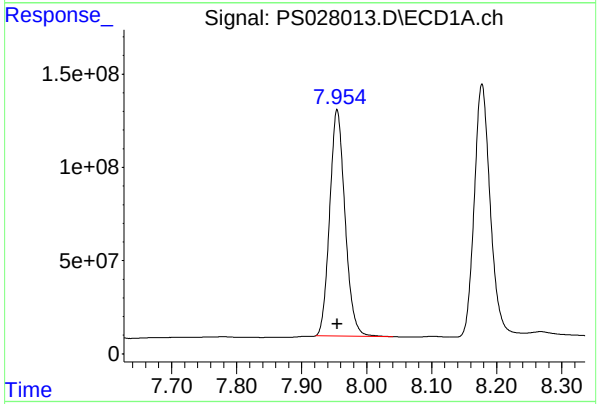
R.T.: 7.595 min
Delta R.T.: 0.005 min
Response: 744442370
Conc: 70.20 ug/ml

Instrument :
ECD_S
ClientSampleId :
ICVPS102324



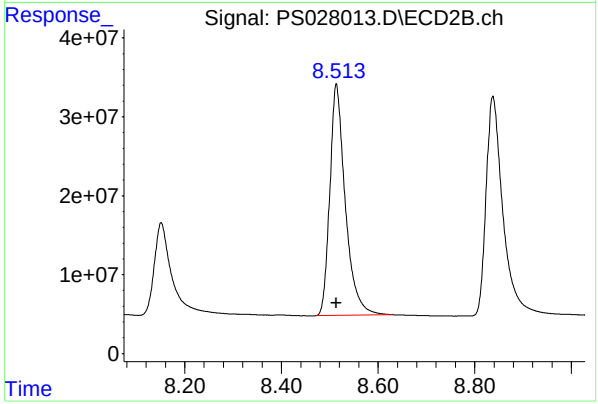
#7 MCPA

R.T.: 8.151 min
Delta R.T.: 0.005 min
Response: 299687138
Conc: 65.12 ug/ml



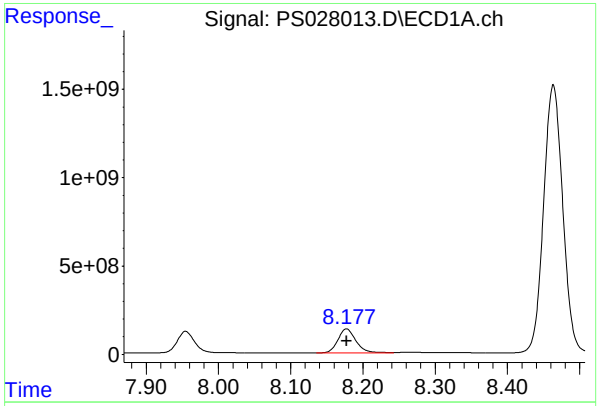
#8 DICHLORPROP

R.T.: 7.955 min
Delta R.T.: 0.000 min
Response: 1982407402
Conc: 687.46 ng/ml



#8 DICHLORPROP

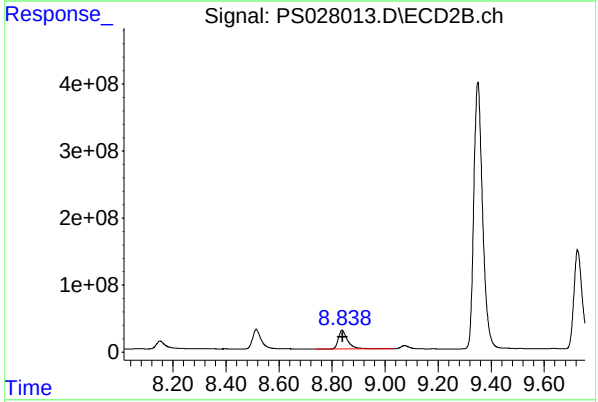
R.T.: 8.514 min
Delta R.T.: 0.000 min
Response: 651623557
Conc: 695.47 ng/ml



#9 2,4-D

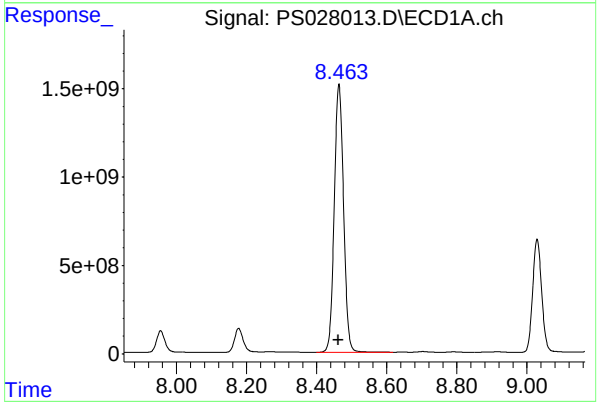
R.T.: 8.177 min
Delta R.T.: 0.000 min
Response: 2340846236
Conc: 690.82 ng/ml

Instrument :
ECD_S
ClientSampleId :
ICVPS102324



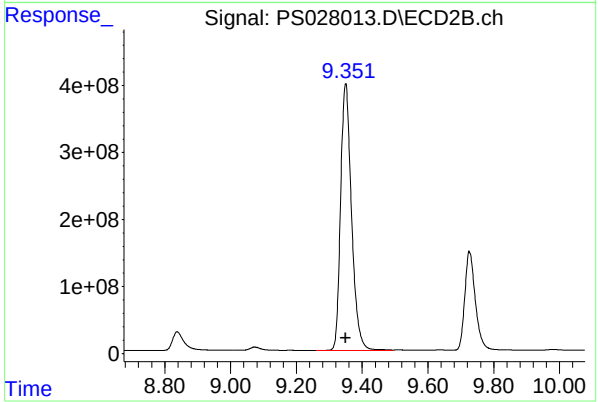
#9 2,4-D

R.T.: 8.837 min
Delta R.T.: -0.002 min
Response: 676678130
Conc: 678.62 ng/ml



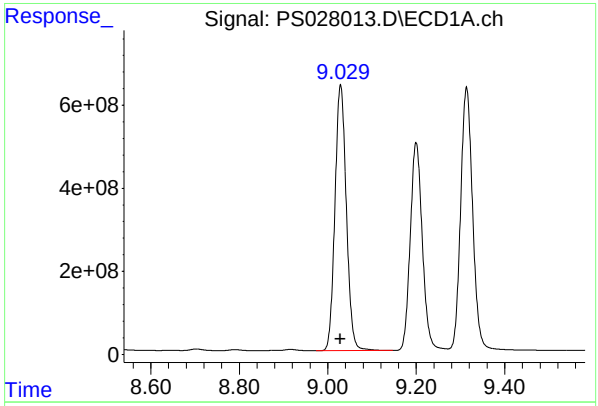
#10 Pentachlorophenol

R.T.: 8.463 min
Delta R.T.: 0.000 min
Response: 27910135363
Conc: 705.30 ng/ml



#10 Pentachlorophenol

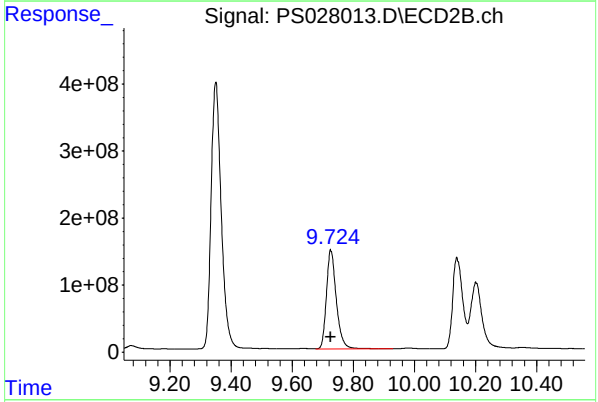
R.T.: 9.350 min
Delta R.T.: 0.000 min
Response: 9173512936
Conc: 716.34 ng/ml



#11 2,4,5-TP (SILVEX)

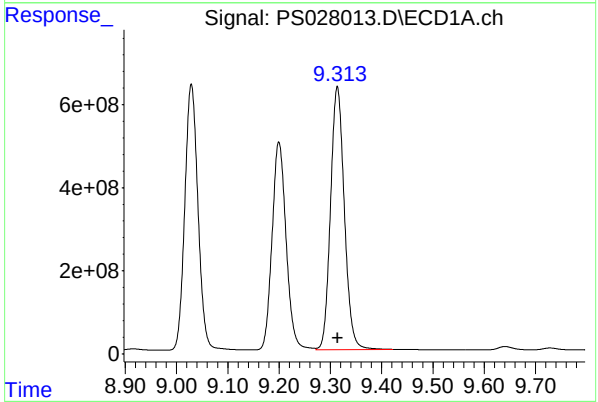
R.T.: 9.029 min
Delta R.T.: 0.000 min
Response: 11422795700
Conc: 707.26 ng/ml

Instrument :
ECD_S
ClientSampleId :
ICVPS102324



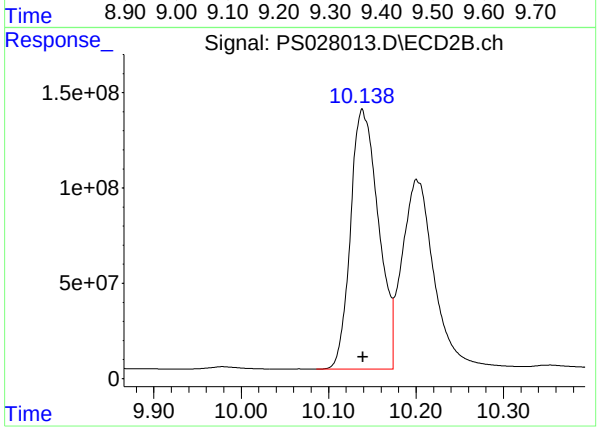
#11 2,4,5-TP (SILVEX)

R.T.: 9.725 min
Delta R.T.: 0.000 min
Response: 3314997124
Conc: 726.24 ng/ml



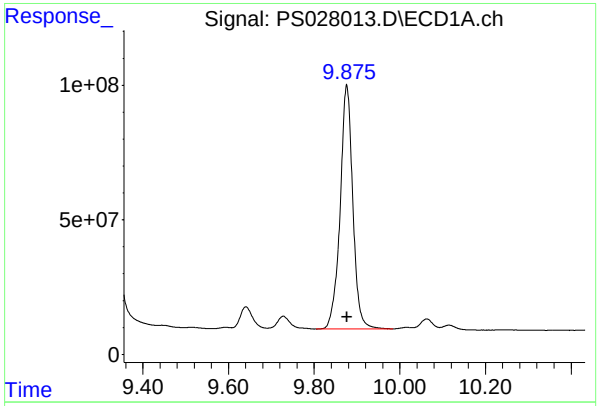
#12 2,4,5-T

R.T.: 9.314 min
Delta R.T.: 0.000 min
Response: 11841824962
Conc: 708.81 ng/ml



#12 2,4,5-T

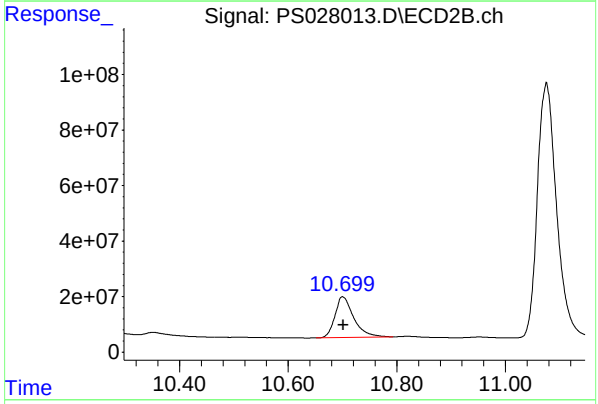
R.T.: 10.138 min
Delta R.T.: -0.001 min
Response: 3031709535
Conc: 737.20 ng/ml



#13 2,4-DB

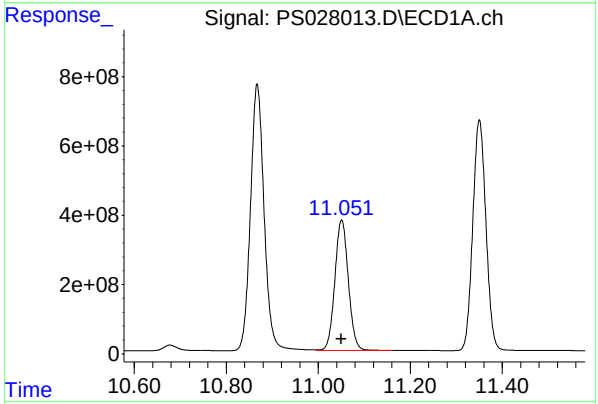
R.T.: 9.876 min
Delta R.T.: 0.000 min
Response: 1862032519
Conc: 707.21 ng/ml

Instrument :
ECD_S
ClientSampleId :
ICVPS102324



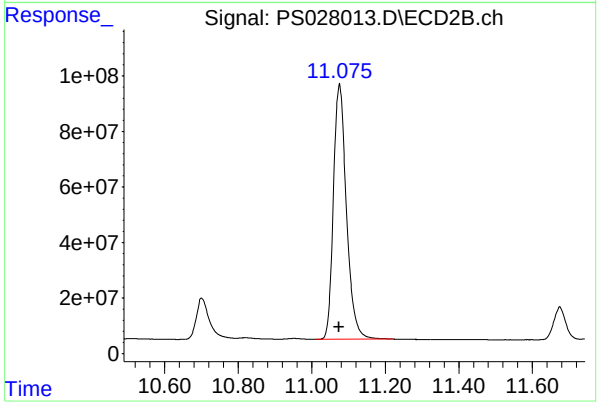
#13 2,4-DB

R.T.: 10.700 min
Delta R.T.: -0.002 min
Response: 352145023
Conc: 689.47 ng/ml



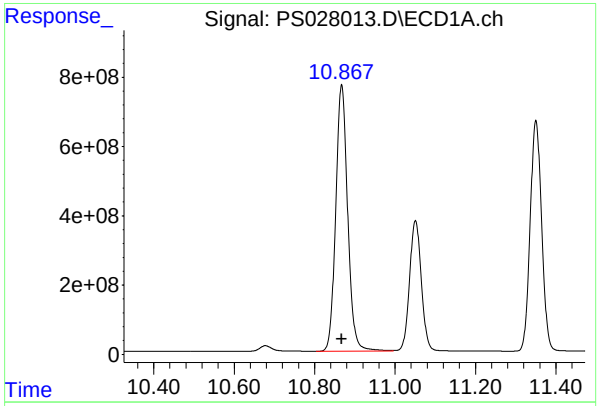
#14 DINOSEB

R.T.: 11.051 min
Delta R.T.: 0.000 min
Response: 7650864598
Conc: 695.10 ng/ml



#14 DINOSEB

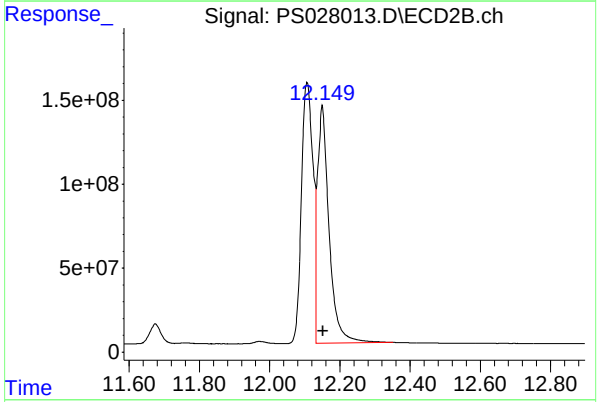
R.T.: 11.076 min
Delta R.T.: 0.000 min
Response: 2256615646
Conc: 670.65 ng/ml



#15 Picloram

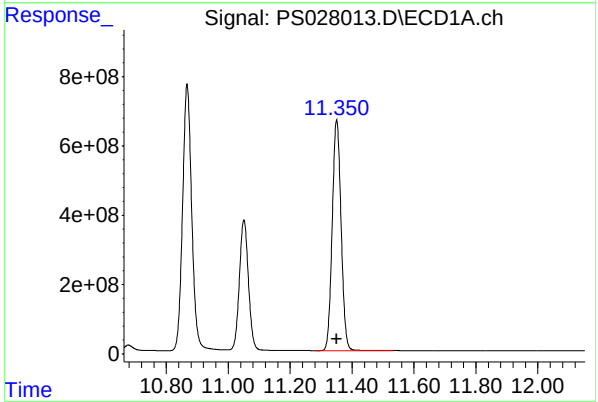
R.T.: 10.867 min
Delta R.T.: 0.000 min
Response: 15870827721
Conc: 712.80 ng/ml

Instrument :
ECD_S
ClientSampleId :
ICVPS102324



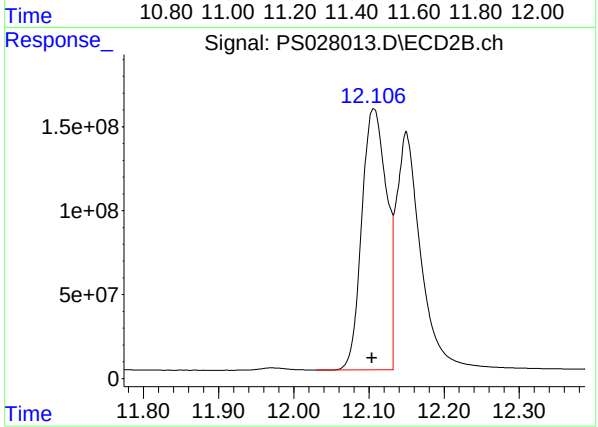
#15 Picloram

R.T.: 12.150 min
Delta R.T.: -0.003 min
Response: 3215922085
Conc: 705.74 ng/ml



#16 DCPA

R.T.: 11.350 min
Delta R.T.: 0.000 min
Response: 13233462472
Conc: 715.77 ng/ml



#16 DCPA

R.T.: 12.107 min
Delta R.T.: 0.002 min
Response: 3579984054
Conc: 771.36 ng/ml

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Continuing Calib Date: 10/24/2024 **Initial Calibration Date(s):** 10/23/2024 10/23/2024

Continuing Calib Time: 11:25 **Initial Calibration Time(s):** 11:28 13:04

GC Column: RTX-CLP **ID:** 0.32 **(mm)**

COMPOUND	CCAL RT	AVG RT	RT WINDOW FROM	RT WINDOW TO	DIFF RT
2,4-DCAA	7.09	7.09	6.99	7.19	0.00
2,4-D	8.18	8.18	8.08	8.28	0.00
2,4,5-TP(Silvex)	9.03	9.03	8.93	9.13	0.00

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Continuing Calib Date: 10/24/2024 **Initial Calibration Date(s):** 10/23/2024 10/23/2024

Continuing Calib Time: 11:25 **Initial Calibration Time(s):** 11:28 13:04

GC Column: RTX-CLP2 **ID:** 0.32 **(mm)**

COMPOUND	CCAL RT	AVG RT	RT WINDOW FROM	RT WINDOW TO	DIFF RT
2,4-DCAA	7.61	7.61	7.51	7.71	0.00
2,4-D	8.84	8.84	8.74	8.94	0.00
2,4,5-TP(Silvex)	9.73	9.73	9.63	9.83	0.00

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900, Fax : 908 789 8922

CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

GC Column: RTX-CLP **ID:** 0.32 **(mm)** **Initi. Calib. Date(s):** 10/23/2024 10/23/2024

Client Sample No.: CCAL01 **Date Analyzed:** 10/24/2024

Lab Sample No.: HSTDCCC750 **Data File :** PS028036.D **Time Analyzed:** 11:25

COMPOUND	RT	RT WINDOW FROM	RT WINDOW TO	CALC AMOUNT(ng)	NOM AMOUNT(ng)	%D
2,4,5-TP(Silvex)	9.028	8.929	9.129	684.860	712.500	-3.9
2,4-D	8.176	8.077	8.277	665.580	705.000	-5.6
2,4-DCAA	7.091	6.991	7.191	709.960	750.000	-5.3

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900, Fax : 908 789 8922

CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

GC Column: RTX-CLP2 **ID:** 0.32 **(mm)** **Initi. Calib. Date(s):** 10/23/2024 10/23/2024

Client Sample No.: CCAL01 **Date Analyzed:** 10/24/2024

Lab Sample No.: HSTDCCC750 **Data File :** PS028036.D **Time Analyzed:** 11:25

COMPOUND	RT	RT WINDOW FROM	RT WINDOW TO	CALC AMOUNT(ng)	NOM AMOUNT(ng)	%D
2,4,5-TP(Silvex)	9.725	9.625	9.825	736.810	712.500	3.4
2,4-D	8.835	8.737	8.937	709.890	705.000	0.7
2,4-DCAA	7.613	7.514	7.714	733.180	750.000	-2.2

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028036.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 11:25
Operator : AR\AJ
Sample : HSTDCCC750
Misc :
ALS Vial : 3 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 01:11:58 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

		Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
		System Monitoring Compounds						
4)	S	2,4-DCAA	7.091	7.613	1914.7E6	695.5E6	709.955	733.178
		Target Compounds						
1)	T	Dalapon	2.541	2.609	2926.4E6	1183.0E6	642.263	693.684
2)	T	3,5-DICHL...	6.283	6.586	2604.7E6	927.7E6	658.246	693.571
3)	T	4-Nitroph...	6.885	7.147	1187.3E6	453.5E6	641.664	655.989
5)	T	DICAMBA	7.269	7.806	7451.1E6	2400.1E6	681.281	726.281
6)	T	MCPP	7.449	7.909	510.0E6	177.2E6	69.554	68.553
7)	T	MCPA	7.594	8.151	706.2E6	308.2E6	66.602	66.971
8)	T	DICHLORPROP	7.955	8.510	1920.5E6	672.1E6	665.995	717.319
9)	T	2,4-D	8.176	8.835	2255.3E6	707.9E6	665.579	709.891
10)	T	Pentachlo...	8.463	9.347	27226.3E6	9287.8E6	688.019	725.260
11)	T	2,4,5-TP ...	9.028	9.725	11061.0E6	3363.3E6	684.860	736.810
12)	T	2,4,5-T	9.313	10.139	11345.2E6	3060.3E6	679.090	744.163
13)	T	2,4-DB	9.875	10.699	1789.3E6	376.1E6	679.603	736.376
14)	T	DINOSEB	11.051	11.073	7315.6E6	2351.4E6	664.638	698.821
15)	T	Picloram	10.866	12.146	14972.7E6	3313.7E6	672.468	727.207
16)	T	DCPA	11.350	12.104	12750.2E6	3536.9E6	689.629	762.079

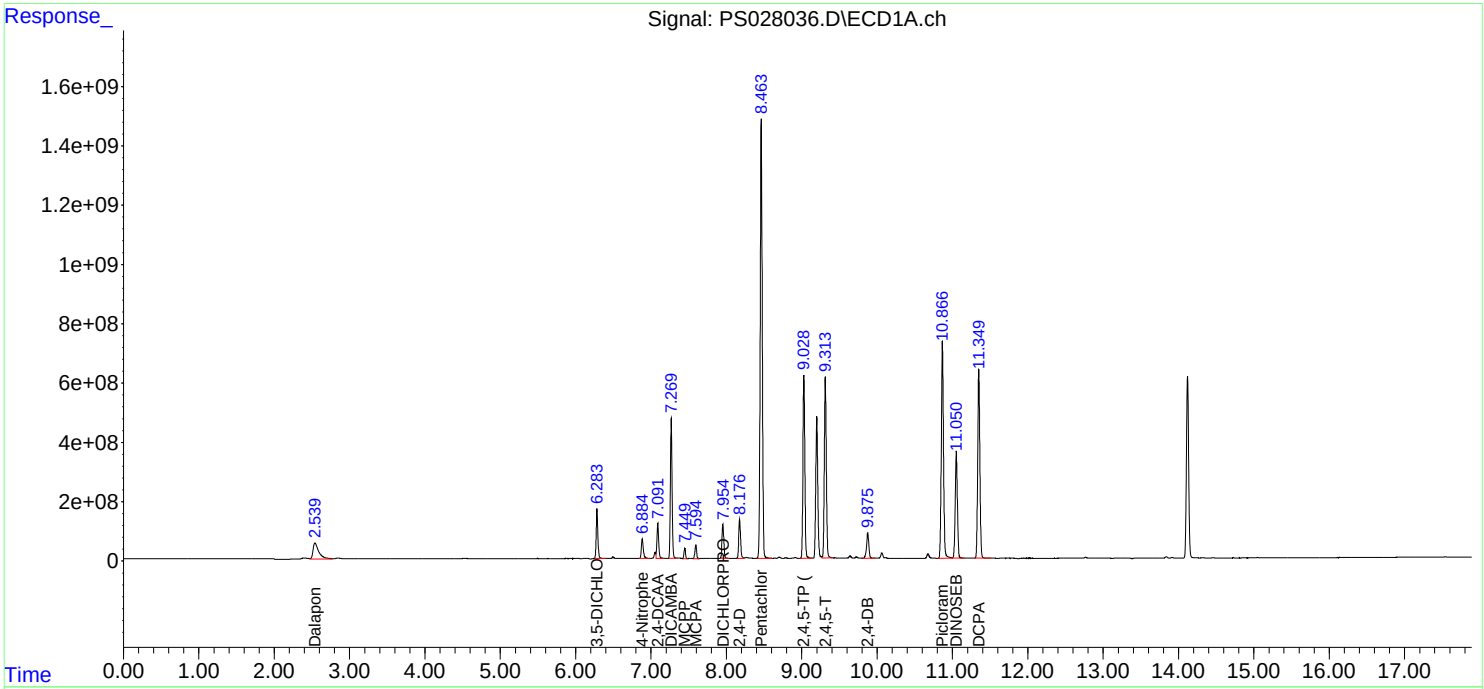
(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

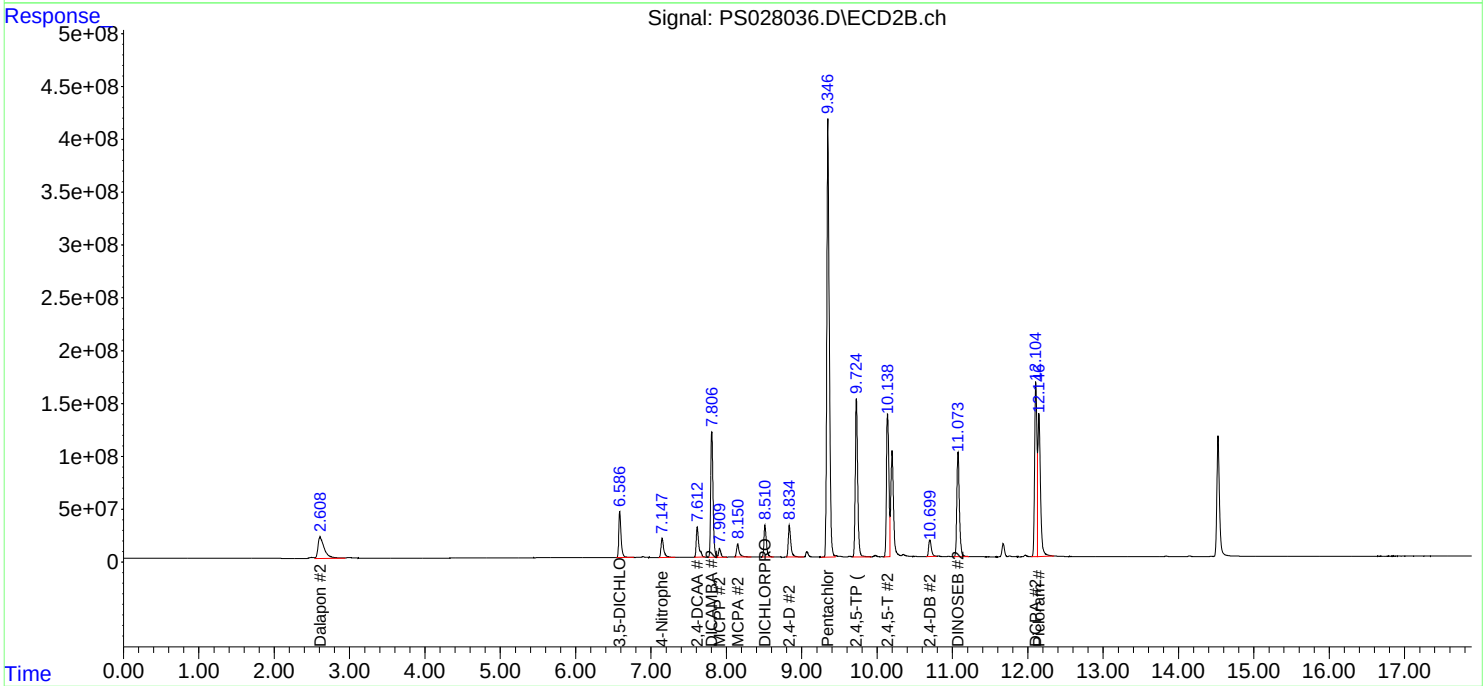
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028036.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 11:25
Operator : AR\AJ
Sample : HSTDCCC750
Misc :
ALS Vial : 3 Sample Multiplier: 1

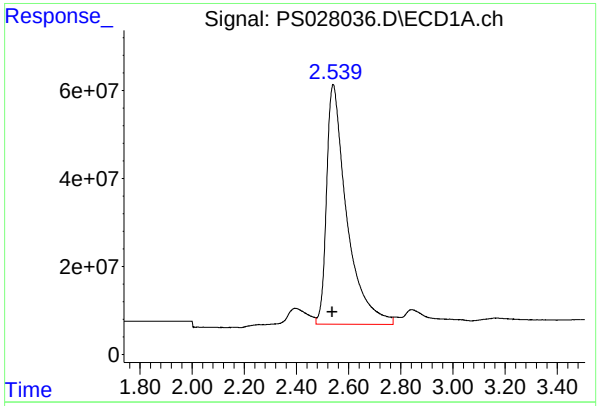
Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 01:11:58 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm



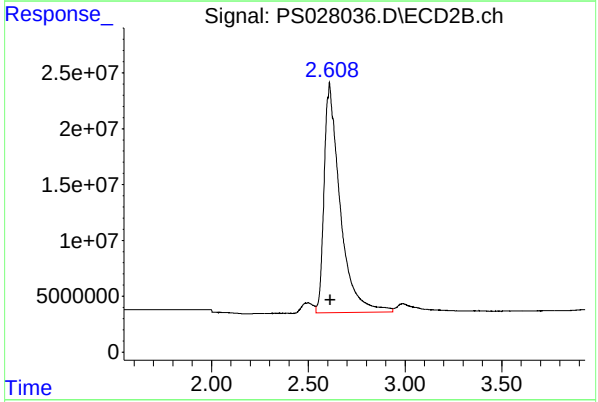




#1 Dalapon

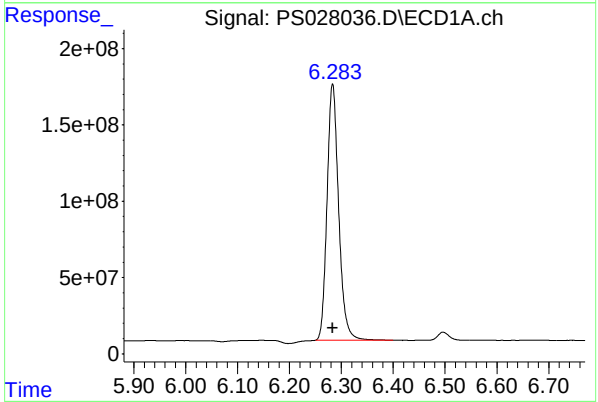
R.T.: 2.541 min
Delta R.T.: 0.003 min
Response: 2926413857
Conc: 642.26 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



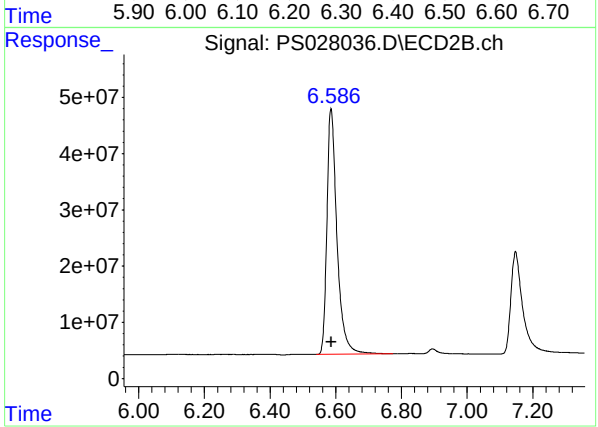
#1 Dalapon

R.T.: 2.609 min
Delta R.T.: -0.003 min
Response: 1183022724
Conc: 693.68 ng/ml



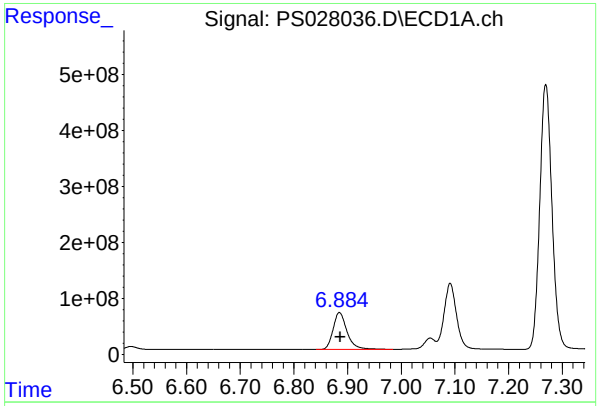
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.283 min
Delta R.T.: 0.000 min
Response: 2604690154
Conc: 658.25 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

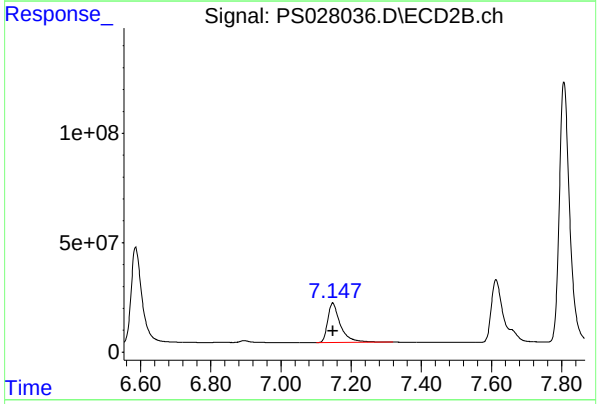
R.T.: 6.586 min
Delta R.T.: -0.002 min
Response: 927654375
Conc: 693.57 ng/ml



#3 4-Nitrophenol

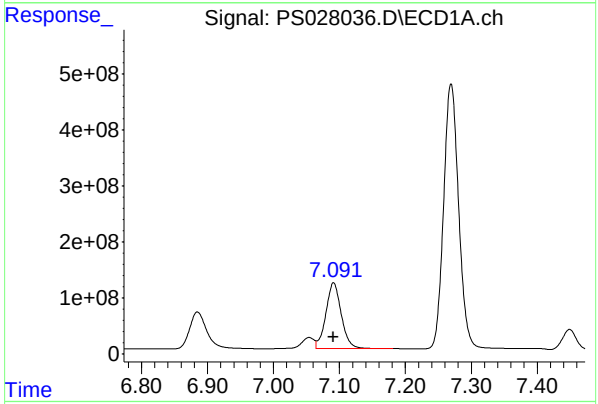
R.T.: 6.885 min
Delta R.T.: -0.002 min
Response: 1187346098
Conc: 641.66 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



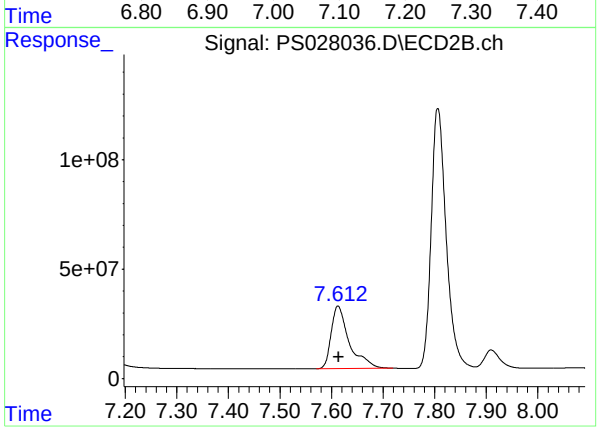
#3 4-Nitrophenol

R.T.: 7.147 min
Delta R.T.: -0.001 min
Response: 453463116
Conc: 655.99 ng/ml



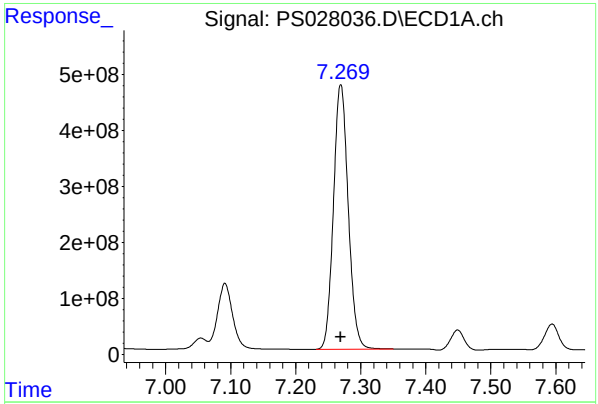
#4 2,4-DCAA

R.T.: 7.091 min
Delta R.T.: 0.000 min
Response: 1914724567
Conc: 709.96 ng/ml



#4 2,4-DCAA

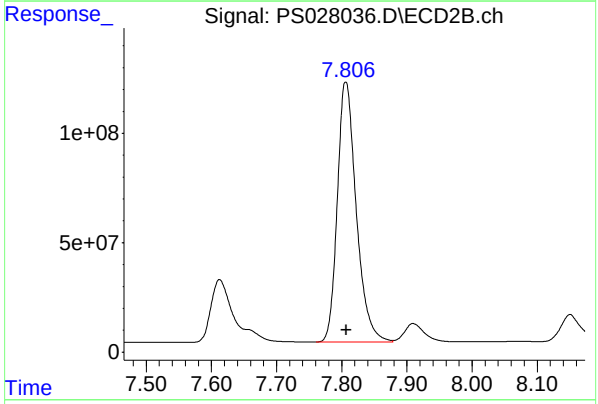
R.T.: 7.613 min
Delta R.T.: -0.002 min
Response: 695549377
Conc: 733.18 ng/ml



#5 DICAMBA

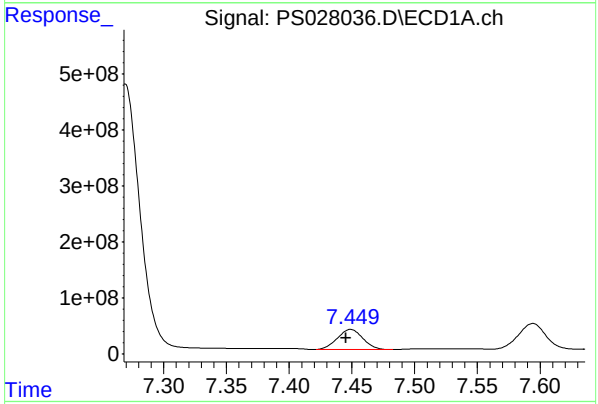
R.T.: 7.269 min
Delta R.T.: 0.000 min
Response: 7451073987
Conc: 681.28 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



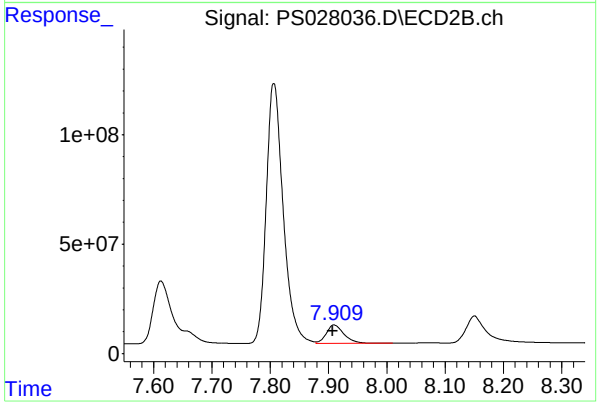
#5 DICAMBA

R.T.: 7.806 min
Delta R.T.: 0.000 min
Response: 2400120377
Conc: 726.28 ng/ml



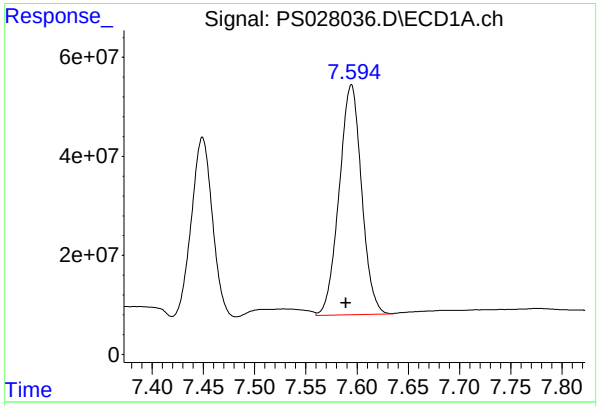
#6 MCPP

R.T.: 7.449 min
Delta R.T.: 0.004 min
Response: 510010743
Conc: 69.55 ug/ml



#6 MCPP

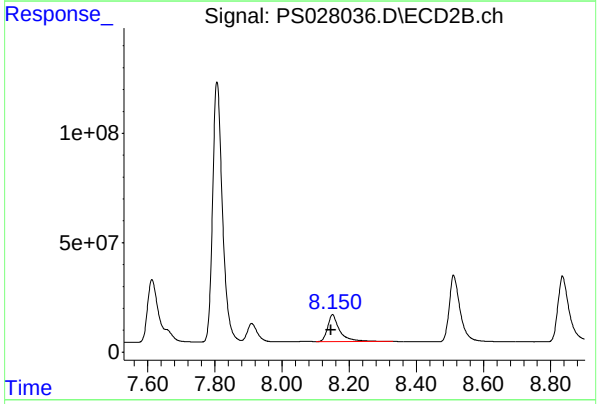
R.T.: 7.909 min
Delta R.T.: 0.002 min
Response: 177212218
Conc: 68.55 ug/ml



#7 MCPA

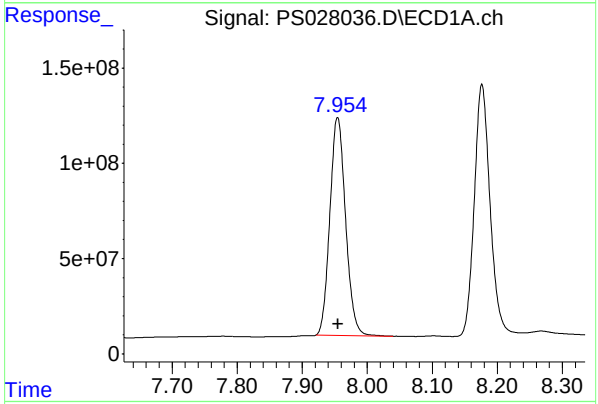
R.T.: 7.594 min
Delta R.T.: 0.005 min
Response: 706243755
Conc: 66.60 ug/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



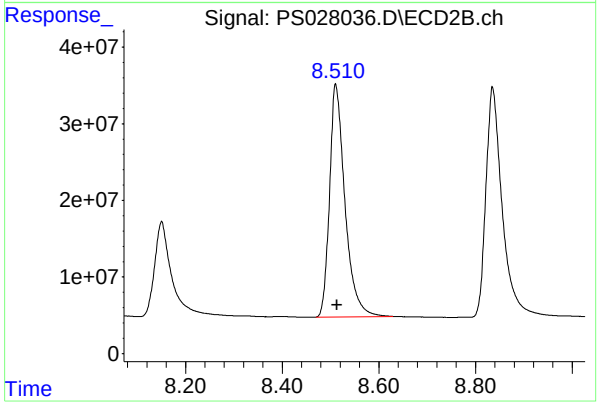
#7 MCPA

R.T.: 8.151 min
Delta R.T.: 0.004 min
Response: 308193606
Conc: 66.97 ug/ml



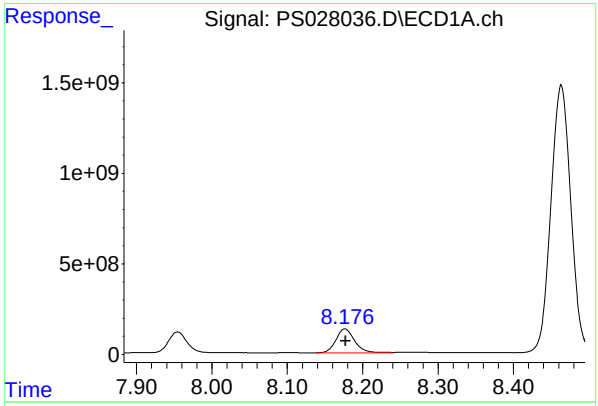
#8 DICHLORPROP

R.T.: 7.955 min
Delta R.T.: 0.000 min
Response: 1920519919
Conc: 666.00 ng/ml



#8 DICHLORPROP

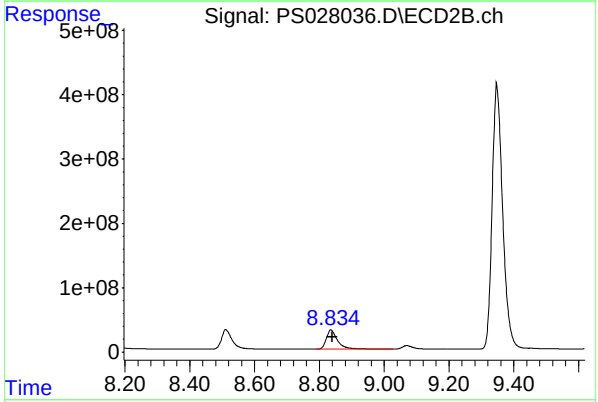
R.T.: 8.510 min
Delta R.T.: -0.003 min
Response: 672093552
Conc: 717.32 ng/ml



#9 2,4-D

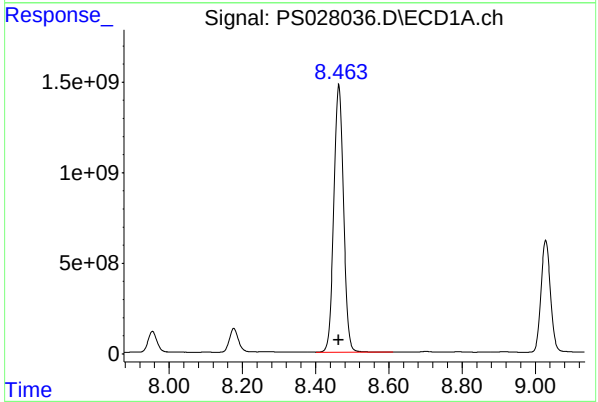
R.T.: 8.176 min
Delta R.T.: -0.001 min
Response: 2255305819
Conc: 665.58 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



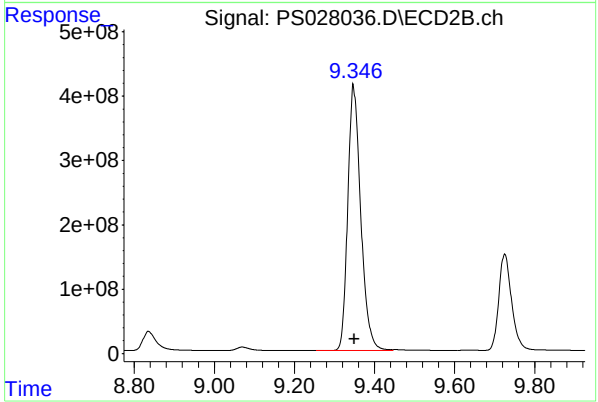
#9 2,4-D

R.T.: 8.835 min
Delta R.T.: -0.005 min
Response: 707864426
Conc: 709.89 ng/ml



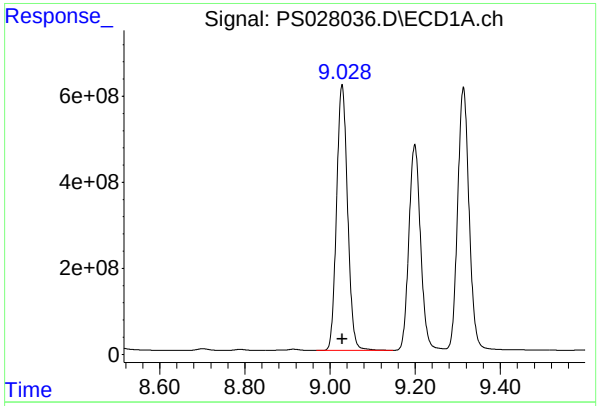
#10 Pentachlorophenol

R.T.: 8.463 min
Delta R.T.: 0.000 min
Response: 27226286381
Conc: 688.02 ng/ml



#10 Pentachlorophenol

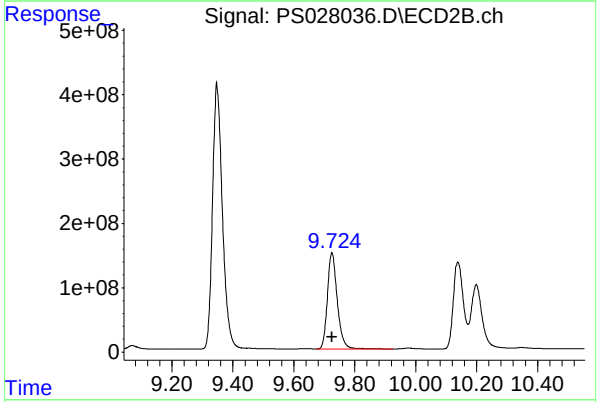
R.T.: 9.347 min
Delta R.T.: -0.002 min
Response: 9287761748
Conc: 725.26 ng/ml



#11 2,4,5-TP (SILVEX)

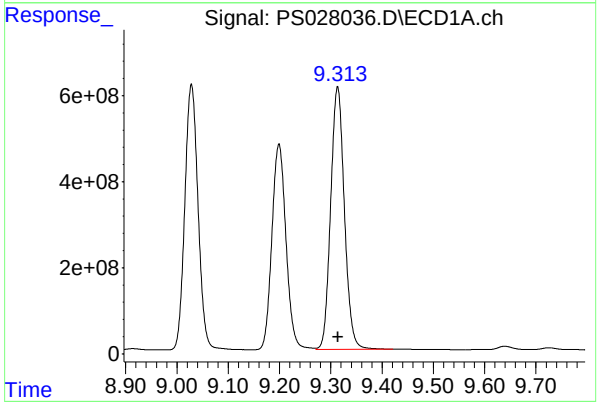
R.T.: 9.028 min
Delta R.T.: 0.000 min
Response: 11061018777
Conc: 684.86 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



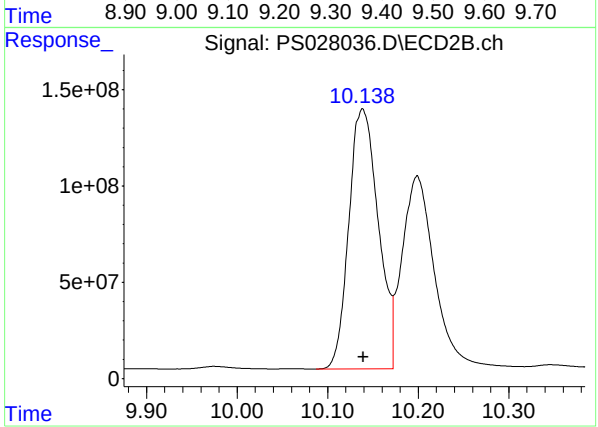
#11 2,4,5-TP (SILVEX)

R.T.: 9.725 min
Delta R.T.: 0.000 min
Response: 3363267769
Conc: 736.81 ng/ml



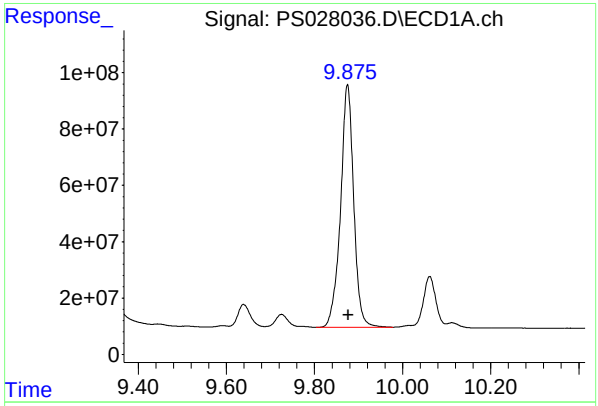
#12 2,4,5-T

R.T.: 9.313 min
Delta R.T.: 0.000 min
Response: 11345232452
Conc: 679.09 ng/ml



#12 2,4,5-T

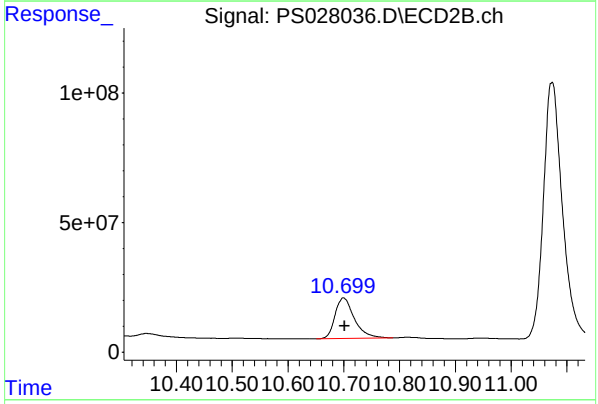
R.T.: 10.139 min
Delta R.T.: 0.000 min
Response: 3060326199
Conc: 744.16 ng/ml



#13 2,4-DB

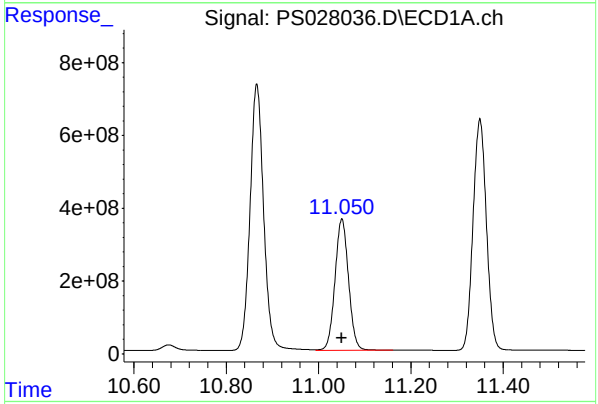
R.T.: 9.875 min
Delta R.T.: -0.002 min
Response: 1789347177
Conc: 679.60 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



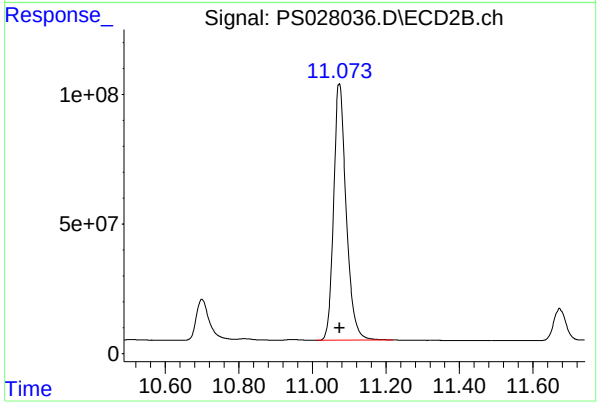
#13 2,4-DB

R.T.: 10.699 min
Delta R.T.: -0.002 min
Response: 376100927
Conc: 736.38 ng/ml



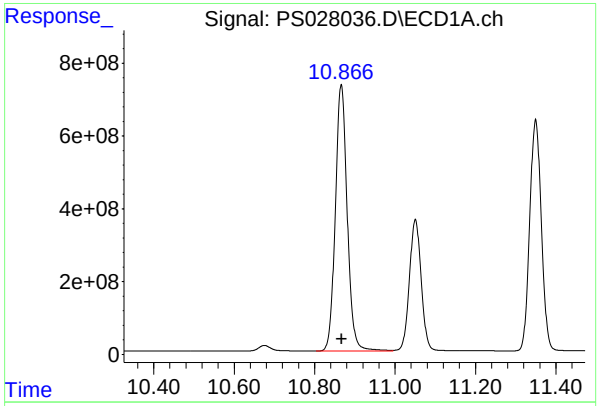
#14 DINOSEB

R.T.: 11.051 min
Delta R.T.: 0.000 min
Response: 7315554626
Conc: 664.64 ng/ml



#14 DINOSEB

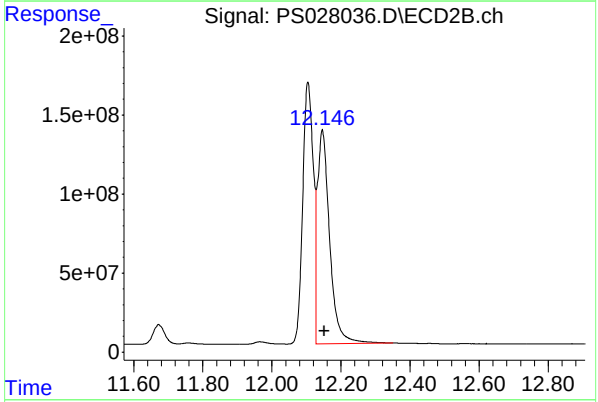
R.T.: 11.073 min
Delta R.T.: -0.001 min
Response: 2351397823
Conc: 698.82 ng/ml



#15 Picloram

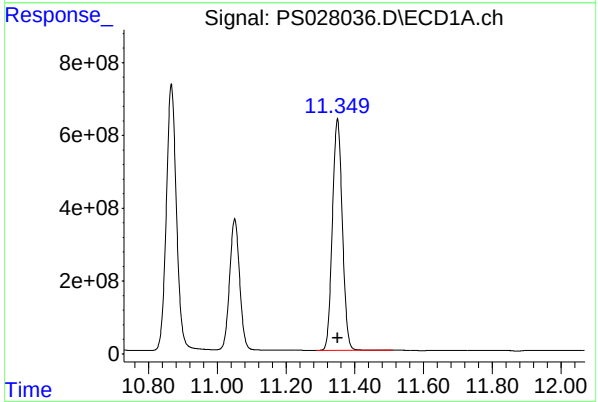
R.T.: 10.866 min
Delta R.T.: 0.000 min
Response: 14972745127
Conc: 672.47 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



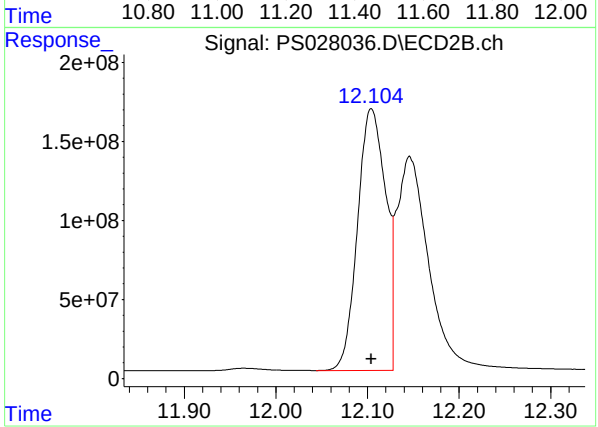
#15 Picloram

R.T.: 12.146 min
Delta R.T.: -0.007 min
Response: 3313734426
Conc: 727.21 ng/ml



#16 DCPA

R.T.: 11.350 min
Delta R.T.: 0.000 min
Response: 12750158940
Conc: 689.63 ng/ml



#16 DCPA

R.T.: 12.104 min
Delta R.T.: 0.000 min
Response: 3536927871
Conc: 762.08 ng/ml

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Continuing Calib Date: 10/24/2024 **Initial Calibration Date(s):** 10/23/2024 10/23/2024

Continuing Calib Time: 21:08 **Initial Calibration Time(s):** 11:28 13:04

GC Column: RTX-CLP **ID:** 0.32 **(mm)**

COMPOUND	CCAL RT	AVG RT	RT WINDOW FROM	RT WINDOW TO	DIFF RT
2,4-DCAA	7.09	7.09	6.99	7.19	0.00
2,4-D	8.18	8.18	8.08	8.28	0.00
2,4,5-TP(Silvex)	9.03	9.03	8.93	9.13	0.00

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Fax : 908 789 8922

CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Continuing Calib Date: 10/24/2024 **Initial Calibration Date(s):** 10/23/2024 10/23/2024

Continuing Calib Time: 21:08 **Initial Calibration Time(s):** 11:28 13:04

GC Column: RTX-CLP2 **ID:** 0.32 **(mm)**

COMPOUND	CCAL RT	AVG RT	RT WINDOW FROM	RT WINDOW TO	DIFF RT
2,4-DCAA	7.61	7.61	7.51	7.71	0.00
2,4-D	8.83	8.84	8.74	8.94	0.01
2,4,5-TP(Silvex)	9.72	9.73	9.63	9.83	0.01

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CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

GC Column: RTX-CLP **ID:** 0.32 (mm) **Initi. Calib. Date(s):** 10/23/2024 10/23/2024

Client Sample No.: CCAL02 **Date Analyzed:** 10/24/2024

Lab Sample No.: HSTDCCC750 **Data File :** PS028047.D **Time Analyzed:** 21:08

COMPOUND	RT	RT WINDOW FROM	RT WINDOW TO	CALC AMOUNT(ng)	NOM AMOUNT(ng)	%D
2,4,5-TP(Silvex)	9.027	8.929	9.129	693.140	712.500	-2.7
2,4-D	8.176	8.077	8.277	681.790	705.000	-3.3
2,4-DCAA	7.090	6.991	7.191	722.190	750.000	-3.7

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CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

GC Column: RTX-CLP2 **ID:** 0.32 **(mm)** **Initi. Calib. Date(s):** 10/23/2024 10/23/2024

Client Sample No.: CCAL02 **Date Analyzed:** 10/24/2024

Lab Sample No.: HSTDCCC750 **Data File :** PS028047.D **Time Analyzed:** 21:08

COMPOUND	RT	RT WINDOW FROM	RT WINDOW TO	CALC AMOUNT(ng)	NOM AMOUNT(ng)	%D
2,4,5-TP(Silvex)	9.723	9.625	9.825	791.420	712.500	11.1
2,4-D	8.833	8.737	8.937	737.820	705.000	4.7
2,4-DCAA	7.612	7.514	7.714	784.260	750.000	4.6

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028047.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 21:08
Operator : AR\AJ
Sample : HSTDCCC750
Misc :
ALS Vial : 3 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 01:12:51 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.090	7.612	1947.7E6	744.0E6	722.187	784.263
	Target Compounds						
1) T	Dalapon	2.541	2.603	2946.3E6	1202.9E6	646.626	705.345
2) T	3,5-DICHL...	6.282	6.584	2627.5E6	940.2E6	663.998	702.935
3) T	4-Nitroph...	6.884	7.146	1206.9E6	475.2E6	652.255	687.425
5) T	DICAMBA	7.269	7.806	7529.8E6	2445.9E6	688.478	740.124
6) T	MCPP	7.448	7.909	513.4E6	185.2E6	70.011	71.660
7) T	MCPA	7.594	8.148	724.7E6	310.2E6	68.341	67.407
8) T	DICHLORPROP	7.954	8.511	1928.1E6	688.0E6	668.620	734.259
9) T	2,4-D	8.176	8.833	2310.2E6	735.7E6	681.793	737.822
10) T	Pentachlo...	8.463	9.347	27782.2E6	9831.0E6	702.068	767.681
11) T	2,4,5-TP ...	9.027	9.723	11194.8E6	3612.5E6	693.143	791.419
12) T	2,4,5-T	9.312	10.138	11641.6E6	3152.6E6	696.829	766.596
13) T	2,4-DB	9.875	10.698	1821.8E6	393.2E6	691.917	769.807
14) T	DINOSEB	11.049	11.072	7338.6E6	2446.0E6	666.732	726.948
15) T	Picloram	10.865	12.142	15075.2E6	3466.2E6	677.070	760.665
16) T	DCPA	11.349	12.104	12975.8E6	3283.7E6	701.834	707.527

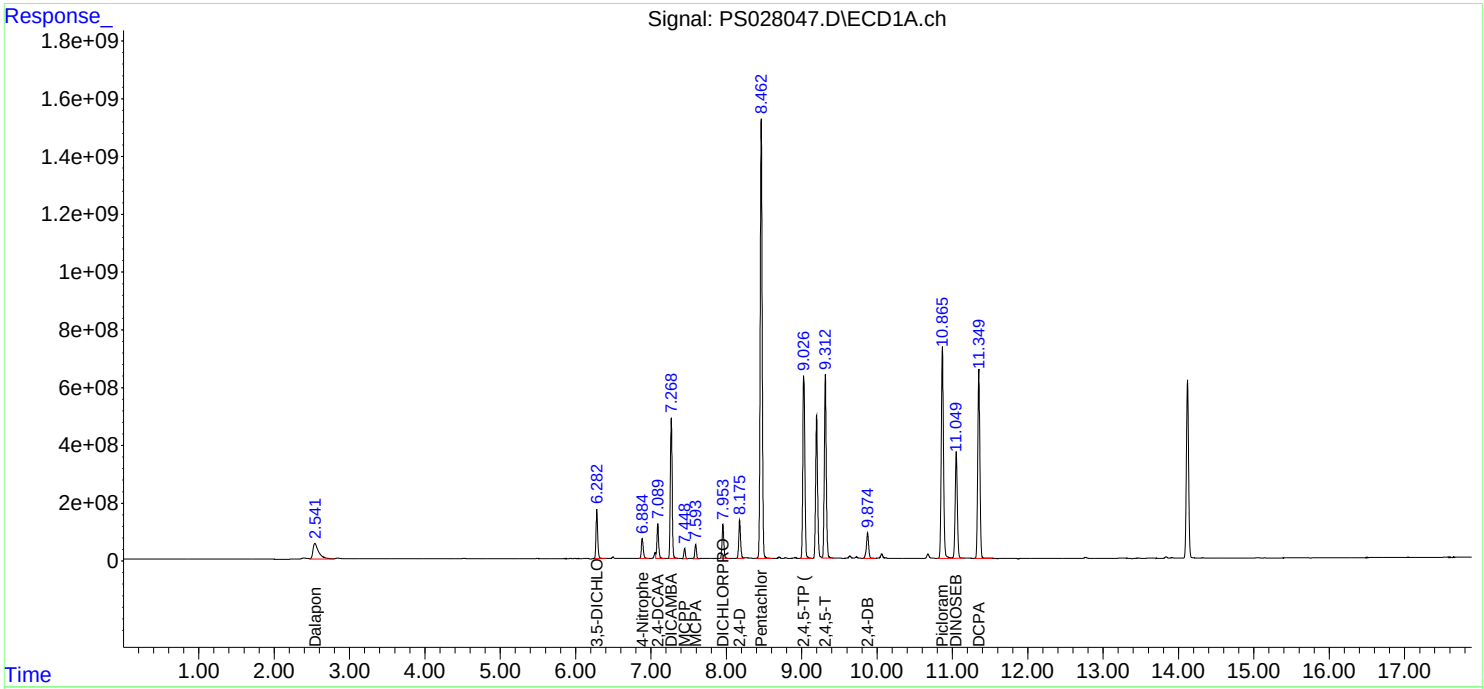
(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

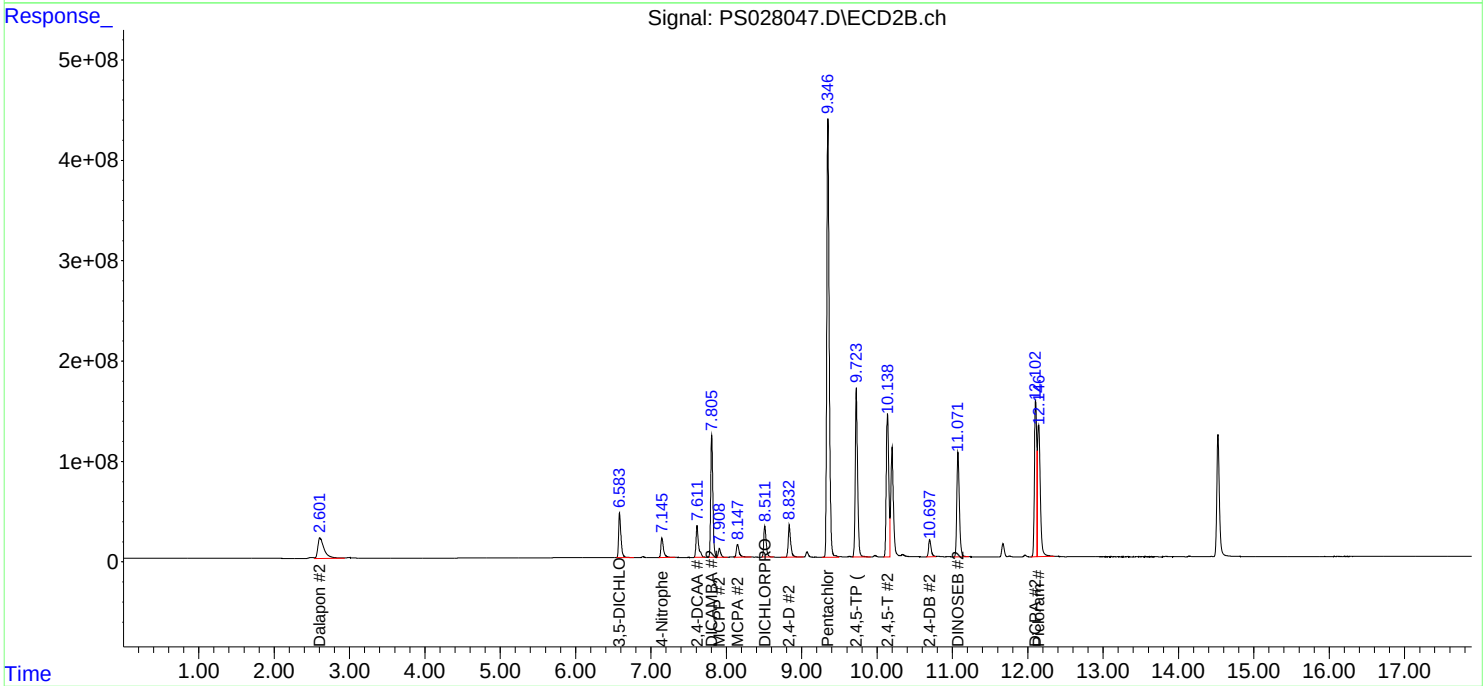
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028047.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 21:08
Operator : AR\AJ
Sample : HSTDCCC750
Misc :
ALS Vial : 3 Sample Multiplier: 1

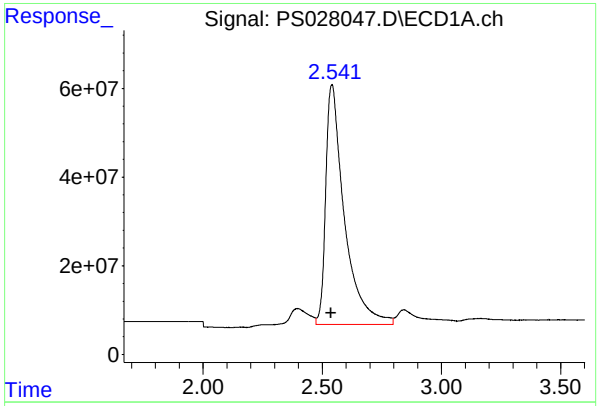
Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 01:12:51 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm



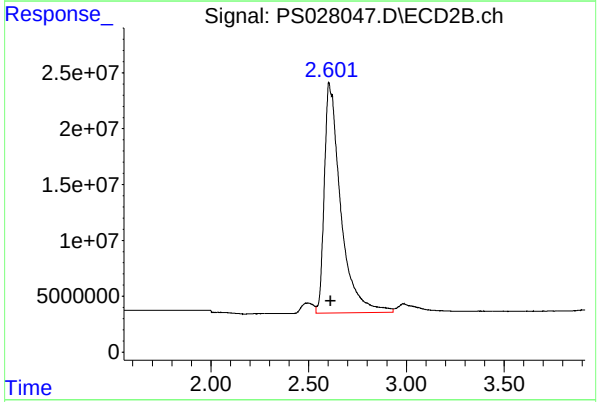




#1 Dalapon

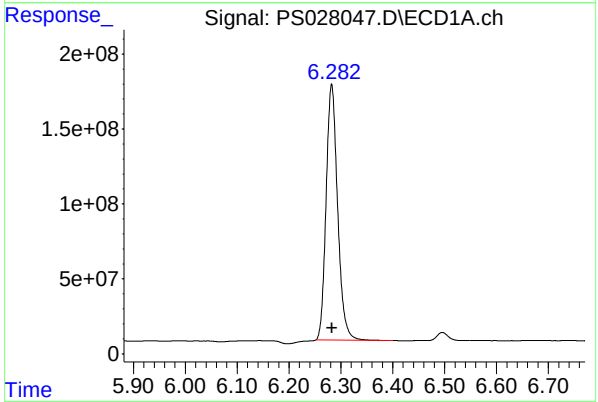
R.T.: 2.541 min
Delta R.T.: 0.003 min
Response: 2946296309
Conc: 646.63 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



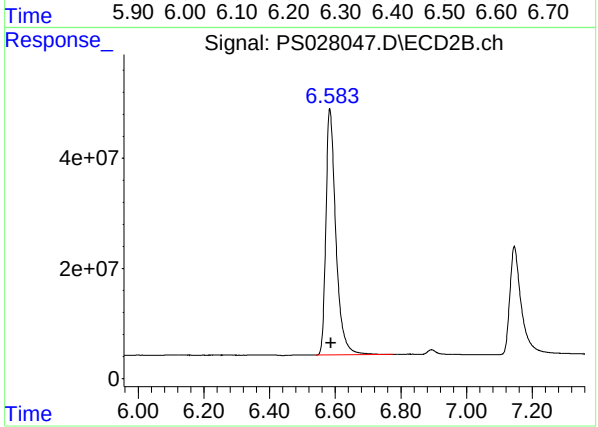
#1 Dalapon

R.T.: 2.603 min
Delta R.T.: -0.009 min
Response: 1202909319
Conc: 705.35 ng/ml



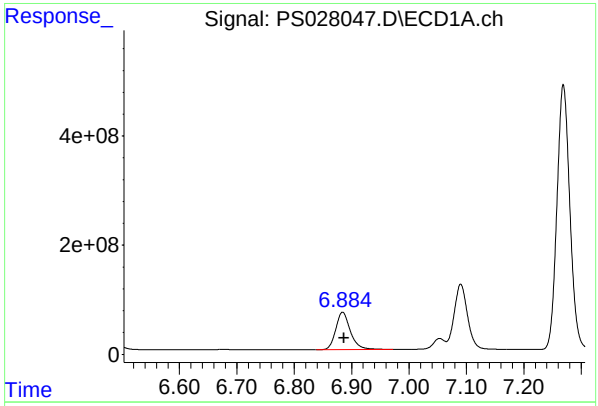
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.282 min
Delta R.T.: -0.001 min
Response: 2627450704
Conc: 664.00 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

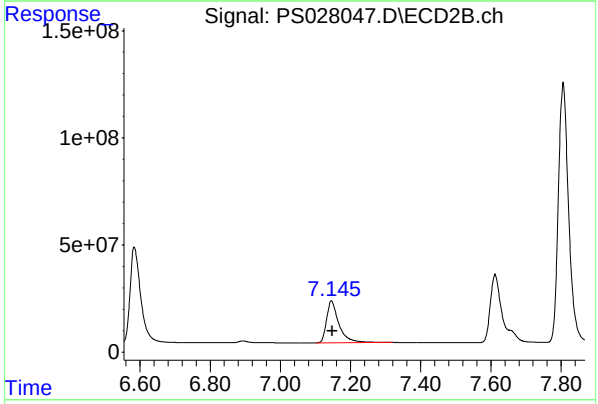
R.T.: 6.584 min
Delta R.T.: -0.003 min
Response: 940178321
Conc: 702.93 ng/ml



#3 4-Nitrophenol

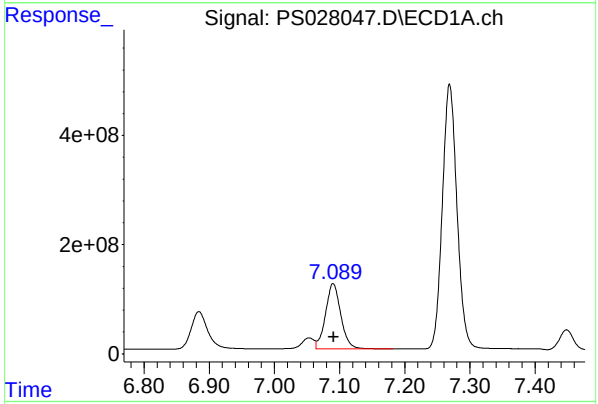
R.T.: 6.884 min
Delta R.T.: -0.002 min
Response: 1206944036
Conc: 652.26 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



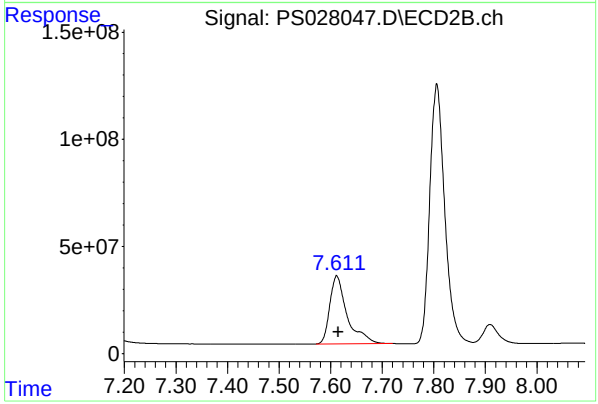
#3 4-Nitrophenol

R.T.: 7.146 min
Delta R.T.: -0.003 min
Response: 475193546
Conc: 687.43 ng/ml



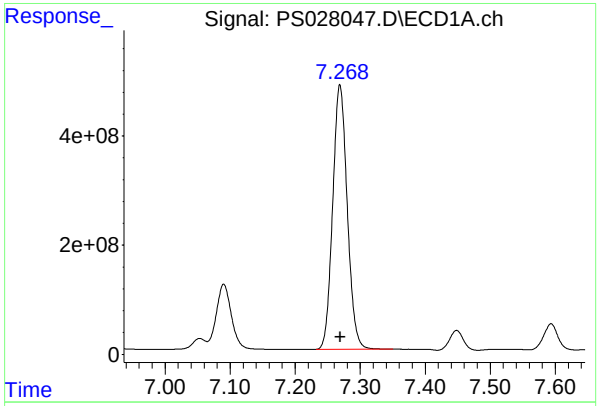
#4 2,4-DCAA

R.T.: 7.090 min
Delta R.T.: 0.000 min
Response: 1947711819
Conc: 722.19 ng/ml



#4 2,4-DCAA

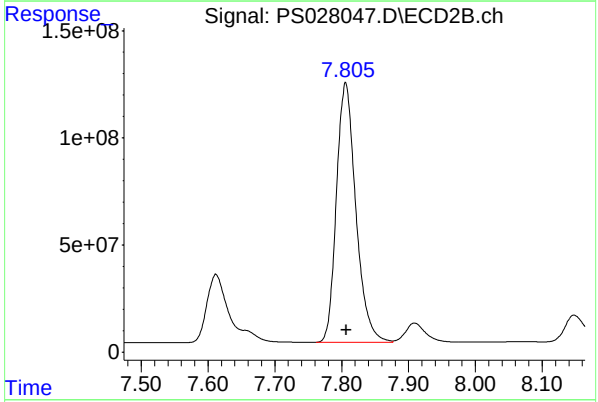
R.T.: 7.612 min
Delta R.T.: -0.003 min
Response: 744012733
Conc: 784.26 ng/ml



#5 DICAMBA

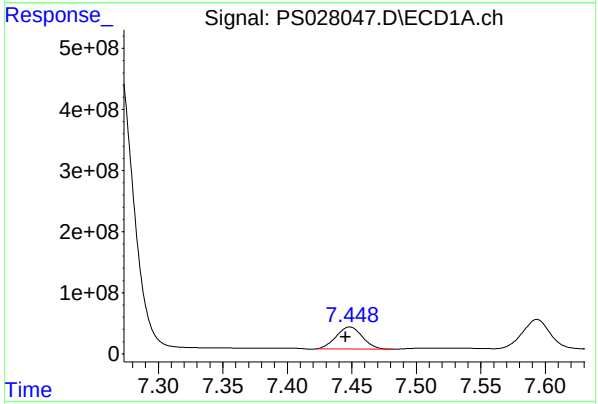
R.T.: 7.269 min
Delta R.T.: 0.000 min
Response: 7529776659
Conc: 688.48 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



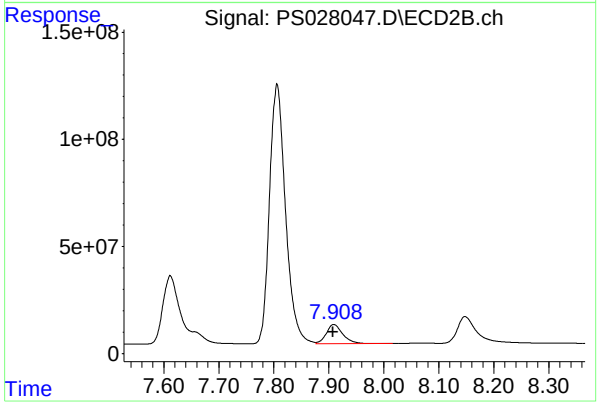
#5 DICAMBA

R.T.: 7.806 min
Delta R.T.: 0.000 min
Response: 2445866485
Conc: 740.12 ng/ml



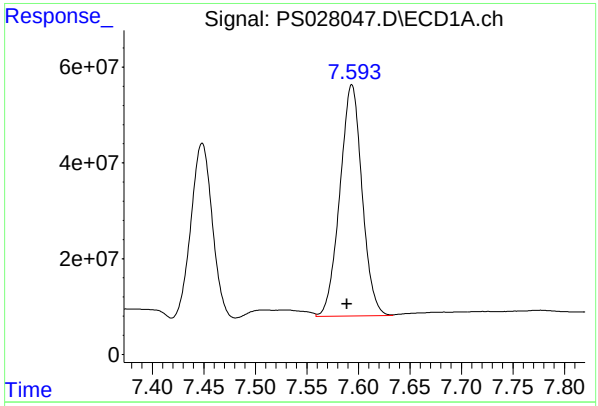
#6 MCPP

R.T.: 7.448 min
Delta R.T.: 0.003 min
Response: 513356664
Conc: 70.01 ug/ml



#6 MCPP

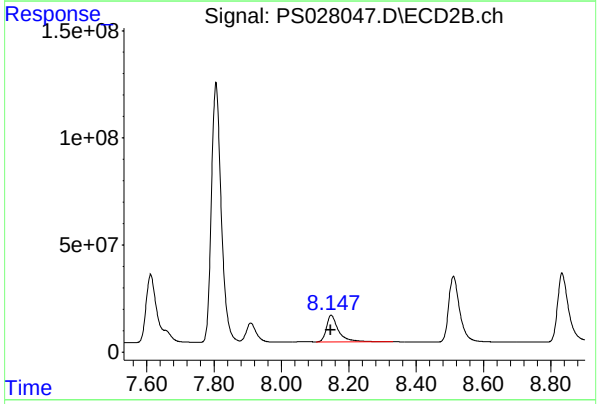
R.T.: 7.909 min
Delta R.T.: 0.002 min
Response: 185243379
Conc: 71.66 ug/ml



#7 MCPA

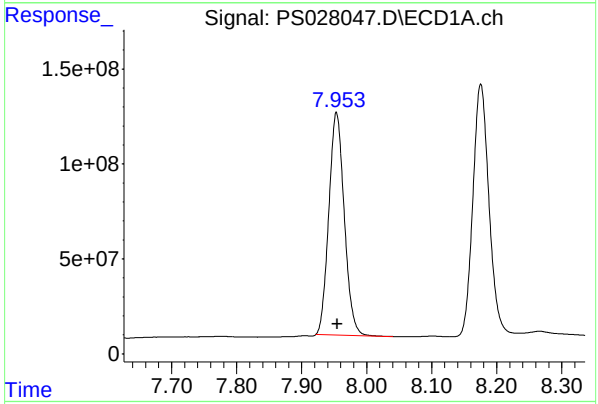
R.T.: 7.594 min
Delta R.T.: 0.004 min
Response: 724673847
Conc: 68.34 ug/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



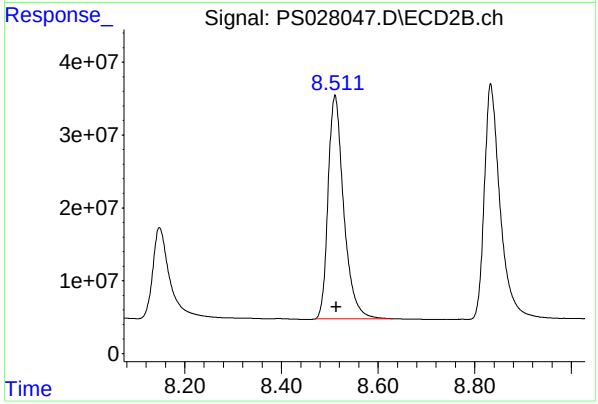
#7 MCPA

R.T.: 8.148 min
Delta R.T.: 0.001 min
Response: 310201592
Conc: 67.41 ug/ml



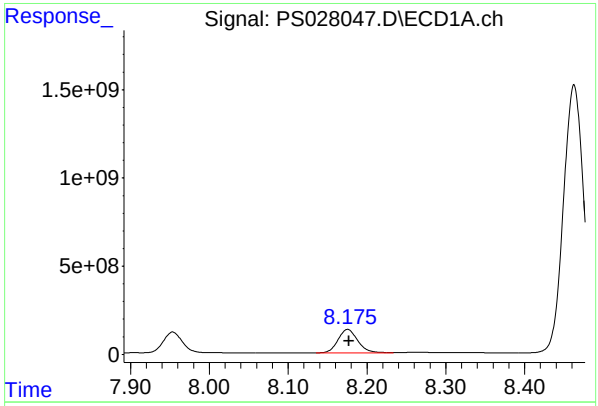
#8 DICHLORPROP

R.T.: 7.954 min
Delta R.T.: -0.001 min
Response: 1928088242
Conc: 668.62 ng/ml



#8 DICHLORPROP

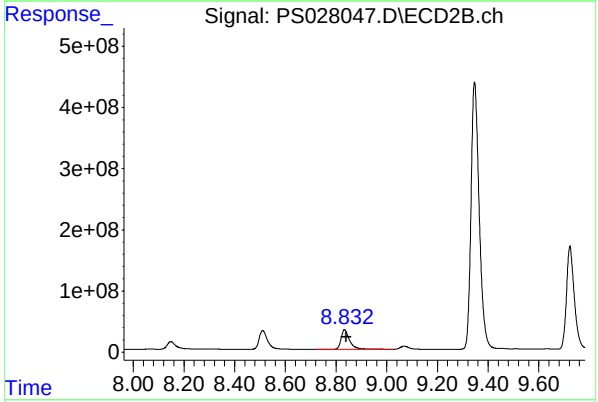
R.T.: 8.511 min
Delta R.T.: -0.002 min
Response: 687965256
Conc: 734.26 ng/ml



#9 2,4-D

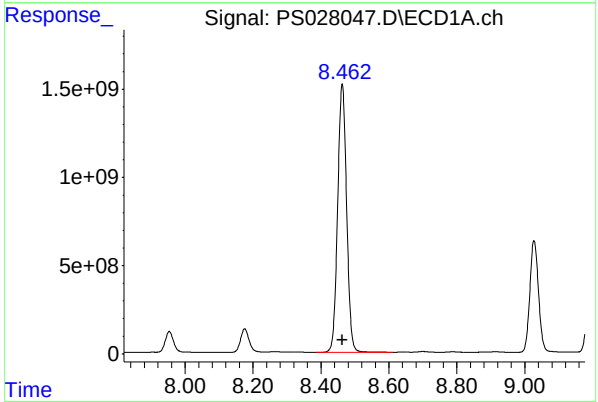
R.T.: 8.176 min
Delta R.T.: -0.002 min
Response: 2310247949
Conc: 681.79 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



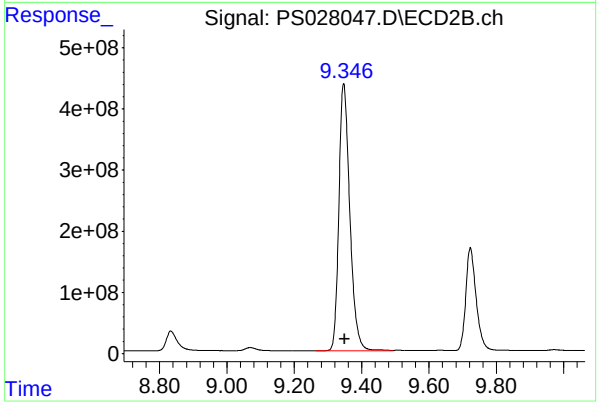
#9 2,4-D

R.T.: 8.833 min
Delta R.T.: -0.007 min
Response: 735715104
Conc: 737.82 ng/ml



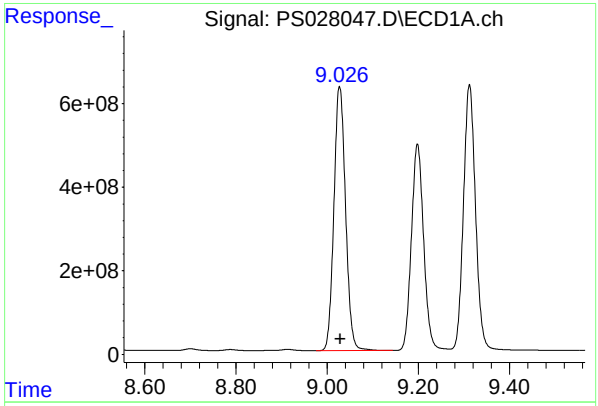
#10 Pentachlorophenol

R.T.: 8.463 min
Delta R.T.: 0.000 min
Response: 27782233520
Conc: 702.07 ng/ml



#10 Pentachlorophenol

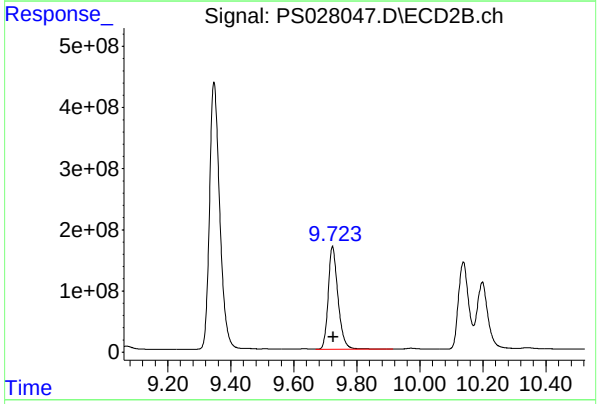
R.T.: 9.347 min
Delta R.T.: -0.003 min
Response: 9831009551
Conc: 767.68 ng/ml



#11 2,4,5-TP (SILVEX)

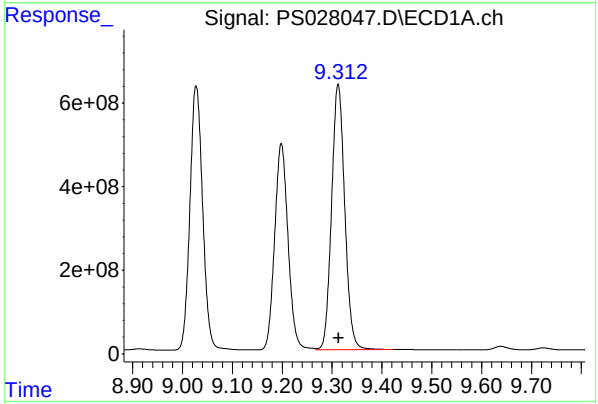
R.T.: 9.027 min
Delta R.T.: -0.001 min
Response: 11194798652
Conc: 693.14 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



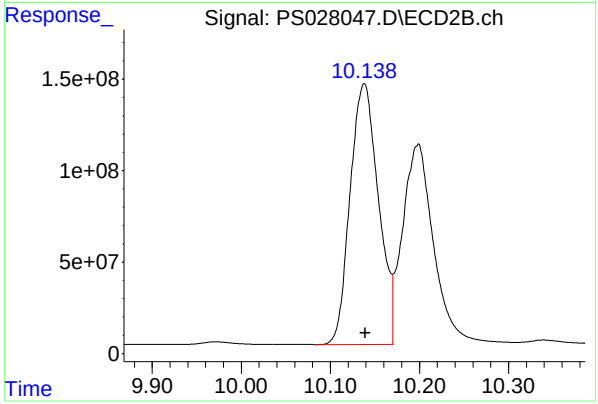
#11 2,4,5-TP (SILVEX)

R.T.: 9.723 min
Delta R.T.: -0.003 min
Response: 3612536095
Conc: 791.42 ng/ml



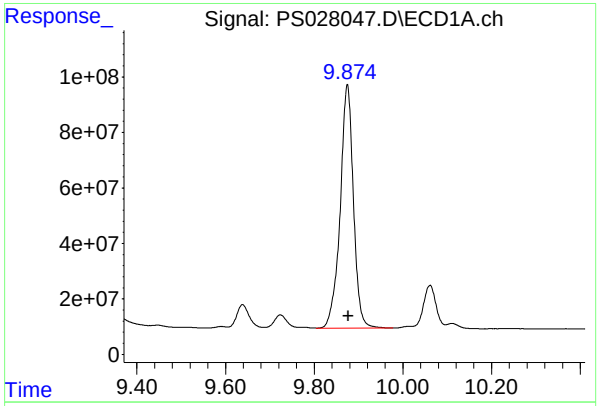
#12 2,4,5-T

R.T.: 9.312 min
Delta R.T.: -0.001 min
Response: 11641601262
Conc: 696.83 ng/ml



#12 2,4,5-T

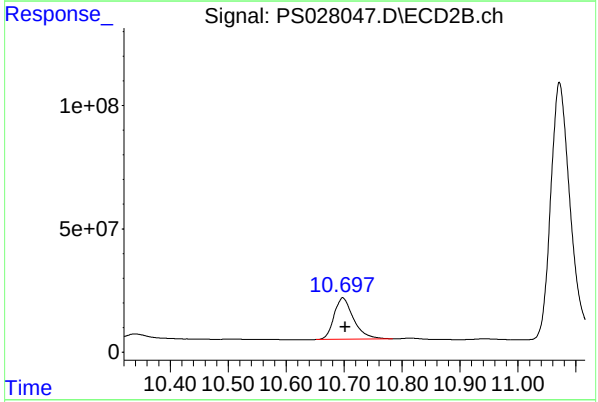
R.T.: 10.138 min
Delta R.T.: -0.001 min
Response: 3152580283
Conc: 766.60 ng/ml



#13 2,4-DB

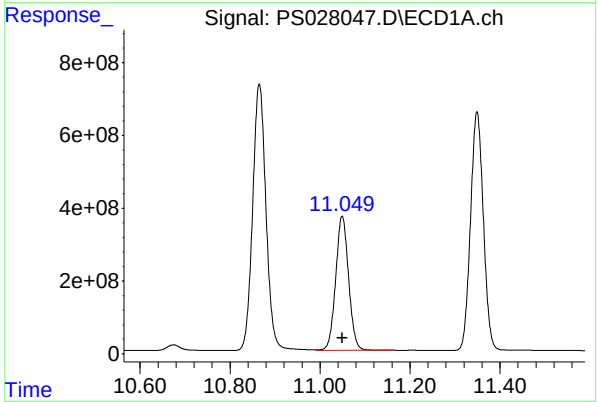
R.T.: 9.875 min
Delta R.T.: -0.002 min
Response: 1821769055
Conc: 691.92 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



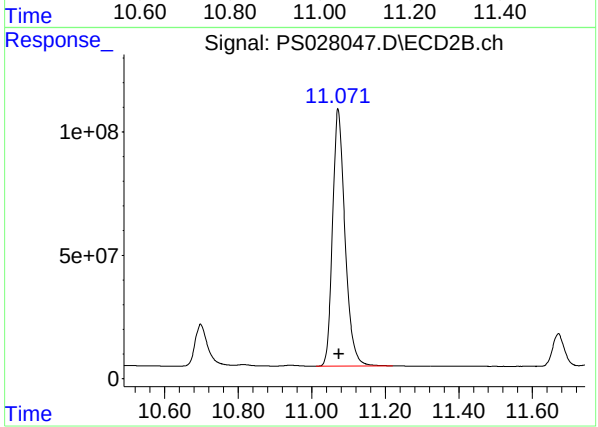
#13 2,4-DB

R.T.: 10.698 min
Delta R.T.: -0.004 min
Response: 393175354
Conc: 769.81 ng/ml



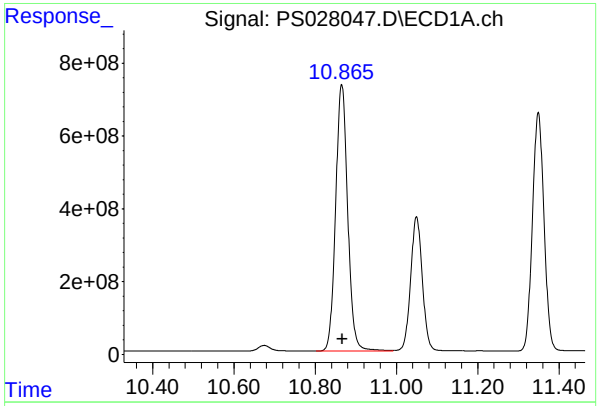
#14 DINOSEB

R.T.: 11.049 min
Delta R.T.: 0.000 min
Response: 7338595687
Conc: 666.73 ng/ml



#14 DINOSEB

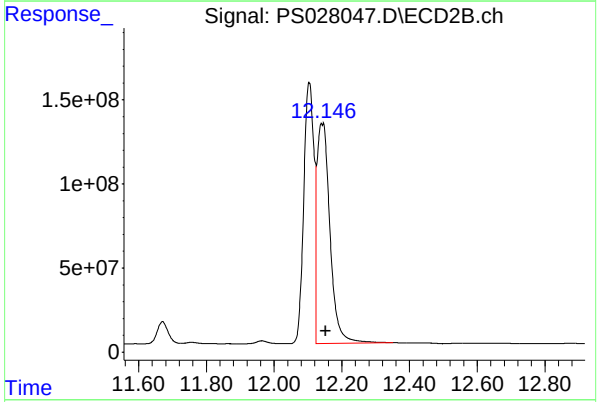
R.T.: 11.072 min
Delta R.T.: -0.003 min
Response: 2446040574
Conc: 726.95 ng/ml



#15 Picloram

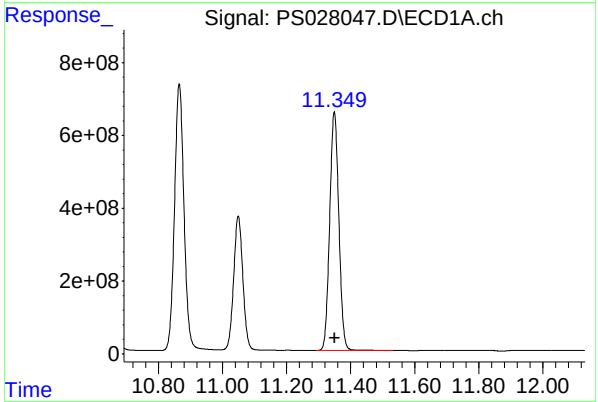
R.T.: 10.865 min
Delta R.T.: -0.002 min
Response: 15075209358
Conc: 677.07 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



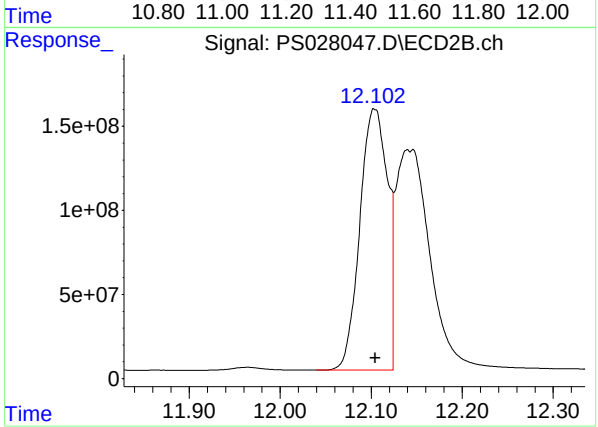
#15 Picloram

R.T.: 12.142 min
Delta R.T.: -0.010 min
Response: 3466192690
Conc: 760.66 ng/ml



#16 DCPA

R.T.: 11.349 min
Delta R.T.: 0.000 min
Response: 12975795224
Conc: 701.83 ng/ml



#16 DCPA

R.T.: 12.104 min
Delta R.T.: 0.000 min
Response: 3283743901
Conc: 707.53 ng/ml

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Continuing Calib Date: 10/28/2024 **Initial Calibration Date(s):** 10/23/2024 10/23/2024

Continuing Calib Time: 10:32 **Initial Calibration Time(s):** 11:28 13:04

GC Column: RTX-CLP **ID:** 0.32 **(mm)**

COMPOUND	CCAL RT	AVG RT	RT WINDOW FROM	RT WINDOW TO	DIFF RT
2,4-DCAA	7.09	7.09	6.99	7.19	0.00
2,4-D	8.17	8.18	8.08	8.28	0.01
2,4,5-TP(Silvex)	9.03	9.03	8.93	9.13	0.01

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Fax : 908 789 8922

CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Continuing Calib Date: 10/28/2024 **Initial Calibration Date(s):** 10/23/2024 10/23/2024

Continuing Calib Time: 10:32 **Initial Calibration Time(s):** 11:28 13:04

GC Column: RTX-CLP2 **ID:** 0.32 **(mm)**

COMPOUND	CCAL RT	AVG RT	RT WINDOW FROM	RT WINDOW TO	DIFF RT
2,4-DCAA	7.61	7.61	7.51	7.71	0.00
2,4-D	8.83	8.84	8.74	8.94	0.01
2,4,5-TP(Silvex)	9.72	9.73	9.63	9.83	0.01

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CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

GC Column: RTX-CLP **ID:** 0.32 **(mm)** **Initi. Calib. Date(s):** 10/23/2024 10/23/2024

Client Sample No.: CCAL03 **Date Analyzed:** 10/28/2024

Lab Sample No.: HSTDCCC750 **Data File :** PS028072.D **Time Analyzed:** 10:32

COMPOUND	RT	RT WINDOW FROM	RT WINDOW TO	CALC AMOUNT(ng)	NOM AMOUNT(ng)	%D
2,4,5-TP(Silvex)	9.025	8.929	9.129	699.070	712.500	-1.9
2,4-D	8.173	8.077	8.277	675.860	705.000	-4.1
2,4-DCAA	7.088	6.991	7.191	727.270	750.000	-3.0

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CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

GC Column: RTX-CLP2 **ID:** 0.32 **(mm)** **Initi. Calib. Date(s):** 10/23/2024 10/23/2024

Client Sample No.: CCAL03 **Date Analyzed:** 10/28/2024

Lab Sample No.: HSTDCCC750 **Data File :** PS028072.D **Time Analyzed:** 10:32

COMPOUND	RT	RT WINDOW FROM	RT WINDOW TO	CALC AMOUNT(ng)	NOM AMOUNT(ng)	%D
2,4,5-TP(Silvex)	9.719	9.625	9.825	764.520	712.500	7.3
2,4-D	8.832	8.737	8.937	690.400	705.000	-2.1
2,4-DCAA	7.609	7.514	7.714	754.150	750.000	0.6

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102824\
Data File : PS028072.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 28 Oct 2024 10:32
Operator : AR\AJ
Sample : HSTDCCC750
Misc :
ALS Vial : 3 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

Manual Integrations APPROVED
Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 29 00:22:53 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.088	7.609	1961.4E6	715.4E6	727.274	754.149
	Target Compounds						
1) T	Dalapon	2.538	2.613	3003.3E6	1186.4E6	659.130	695.648
2) T	3,5-DICHL...	6.280	6.582	2590.8E6	925.3E6	654.738	691.848
3) T	4-Nitroph...	6.882	7.142	1208.5E6	461.7E6	653.099	667.906
5) T	DICAMBA	7.267	7.803	7562.6E6	2341.5E6	691.481	708.527
6) T	MCPP	7.446	7.906	501.0E6	181.9E6	68.324	70.367m
7) T	MCPA	7.591	8.145	735.2E6	328.9E6	69.332	71.466
8) T	DICHLORPROP	7.951	8.505	1891.0E6	671.2E6	655.745	716.397
9) T	2,4-D	8.173	8.832	2290.2E6	688.4E6	675.862	690.398
10) T	Pentachlo...	8.459	9.343	27891.5E6	9731.4E6	704.831	759.906
11) T	2,4,5-TP ...	9.025	9.719	11290.4E6	3489.8E6	699.065	764.523
12) T	2,4,5-T	9.310	10.134	11510.9E6	3041.4E6	689.007	739.570
13) T	2,4-DB	9.872	10.695	1807.0E6	336.9E6	686.325	659.608
14) T	DINOSEB	11.046	11.068	7522.3E6	2303.5E6	683.423	684.574
15) T	Picloram	10.863	12.140	15297.2E6	2959.8E6	687.041	649.527
16) T	DCPA	11.346	12.099	12788.4E6	3546.1E6	691.698	764.055

(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

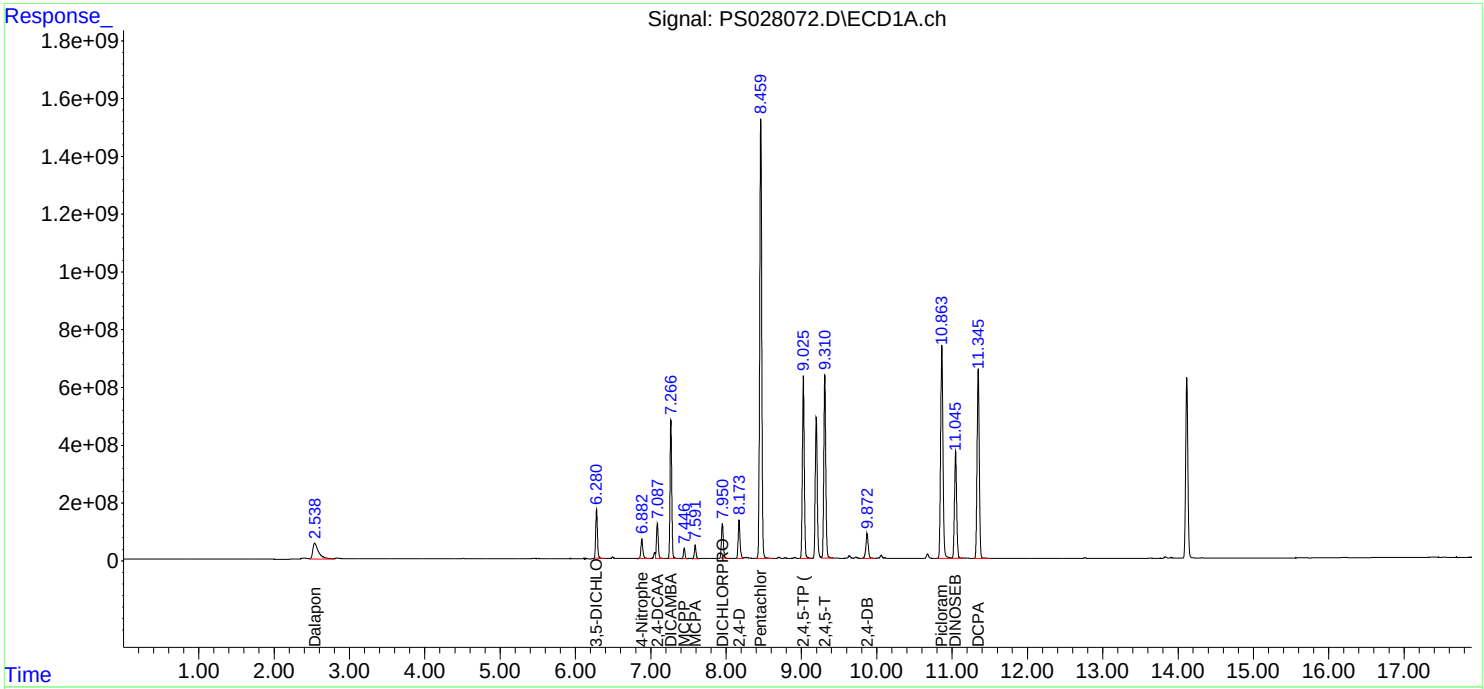
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102824\
Data File : PS028072.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 28 Oct 2024 10:32
Operator : AR\AJ
Sample : HSTDCCC750
Misc :
ALS Vial : 3 Sample Multiplier: 1

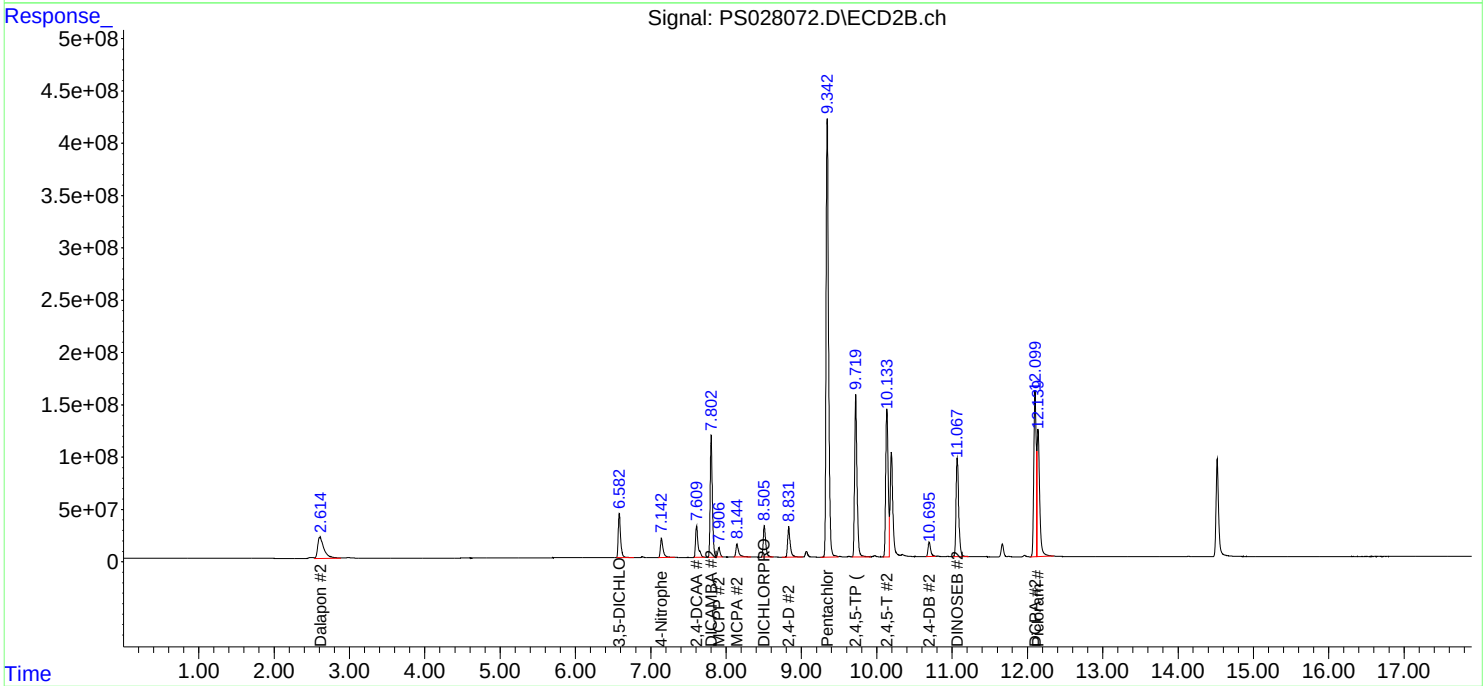
Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

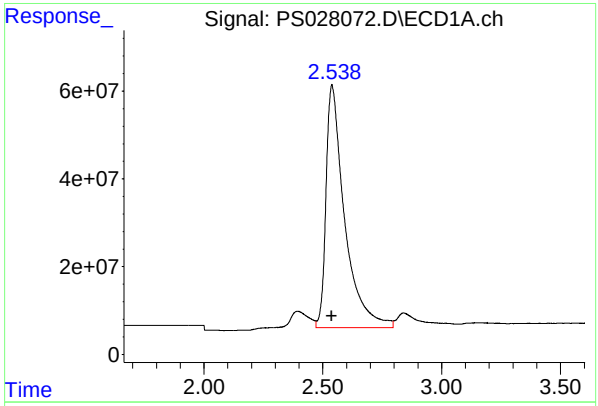
Manual Integrations APPROVED
Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 29 00:22:53 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm







#1 Dalapon

R.T.: 2.538 min
Delta R.T.: 0.000 min
Response: 3003269054
Conc: 659.13 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/29/2024
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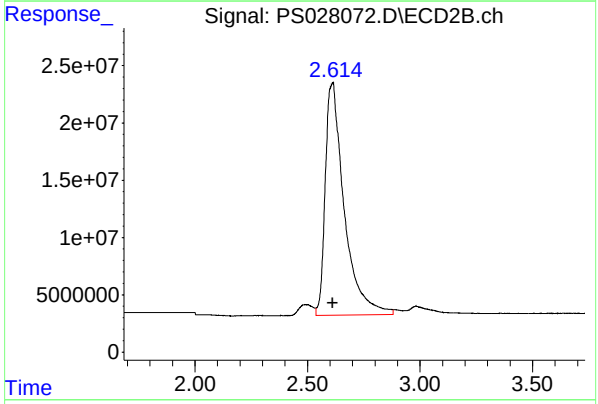
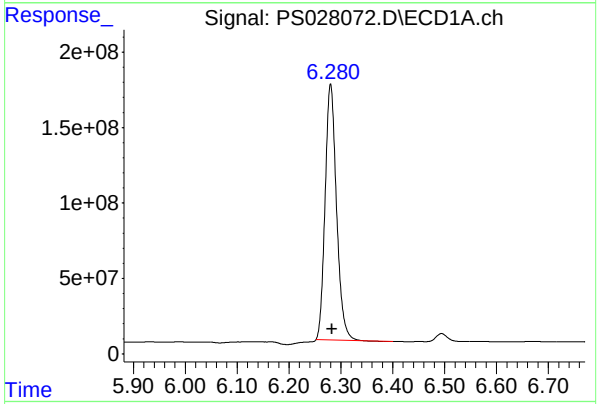


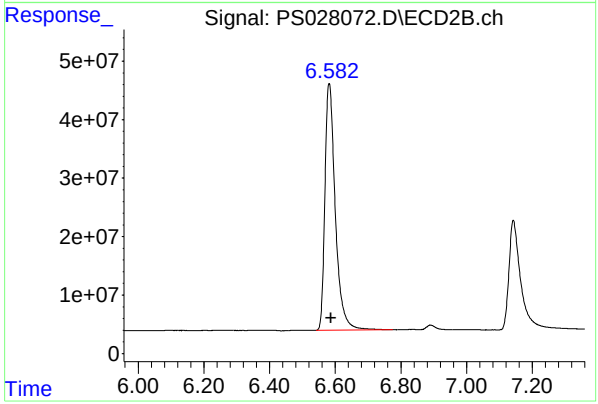
#1 Dalapon

R.T.: 2.613 min
Delta R.T.: 0.000 min
Response: 1186371599
Conc: 695.65 ng/ml



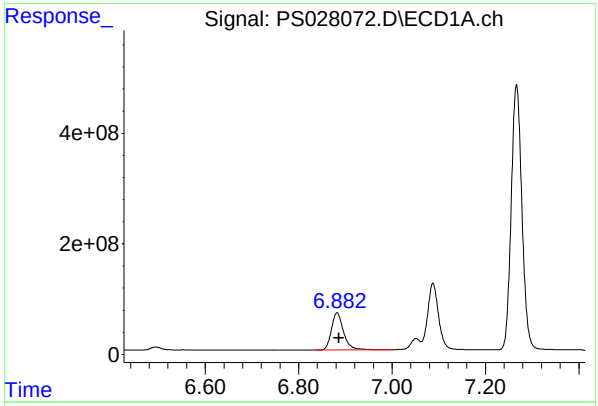
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.280 min
Delta R.T.: -0.003 min
Response: 2590811074
Conc: 654.74 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.582 min
Delta R.T.: -0.005 min
Response: 925349225
Conc: 691.85 ng/ml



#3 4-Nitrophenol

R.T.: 6.882 min
Delta R.T.: -0.004 min
Response: 1208505941
Conc: 653.10 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

Manual Integrations
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Reviewed By :Abdul Mirza 10/29/2024
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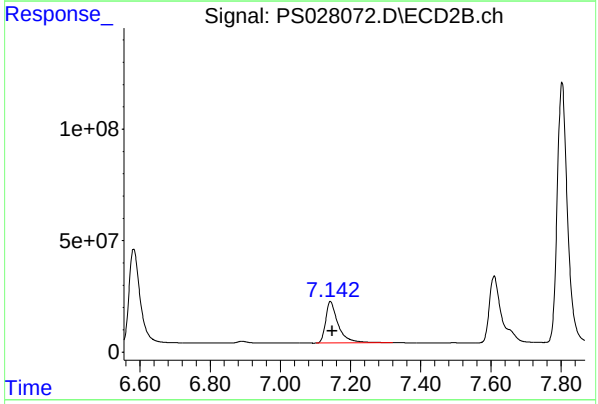
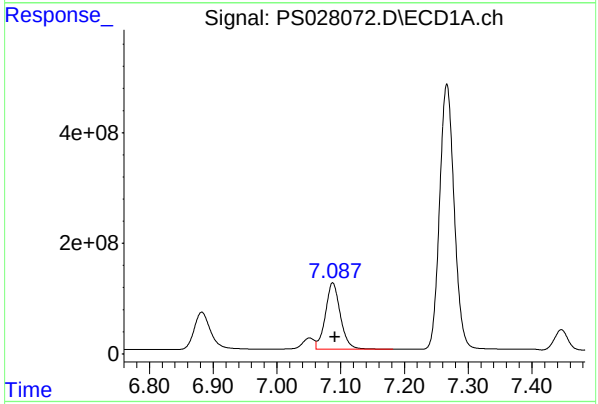


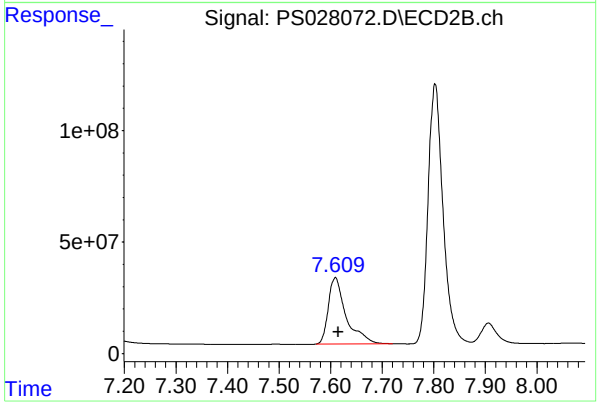
#3 4-Nitrophenol

R.T.: 7.142 min
Delta R.T.: -0.006 min
Response: 461700257
Conc: 667.91 ng/ml



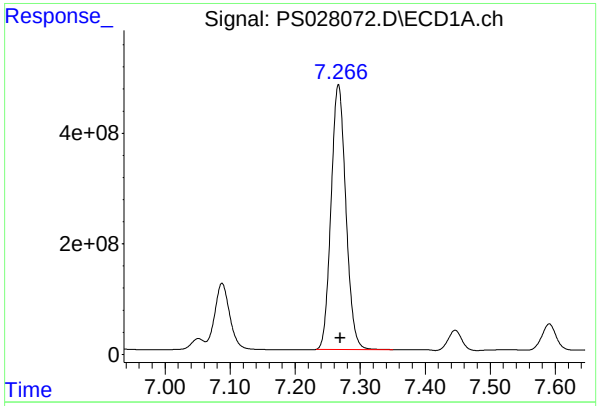
#4 2,4-DCAA

R.T.: 7.088 min
Delta R.T.: -0.003 min
Response: 1961432114
Conc: 727.27 ng/ml



#4 2,4-DCAA

R.T.: 7.609 min
Delta R.T.: -0.005 min
Response: 715444258
Conc: 754.15 ng/ml



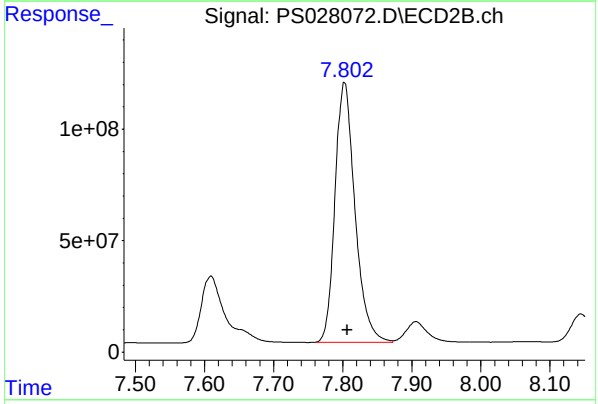
#5 DICAMBA

R.T.: 7.267 min
Delta R.T.: -0.003 mi
Response: 7562629298
Conc: 691.48 ng/m

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

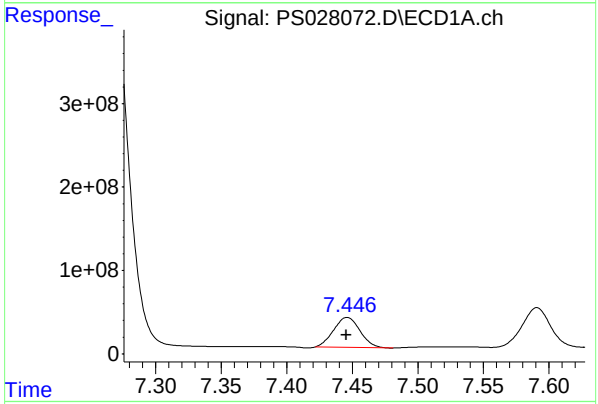
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024



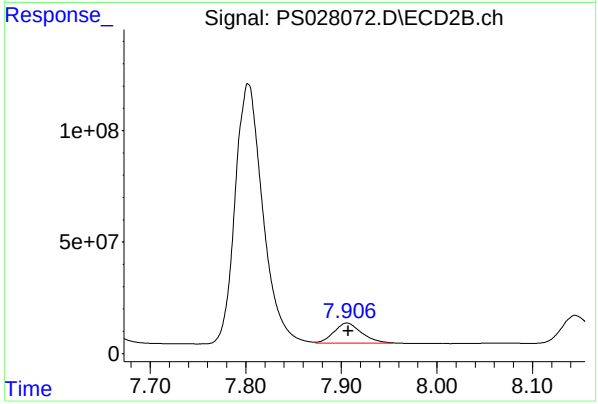
#5 DICAMBA

R.T.: 7.803 min
Delta R.T.: -0.004 min
Response: 2341450355
Conc: 708.53 ng/ml



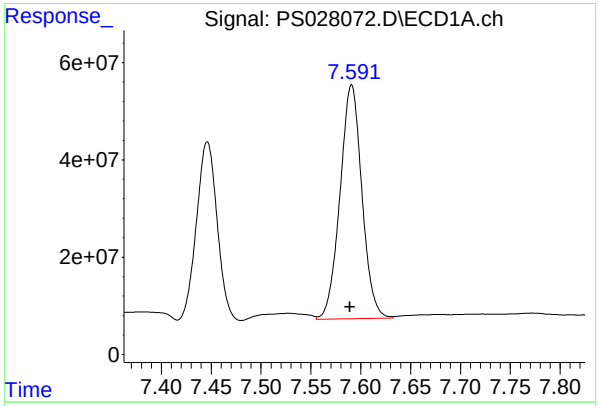
#6 MCPP

R.T.: 7.446 min
Delta R.T.: 0.000 min
Response: 500985686
Conc: 68.32 ug/ml



#6 MCPP

R.T.: 7.906 min
Delta R.T.: -0.002 min
Response: 181902567
Conc: 70.37 ug/ml m



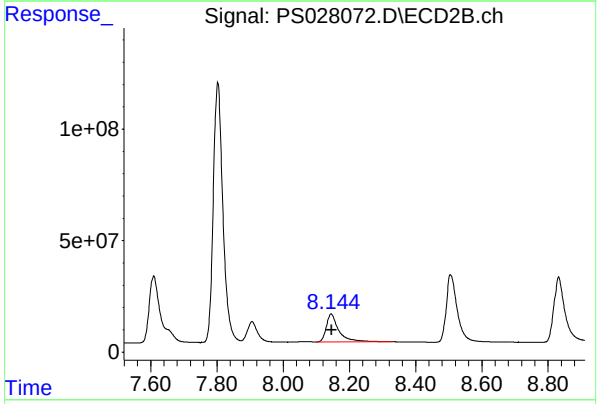
#7 MCPA

R.T.: 7.591 min
Delta R.T.: 0.002 min
Response: 735185638
Conc: 69.33 ug/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

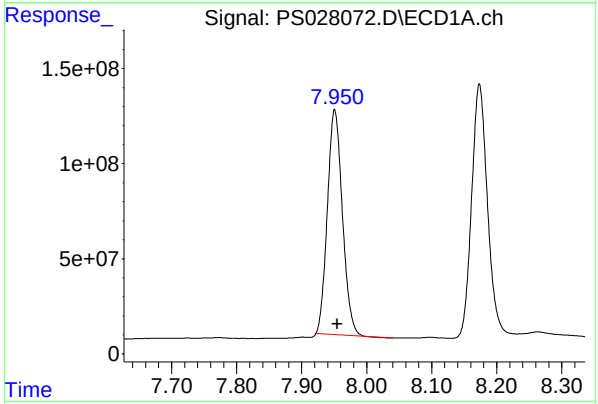
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024



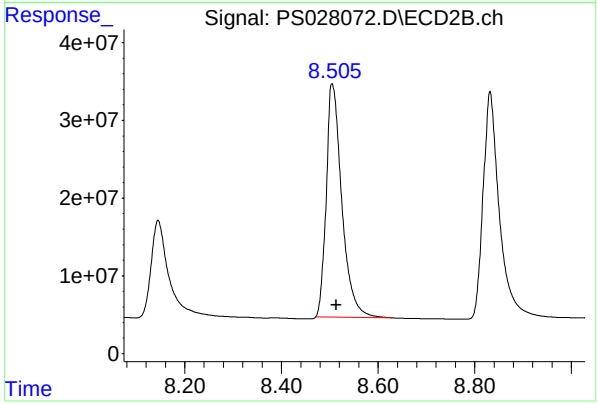
#7 MCPA

R.T.: 8.145 min
Delta R.T.: -0.002 min
Response: 328880725
Conc: 71.47 ug/ml



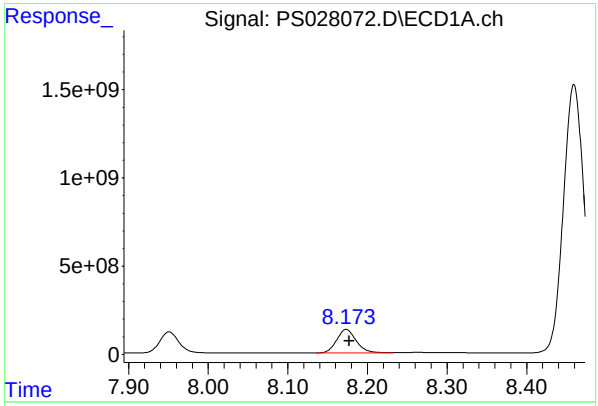
#8 DICHLORPROP

R.T.: 7.951 min
Delta R.T.: -0.004 min
Response: 1890960837
Conc: 655.74 ng/ml



#8 DICHLORPROP

R.T.: 8.505 min
Delta R.T.: -0.008 min
Response: 671229713
Conc: 716.40 ng/ml



#9 2,4-D

R.T.: 8.173 min
Delta R.T.: -0.004 min
Response: 2290150032
Conc: 675.86 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

Manual Integrations
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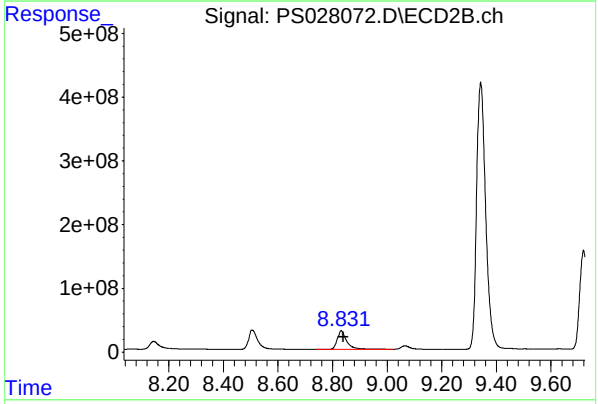
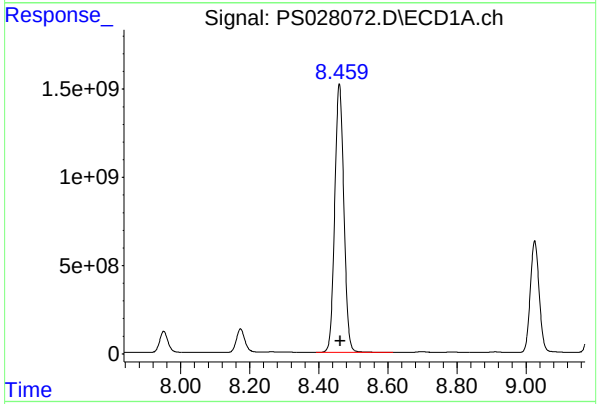
Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024



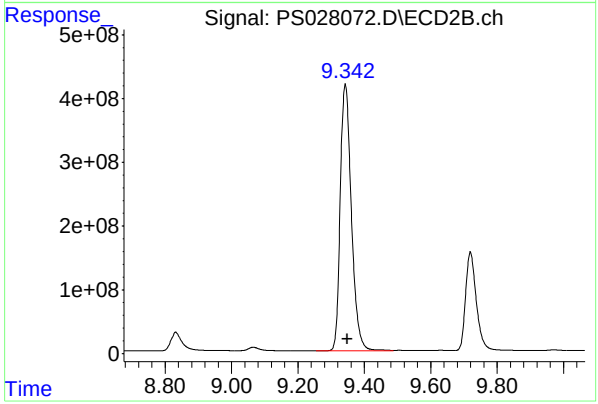
#9 2,4-D

R.T.: 8.832 min
Delta R.T.: -0.008 min
Response: 688426814
Conc: 690.40 ng/ml



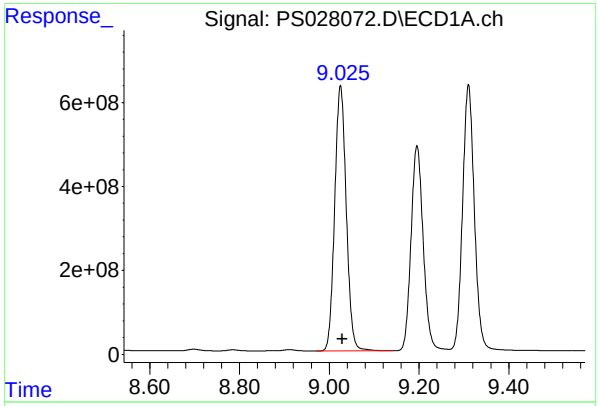
#10 Pentachlorophenol

R.T.: 8.459 min
Delta R.T.: -0.003 min
Response: 27891543815
Conc: 704.83 ng/ml



#10 Pentachlorophenol

R.T.: 9.343 min
Delta R.T.: -0.006 min
Response: 9731447326
Conc: 759.91 ng/ml



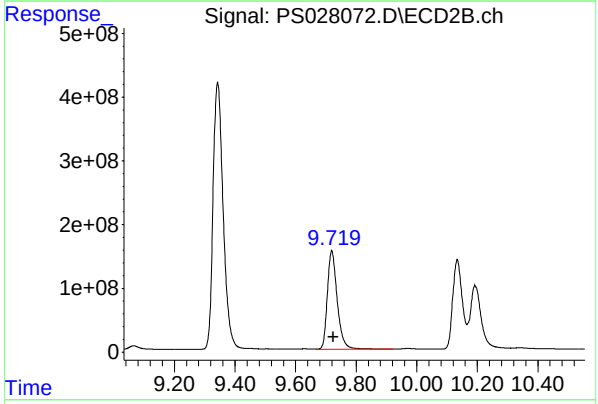
#11 2,4,5-TP (SILVEX)

R.T.: 9.025 min
Delta R.T.: -0.004 min
Response: 11290443520
Conc: 699.07 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

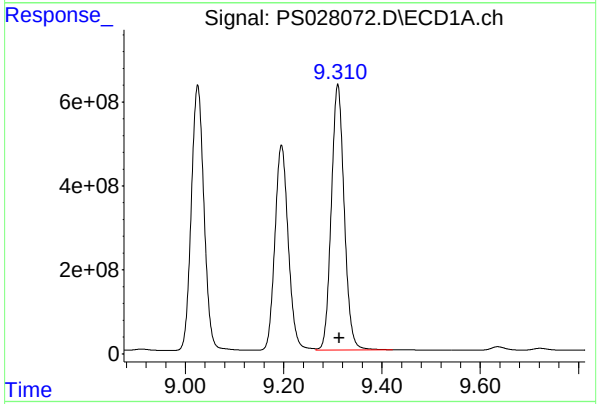
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024



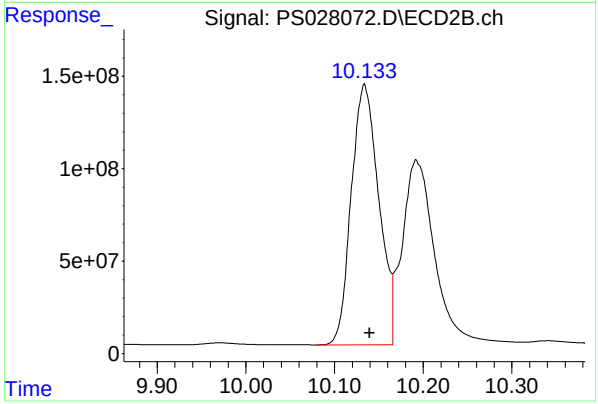
#11 2,4,5-TP (SILVEX)

R.T.: 9.719 min
Delta R.T.: -0.006 min
Response: 3489767952
Conc: 764.52 ng/ml



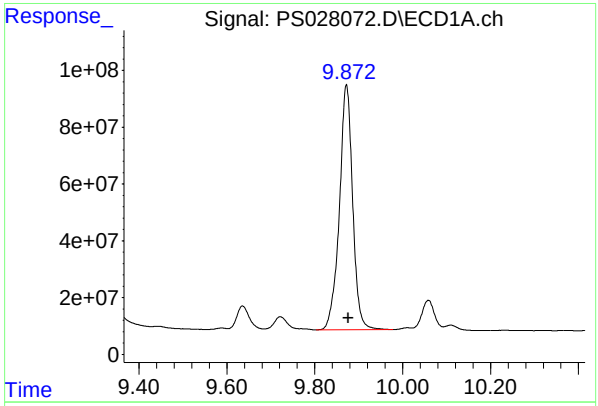
#12 2,4,5-T

R.T.: 9.310 min
Delta R.T.: -0.004 min
Response: 11510925304
Conc: 689.01 ng/ml



#12 2,4,5-T

R.T.: 10.134 min
Delta R.T.: -0.006 min
Response: 3041438258
Conc: 739.57 ng/ml



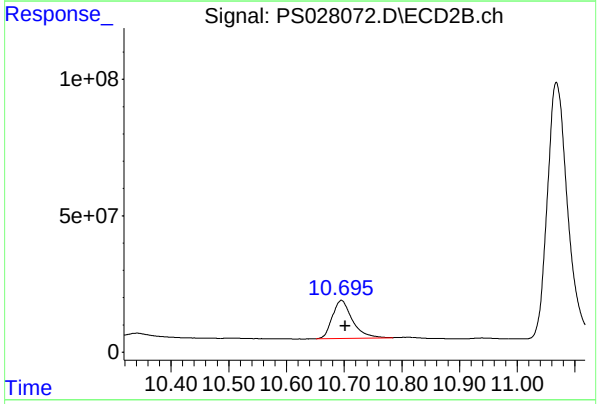
#13 2,4-DB

R.T.: 9.872 min
Delta R.T.: -0.005 min
Response: 1807044681
Conc: 686.32 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

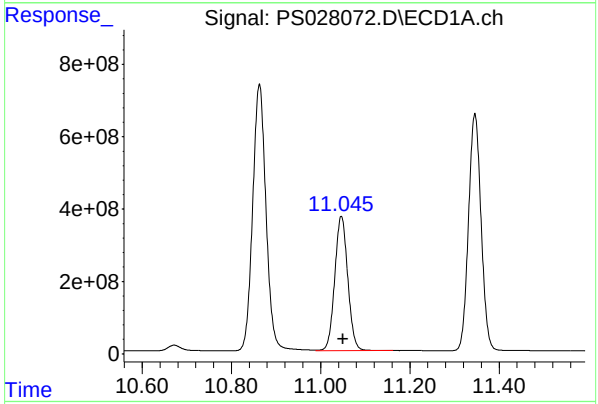
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024



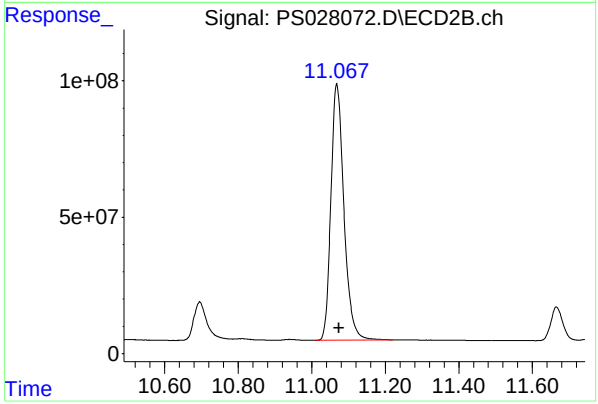
#13 2,4-DB

R.T.: 10.695 min
Delta R.T.: -0.006 min
Response: 336891974
Conc: 659.61 ng/ml



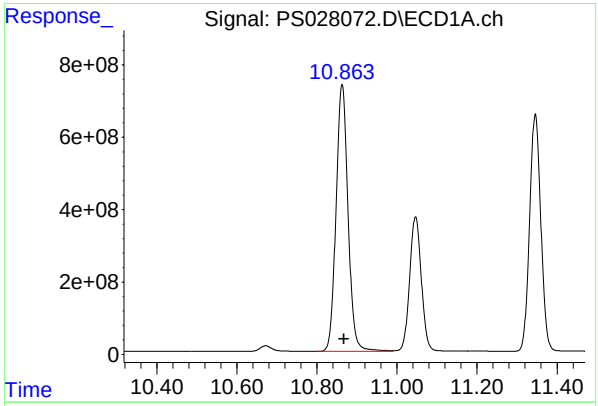
#14 DINOSEB

R.T.: 11.046 min
Delta R.T.: -0.004 min
Response: 7522309805
Conc: 683.42 ng/ml



#14 DINOSEB

R.T.: 11.068 min
Delta R.T.: -0.007 min
Response: 2303460215
Conc: 684.57 ng/ml



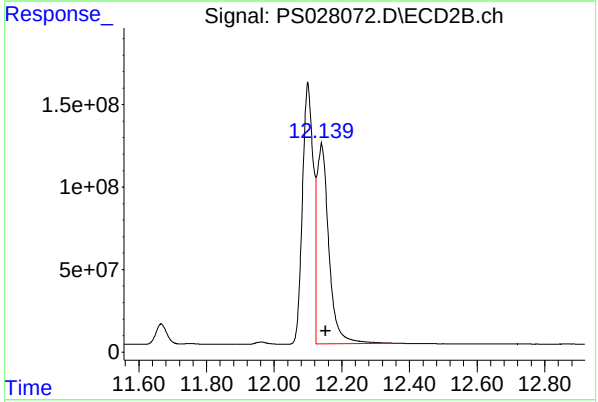
#15 Picloram

R.T.: 10.863 min
Delta R.T.: -0.004 min
Response: 15297209334
Conc: 687.04 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

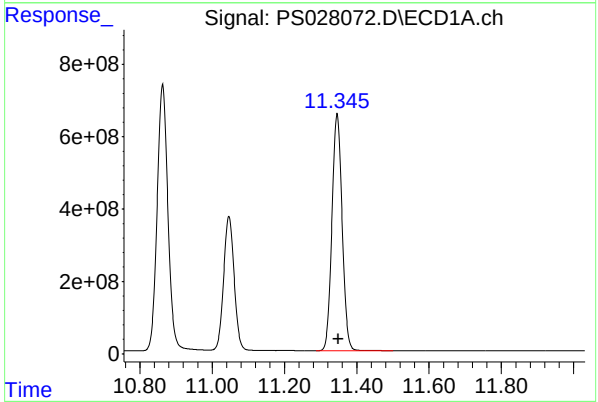
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024



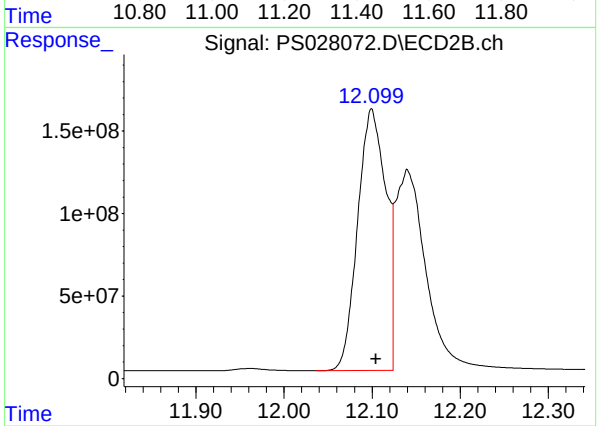
#15 Picloram

R.T.: 12.140 min
Delta R.T.: -0.012 min
Response: 2959759705
Conc: 649.53 ng/ml



#16 DCPA

R.T.: 11.346 min
Delta R.T.: -0.004 min
Response: 12788407917
Conc: 691.70 ng/ml



#16 DCPA

R.T.: 12.099 min
Delta R.T.: -0.005 min
Response: 3546101116
Conc: 764.06 ng/ml

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Continuing Calib Date: 10/28/2024 **Initial Calibration Date(s):** 10/23/2024 10/23/2024

Continuing Calib Time: 17:17 **Initial Calibration Time(s):** 11:28 13:04

GC Column: RTX-CLP **ID:** 0.32 **(mm)**

COMPOUND	CCAL RT	AVG RT	RT WINDOW FROM	RT WINDOW TO	DIFF RT
2,4-DCAA	7.09	7.09	6.99	7.19	0.00
2,4-D	8.18	8.18	8.08	8.28	0.00
2,4,5-TP(Silvex)	9.03	9.03	8.93	9.13	0.00

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Fax : 908 789 8922

CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Continuing Calib Date: 10/28/2024 **Initial Calibration Date(s):** 10/23/2024 10/23/2024

Continuing Calib Time: 17:17 **Initial Calibration Time(s):** 11:28 13:04

GC Column: RTX-CLP2 **ID:** 0.32 **(mm)**

COMPOUND	CCAL RT	AVG RT	RT WINDOW FROM	RT WINDOW TO	DIFF RT
2,4-DCAA	7.61	7.61	7.51	7.71	0.00
2,4-D	8.83	8.84	8.74	8.94	0.01
2,4,5-TP(Silvex)	9.72	9.73	9.63	9.83	0.01

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CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

GC Column: RTX-CLP **ID:** 0.32 **(mm)** **Initi. Calib. Date(s):** 10/23/2024 10/23/2024

Client Sample No.: CCAL04 **Date Analyzed:** 10/28/2024

Lab Sample No.: HSTDCCC750 **Data File :** PS028076.D **Time Analyzed:** 17:17

COMPOUND	RT	RT WINDOW FROM	RT WINDOW TO	CALC AMOUNT(ng)	NOM AMOUNT(ng)	%D
2,4,5-TP(Silvex)	9.029	8.929	9.129	715.650	712.500	0.4
2,4-D	8.176	8.077	8.277	699.590	705.000	-0.8
2,4-DCAA	7.090	6.991	7.191	733.900	750.000	-2.1

Alliance TECHNICAL GROUP

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CALIBRATION VERIFICATION SUMMARY

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

GC Column: RTX-CLP2 **ID:** 0.32 **(mm)** **Initi. Calib. Date(s):** 10/23/2024 10/23/2024

Client Sample No.: CCAL04 **Date Analyzed:** 10/28/2024

Lab Sample No.: HSTDCCC750 **Data File :** PS028076.D **Time Analyzed:** 17:17

COMPOUND	RT	RT WINDOW FROM	RT WINDOW TO	CALC AMOUNT(ng)	NOM AMOUNT(ng)	%D
2,4,5-TP(Silvex)	9.719	9.625	9.825	743.740	712.500	4.4
2,4-D	8.829	8.737	8.937	729.960	705.000	3.5
2,4-DCAA	7.606	7.514	7.714	729.190	750.000	-2.8

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102824\
Data File : PS028076.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 28 Oct 2024 17:17
Operator : AR\AJ
Sample : HSTDCCC750
Misc :
ALS Vial : 3 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 29 00:26:34 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.090	7.606	1979.3E6	691.8E6	733.905	729.193
	Target Compounds						
1) T	Dalapon	2.538	2.602	3039.3E6	1169.6E6	667.033	685.815
2) T	3,5-DICHL...	6.281	6.577	2625.4E6	949.1E6	663.473	709.631
3) T	4-Nitroph...	6.884	7.140	1233.4E6	450.7E6	666.533	651.949
5) T	DICAMBA	7.269	7.799	7684.1E6	2343.0E6	702.590	708.983
6) T	MCPP	7.448	7.903	524.8E6	185.9E6	71.567	71.906
7) T	MCPA	7.593	8.142	748.9E6	343.1E6	70.625	74.550
8) T	DICHLORPROP	7.953	8.505	1970.9E6	646.8E6	683.468	690.278
9) T	2,4-D	8.176	8.829	2370.5E6	727.9E6	699.587	729.961
10) T	Pentachlo...	8.462	9.341	28327.8E6	9017.3E6	715.854	704.143
11) T	2,4,5-TP ...	9.029	9.719	11558.3E6	3394.9E6	715.650	743.738
12) T	2,4,5-T	9.312	10.129	11866.9E6	2996.6E6	710.314	728.667
13) T	2,4-DB	9.875	10.691	1852.9E6	356.0E6	703.730	697.072
14) T	DINOSEB	11.050	11.065	7695.2E6	2352.7E6	699.127	699.195
15) T	Picloram	10.866	12.141	15609.5E6	3474.0E6	701.067	762.385
16) T	DCPA	11.349	12.096	13154.8E6	3350.1E6	711.516	721.830

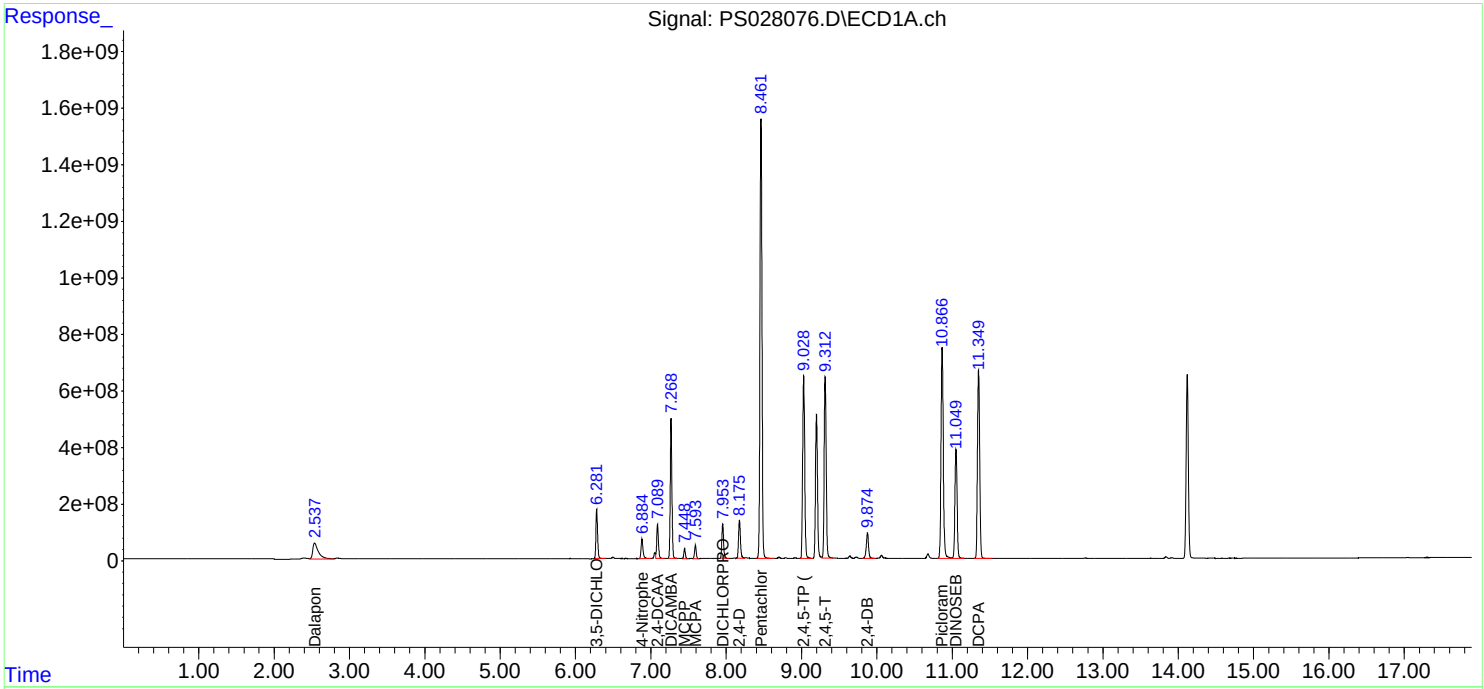
(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

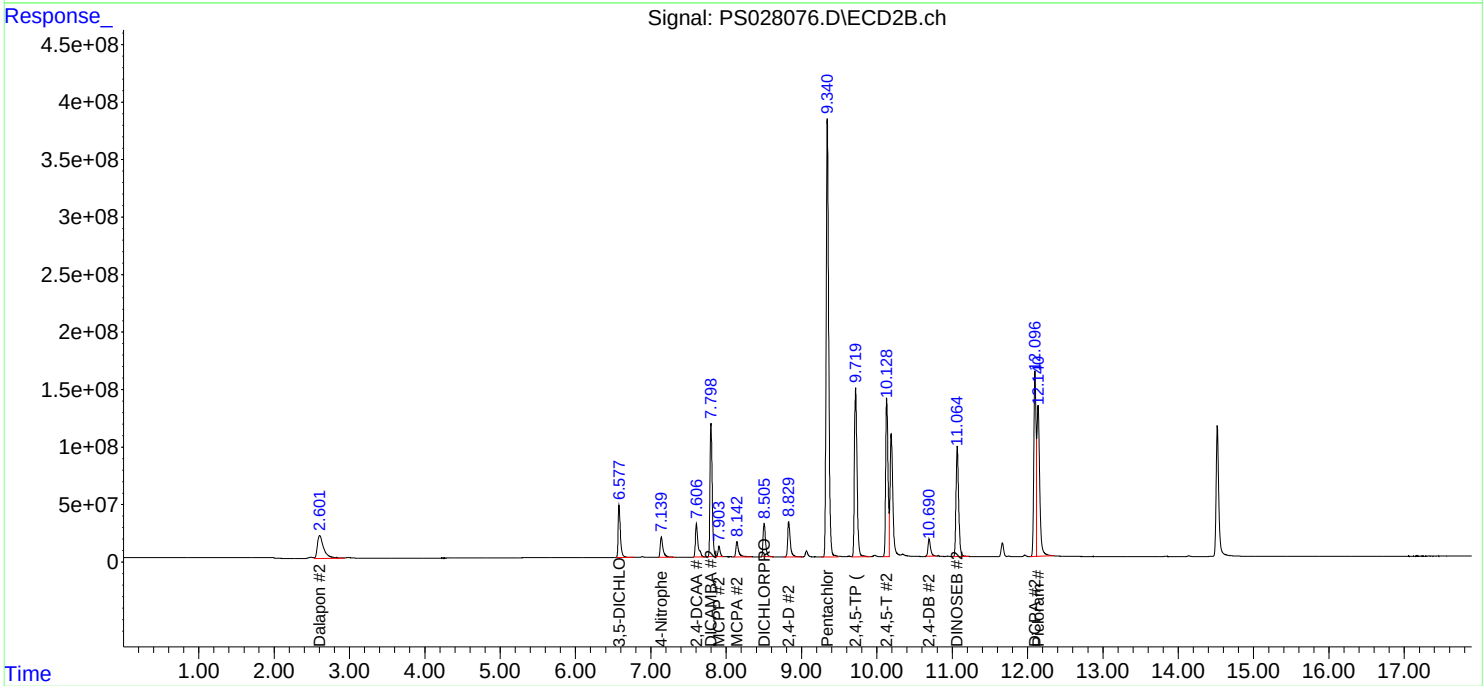
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102824\
Data File : PS028076.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 28 Oct 2024 17:17
Operator : AR\AJ
Sample : HSTDCCC750
Misc :
ALS Vial : 3 Sample Multiplier: 1

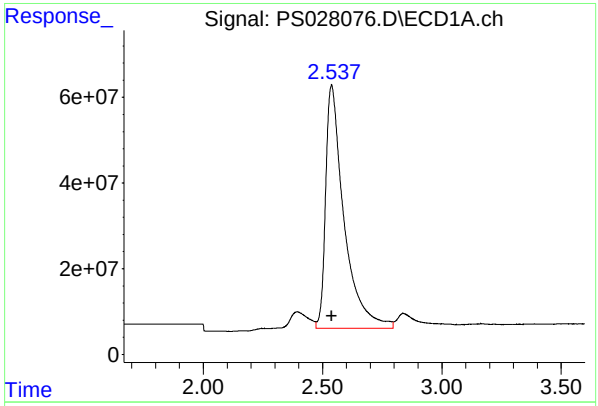
Instrument :
ECD_S
ClientSampleId :
HSTDCCC750

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 29 00:26:34 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm



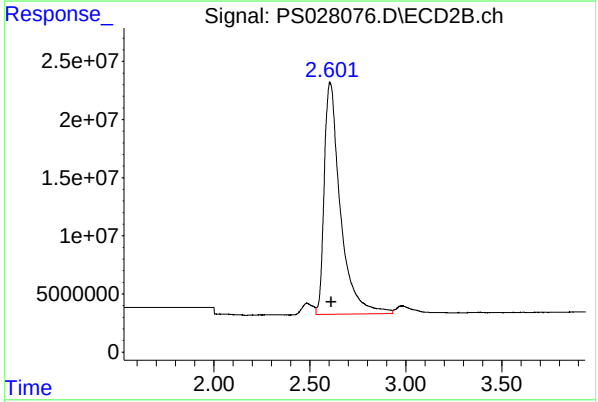




#1 Dalapon

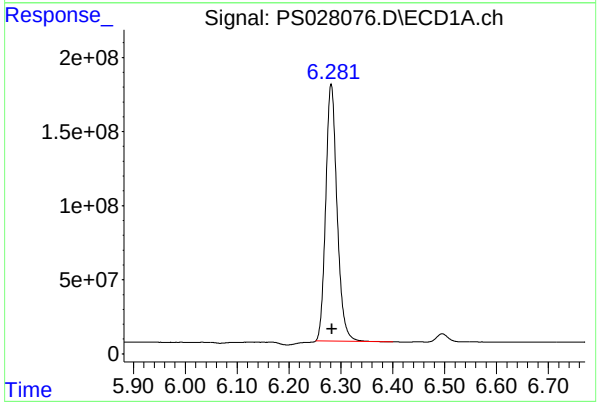
R.T.: 2.538 min
Delta R.T.: 0.000 min
Response: 3039276830
Conc: 667.03 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



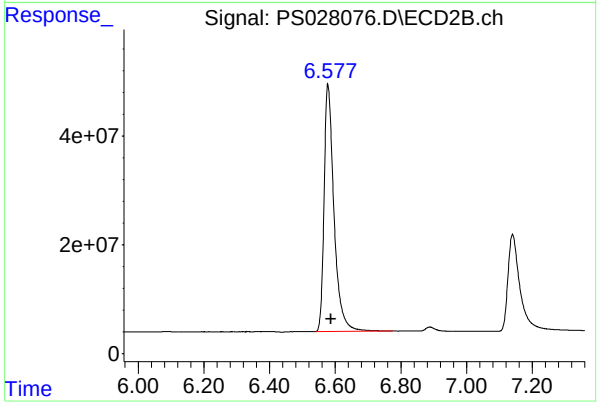
#1 Dalapon

R.T.: 2.602 min
Delta R.T.: -0.010 min
Response: 1169601601
Conc: 685.81 ng/ml



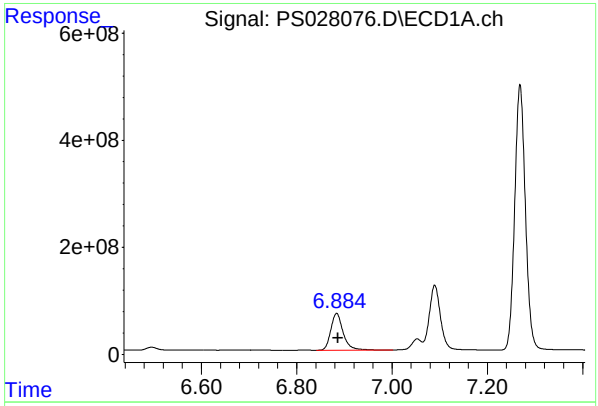
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.281 min
Delta R.T.: -0.002 min
Response: 2625373900
Conc: 663.47 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

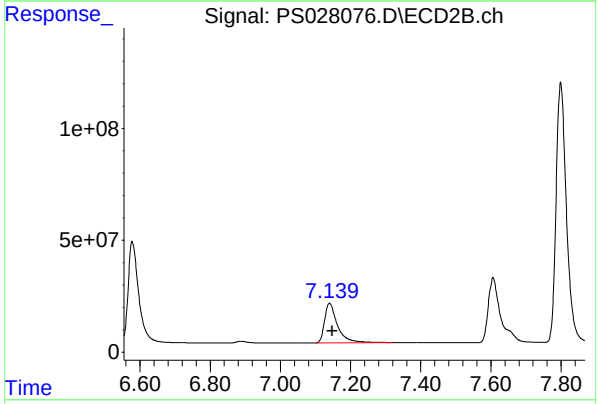
R.T.: 6.577 min
Delta R.T.: -0.010 min
Response: 949134505
Conc: 709.63 ng/ml



#3 4-Nitrophenol

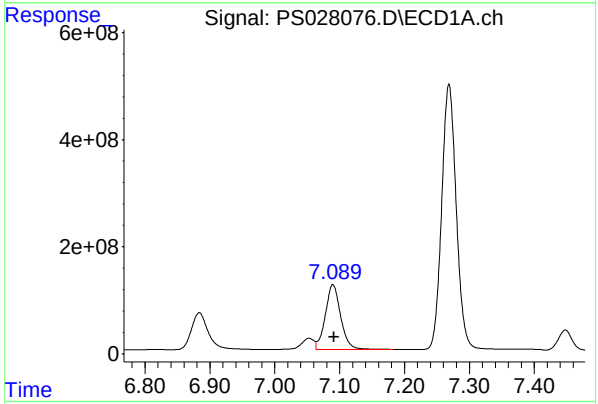
R.T.: 6.884 min
Delta R.T.: -0.003 min
Response: 1233364710
Conc: 666.53 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



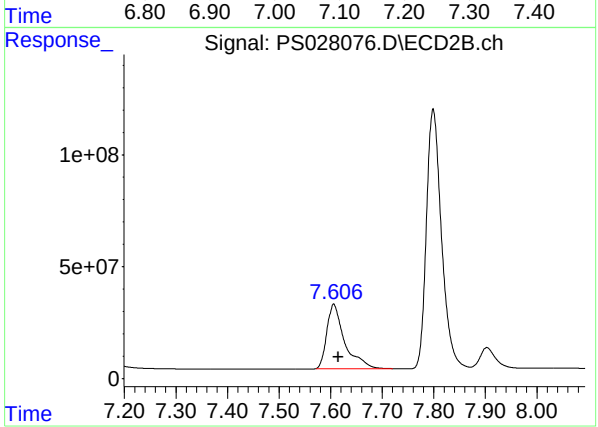
#3 4-Nitrophenol

R.T.: 7.140 min
Delta R.T.: -0.009 min
Response: 450669740
Conc: 651.95 ng/ml



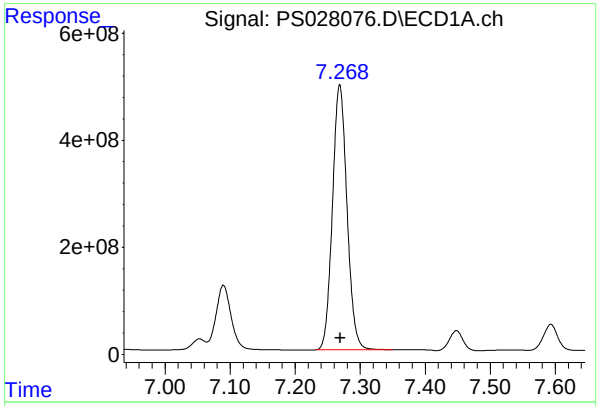
#4 2,4-DCAA

R.T.: 7.090 min
Delta R.T.: -0.001 min
Response: 1979315030
Conc: 733.90 ng/ml



#4 2,4-DCAA

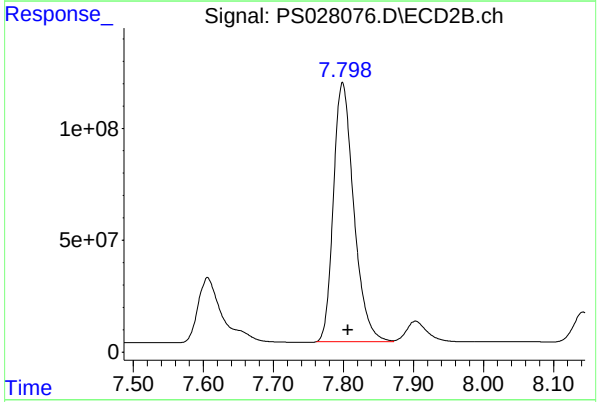
R.T.: 7.606 min
Delta R.T.: -0.008 min
Response: 691768779
Conc: 729.19 ng/ml



#5 DICAMBA

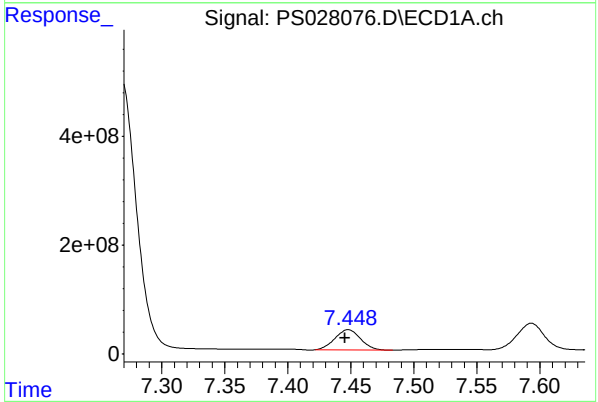
R.T.: 7.269 min
Delta R.T.: 0.000 min
Response: 7684119642
Conc: 702.59 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



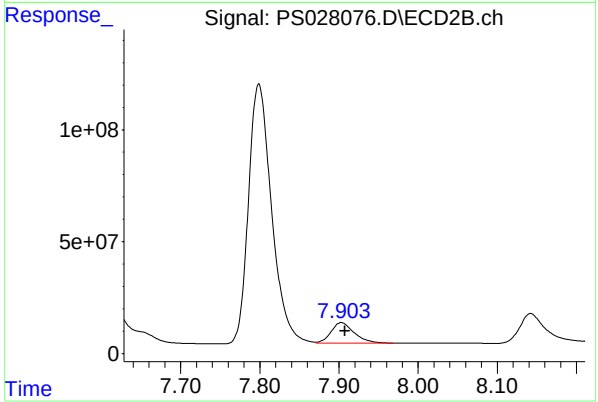
#5 DICAMBA

R.T.: 7.799 min
Delta R.T.: -0.008 min
Response: 2342954927
Conc: 708.98 ng/ml



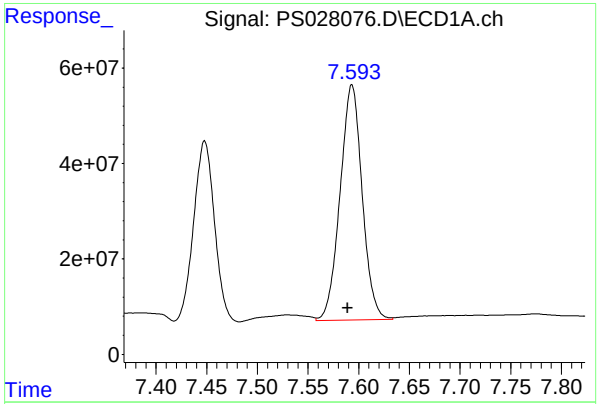
#6 MCPP

R.T.: 7.448 min
Delta R.T.: 0.003 min
Response: 524772165
Conc: 71.57 ug/ml



#6 MCPP

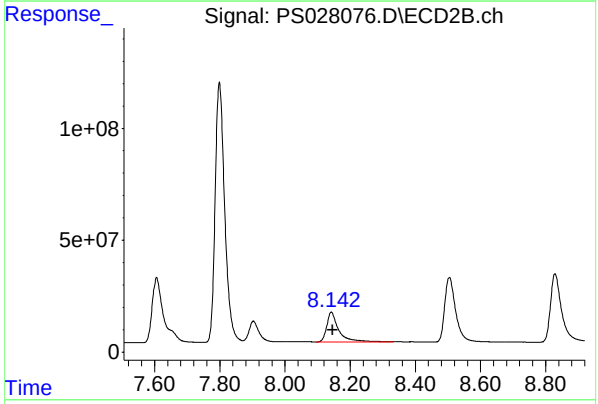
R.T.: 7.903 min
Delta R.T.: -0.004 min
Response: 185880929
Conc: 71.91 ug/ml



#7 MCPA

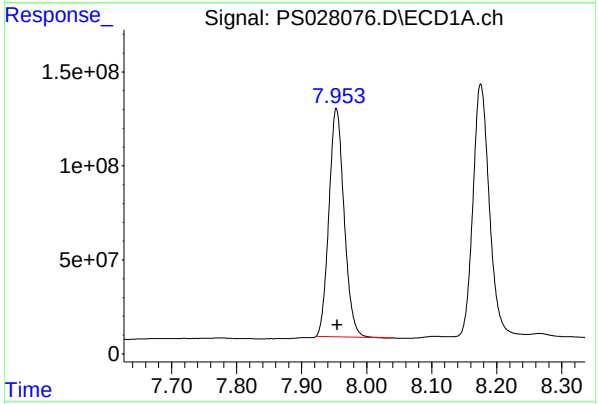
R.T.: 7.593 min
Delta R.T.: 0.004 min
Response: 748895919
Conc: 70.62 ug/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



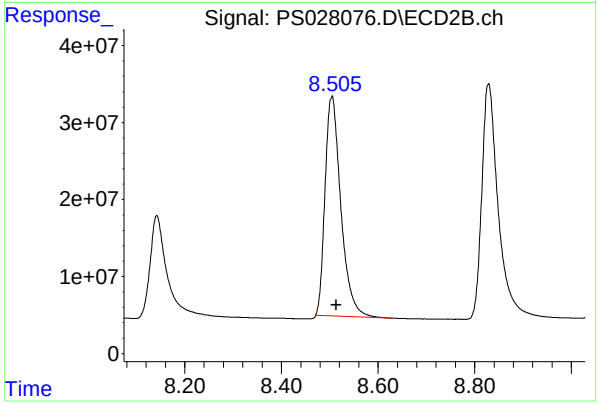
#7 MCPA

R.T.: 8.142 min
Delta R.T.: -0.004 min
Response: 343069575
Conc: 74.55 ug/ml



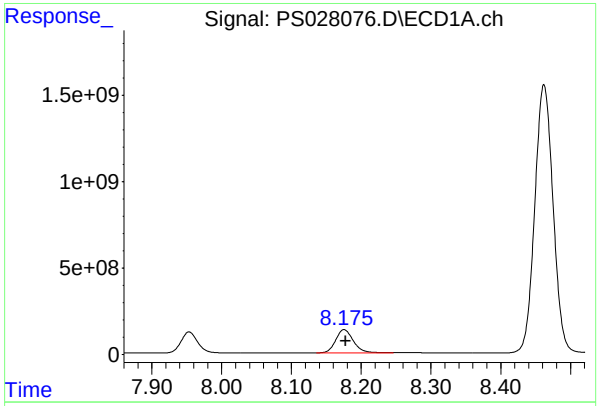
#8 DICHLORPROP

R.T.: 7.953 min
Delta R.T.: -0.001 min
Response: 1970905361
Conc: 683.47 ng/ml



#8 DICHLORPROP

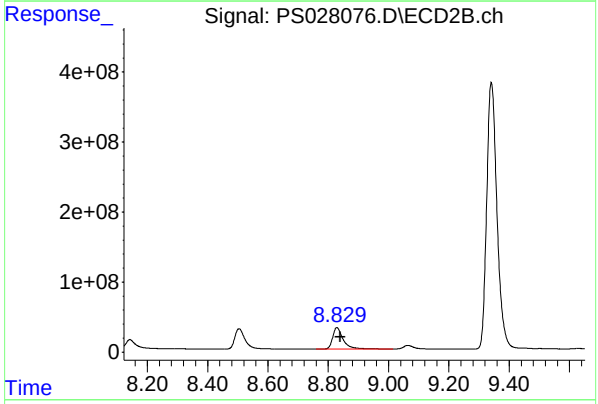
R.T.: 8.505 min
Delta R.T.: -0.008 min
Response: 646757334
Conc: 690.28 ng/ml



#9 2,4-D

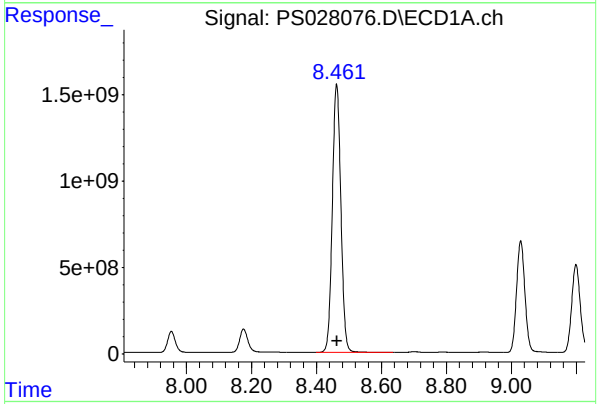
R.T.: 8.176 min
Delta R.T.: -0.002 min
Response: 2370539954
Conc: 699.59 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



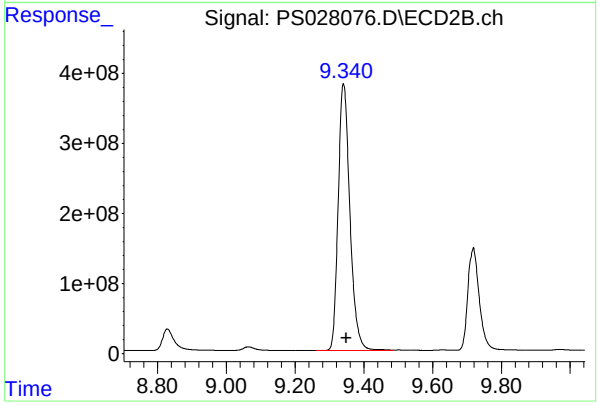
#9 2,4-D

R.T.: 8.829 min
Delta R.T.: -0.011 min
Response: 727876362
Conc: 729.96 ng/ml



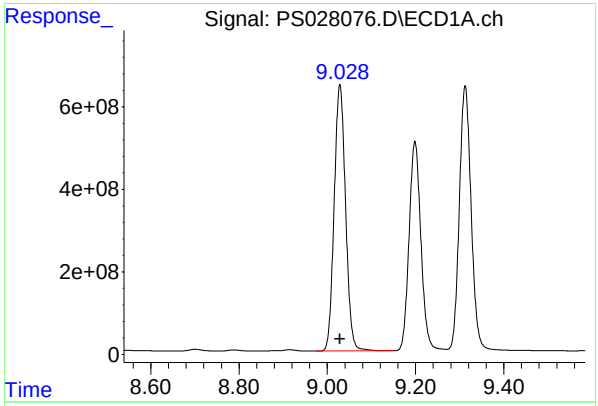
#10 Pentachlorophenol

R.T.: 8.462 min
Delta R.T.: 0.000 min
Response: 28327760863
Conc: 715.85 ng/ml



#10 Pentachlorophenol

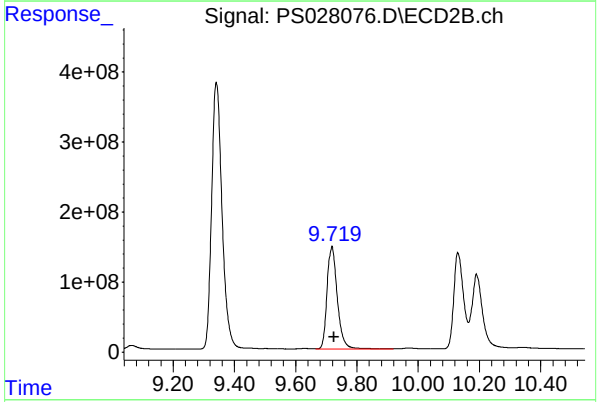
R.T.: 9.341 min
Delta R.T.: -0.008 min
Response: 9017335752
Conc: 704.14 ng/ml



#11 2,4,5-TP (SILVEX)

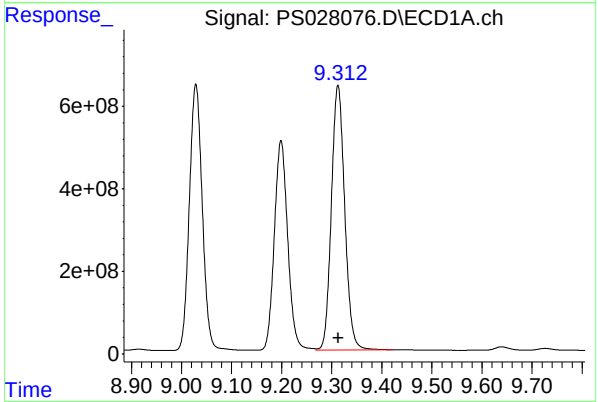
R.T.: 9.029 min
Delta R.T.: 0.000 min
Response: 11558295288
Conc: 715.65 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



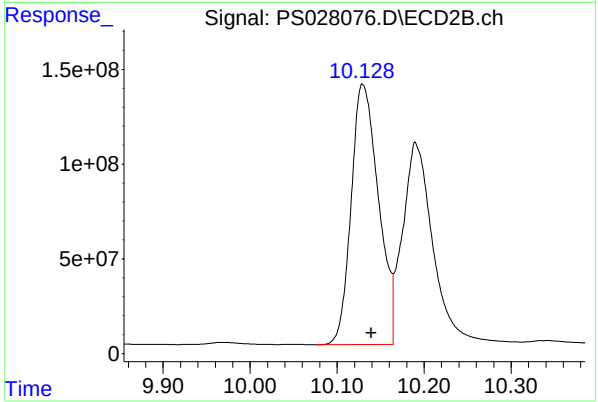
#11 2,4,5-TP (SILVEX)

R.T.: 9.719 min
Delta R.T.: -0.006 min
Response: 3394890115
Conc: 743.74 ng/ml



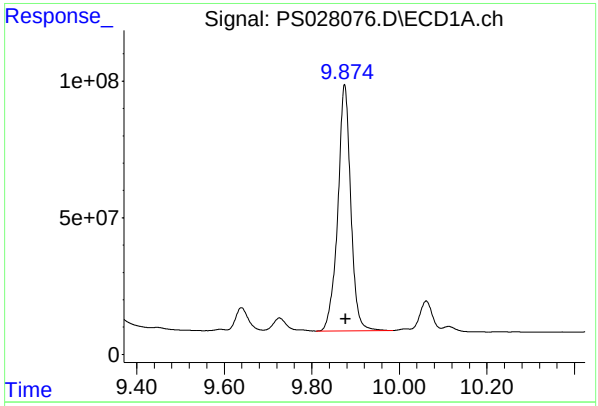
#12 2,4,5-T

R.T.: 9.312 min
Delta R.T.: -0.001 min
Response: 11866887427
Conc: 710.31 ng/ml



#12 2,4,5-T

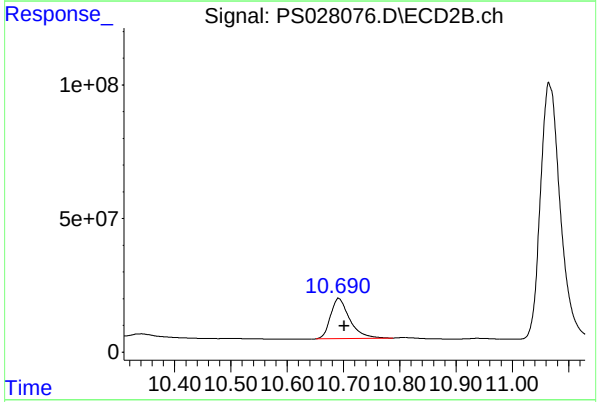
R.T.: 10.129 min
Delta R.T.: -0.010 min
Response: 2996600344
Conc: 728.67 ng/ml



#13 2,4-DB

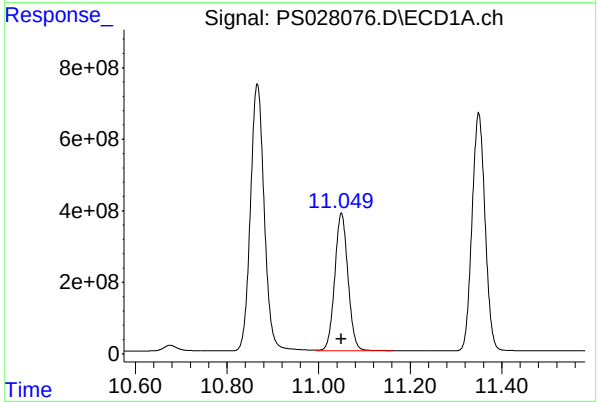
R.T.: 9.875 min
Delta R.T.: -0.002 mi
Response: 1852872295
Conc: 703.73 ng/m

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



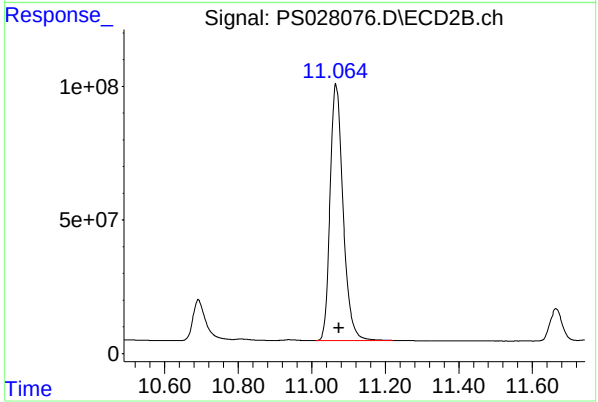
#13 2,4-DB

R.T.: 10.691 min
Delta R.T.: -0.010 min
Response: 356026138
Conc: 697.07 ng/ml



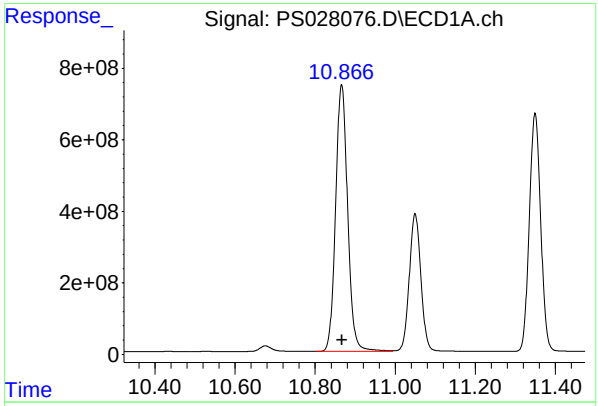
#14 DINOSEB

R.T.: 11.050 min
Delta R.T.: 0.000 min
Response: 7695160976
Conc: 699.13 ng/ml



#14 DINOSEB

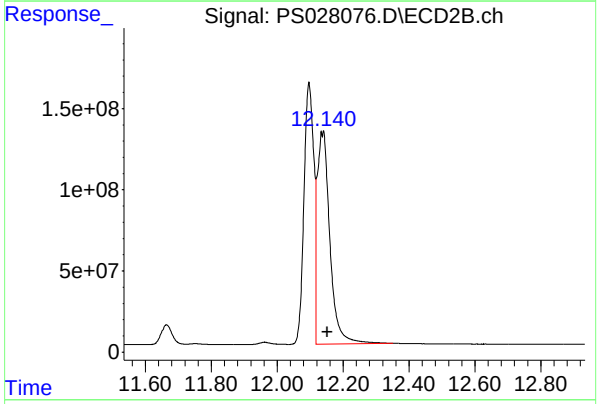
R.T.: 11.065 min
Delta R.T.: -0.010 min
Response: 2352657560
Conc: 699.20 ng/ml



#15 Picloram

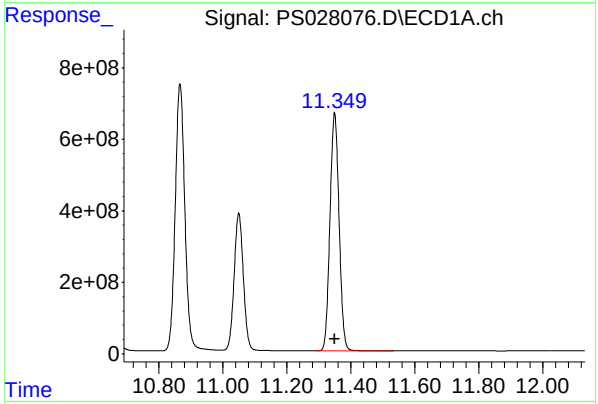
R.T.: 10.866 min
Delta R.T.: 0.000 min
Response: 15609511489
Conc: 701.07 ng/ml

Instrument :
ECD_S
ClientSampleId :
HSTDCCC750



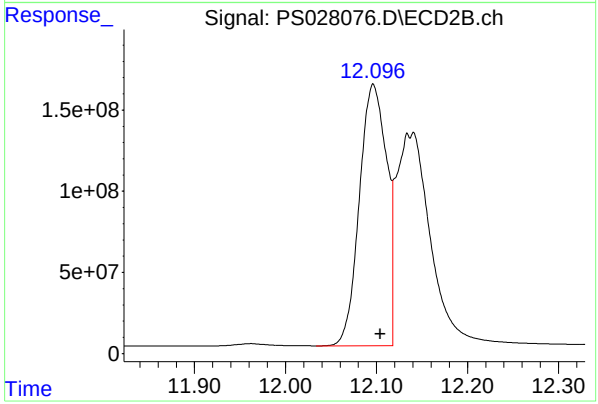
#15 Picloram

R.T.: 12.141 min
Delta R.T.: -0.012 min
Response: 3474033357
Conc: 762.39 ng/ml



#16 DCPA

R.T.: 11.349 min
Delta R.T.: 0.000 min
Response: 13154799190
Conc: 711.52 ng/ml



#16 DCPA

R.T.: 12.096 min
Delta R.T.: -0.008 min
Response: 3350125742
Conc: 721.83 ng/ml

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Analytical Sequence

Client: Tetra Tech, EMI **SDG No.:** P4462

Project: R36724 **Instrument ID:** ECD_S

GC Column: RTX-CLP **ID:** 0.32 (mm) **Inst. Calib. Date(s):** 10/23/2024 10/23/2024

THE ANALYTICAL SEQUENCE OF PERFORMANCE EVALUATION MIXTURES, BLANKS, SAMPLES, AND STANDARDS IS GIVEN BELOW:

EPA SAMPLE NO.	LAB SAMPLE ID	DATE ANALYZED	TIME ANALYZED	DATAFILE	DCAA RT #	RT #
I.BLK	I.BLK	10/23/2024	11:04	PS028007.D	7.09	0.00
HSTDICC200	HSTDICC200	10/23/2024	11:28	PS028008.D	7.09	0.00
HSTDICC500	HSTDICC500	10/23/2024	11:52	PS028009.D	7.09	0.00
HSTDICC750	HSTDICC750	10/23/2024	12:16	PS028010.D	7.09	0.00
HSTDICC1000	HSTDICC1000	10/23/2024	12:40	PS028011.D	7.09	0.00
HSTDICC1500	HSTDICC1500	10/23/2024	13:04	PS028012.D	7.09	0.00
I.BLK	I.BLK	10/24/2024	11:01	PS028035.D	7.09	0.00
HSTDCCC750	HSTDCCC750	10/24/2024	11:25	PS028036.D	7.09	0.00
PB164378BL	PB164378BL	10/24/2024	17:09	PS028037.D	7.09	0.00
PB164378BS	PB164378BS	10/24/2024	17:33	PS028038.D	7.09	0.00
WB-301-BOTMS	P4397-06MS	10/24/2024	19:09	PS028042.D	7.09	0.00
WB-301-BOTMSD	P4397-06MSD	10/24/2024	19:32	PS028043.D	7.09	0.00
C0AL2	P4462-02	10/24/2024	20:20	PS028045.D	7.09	0.00
I.BLK	I.BLK	10/24/2024	20:44	PS028046.D	7.09	0.00
HSTDCCC750	HSTDCCC750	10/24/2024	21:08	PS028047.D	7.09	0.00
I.BLK	I.BLK	10/28/2024	10:08	PS028071.D	7.09	0.00
HSTDCCC750	HSTDCCC750	10/28/2024	10:32	PS028072.D	7.09	0.00
PB164336TB	PB164336TB	10/28/2024	13:35	PS028074.D	7.09	0.00
I.BLK	I.BLK	10/28/2024	13:59	PS028075.D	7.09	0.00
HSTDCCC750	HSTDCCC750	10/28/2024	17:17	PS028076.D	7.09	0.00

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Fax : 908 789 8922

Analytical Sequence

Client: Tetra Tech, EMI **SDG No.:** P4462

Project: R36724 **Instrument ID:** ECD_S

GC Column: RTX-CLP2 **ID:** 0.32 (mm) **Inst. Calib. Date(s):** 10/23/2024 10/23/2024

THE ANALYTICAL SEQUENCE OF PERFORMANCE EVALUATION MIXTURES, BLANKS, SAMPLES, AND STANDARDS IS GIVEN BELOW:

EPA SAMPLE NO.	LAB SAMPLE ID	DATE ANALYZED	TIME ANALYZED	DATAFILE	DCAA RT #	RT #
I.BLK	I.BLK	10/23/2024	11:04	PS028007.D	7.62	0.00
HSTDICC200	HSTDICC200	10/23/2024	11:28	PS028008.D	7.61	0.00
HSTDICC500	HSTDICC500	10/23/2024	11:52	PS028009.D	7.62	0.00
HSTDICC750	HSTDICC750	10/23/2024	12:16	PS028010.D	7.61	0.00
HSTDICC1000	HSTDICC1000	10/23/2024	12:40	PS028011.D	7.62	0.00
HSTDICC1500	HSTDICC1500	10/23/2024	13:04	PS028012.D	7.61	0.00
I.BLK	I.BLK	10/24/2024	11:01	PS028035.D	7.61	0.00
HSTDCCC750	HSTDCCC750	10/24/2024	11:25	PS028036.D	7.61	0.00
PB164378BL	PB164378BL	10/24/2024	17:09	PS028037.D	7.61	0.00
PB164378BS	PB164378BS	10/24/2024	17:33	PS028038.D	7.61	0.00
WB-301-BOTMS	P4397-06MS	10/24/2024	19:09	PS028042.D	7.61	0.00
WB-301-BOTMSD	P4397-06MSD	10/24/2024	19:32	PS028043.D	7.61	0.00
C0AL2	P4462-02	10/24/2024	20:20	PS028045.D	7.61	0.00
I.BLK	I.BLK	10/24/2024	20:44	PS028046.D	7.61	0.00
HSTDCCC750	HSTDCCC750	10/24/2024	21:08	PS028047.D	7.61	0.00
I.BLK	I.BLK	10/28/2024	10:08	PS028071.D	7.61	0.00
HSTDCCC750	HSTDCCC750	10/28/2024	10:32	PS028072.D	7.61	0.00
PB164336TB	PB164336TB	10/28/2024	13:35	PS028074.D	7.61	0.00
I.BLK	I.BLK	10/28/2024	13:59	PS028075.D	7.61	0.00
HSTDCCC750	HSTDCCC750	10/28/2024	17:17	PS028076.D	7.61	0.00

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Fax : 908 789 8922

COMPOUND DETECTION SUMMARY

CLIENT SAMPLE NO.

PB164378BS

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Lab Sample ID: PB164378BS **Date(s) Analyzed:** 10/24/2024 10/24/2024

Instrument ID (1): ECD_S **Instrument ID (2):** ECD_S

GC Column: (1): RTX-CLP **ID:** 0.32 (mm) **GC Column:(2):** RTX-CLP2 **ID:** 0.32 (mm)

ANALYTE	COL	RT	RT WINDOW FROM	RT WINDOW TO	CONCENTRATION	%RPD
2,4,5-TP(Silvex)	1	9.03	8.98	9.08	4.90	9.7
	2	9.72	9.67	9.77	5.40	
2,4-D	1	8.18	8.13	8.23	4.90	2
	2	8.84	8.79	8.89	5.00	

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COMPOUND DETECTION SUMMARY

CLIENT SAMPLE NO.

WB-301-BOTMS

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Lab Sample ID: P4397-06MS **Date(s) Analyzed:** 10/24/2024 10/24/2024

Instrument ID (1): ECD_S **Instrument ID (2):** ECD_S

GC Column: (1): RTX-CLP **ID:** 0.32 (mm) **GC Column:(2):** RTX-CLP2 **ID:** 0.32 (mm)

ANALYTE	COL	RT	RT WINDOW FROM	RT WINDOW TO	CONCENTRATION	%RPD
2,4,5-TP(Silvex)	1	9.03	8.98	9.08	47.3	76.6
	2	9.73	9.68	9.78	106	
2,4-D	1	8.18	8.13	8.23	49.0	11.9
	2	8.84	8.79	8.89	55.2	

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COMPOUND DETECTION SUMMARY

CLIENT SAMPLE NO.

WB-301-BOTMSD

Contract: TETR16

Lab Code: CHEM **Case No.:** P4462 **SAS No.:** P4462 **SDG NO.:** P4462

Lab Sample ID: P4397-06MSD **Date(s) Analyzed:** 10/24/2024 10/24/2024

Instrument ID (1): ECD_S **Instrument ID (2):** ECD_S

GC Column: (1): RTX-CLP **ID:** 0.32 (mm) **GC Column:(2):** RTX-CLP2 **ID:** 0.32 (mm)

ANALYTE	COL	RT	RT WINDOW FROM	RT WINDOW TO	CONCENTRATION	%RPD
2,4-D	1	8.18	8.13	8.23	49.2	14
	2	8.83	8.78	8.88	56.6	
2,4,5-TP(Silvex)	1	9.03	8.98	9.08	47.5	81.6
	2	9.73	9.68	9.78	113	

QC SAMPLE DATA

Alliance TECHNICAL GROUP
284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Report of Analysis

Client:	Tetra Tech, EMI	Date Collected:	
Project:	R36724	Date Received:	
Client Sample ID:	PB164378BL	SDG No.:	P4462
Lab Sample ID:	PB164378BL	Matrix:	TCLP
Analytical Method:	SW8151A	% Solid:	0 Decanted:
Sample Wt/Vol:	1000 Units: mL	Final Vol:	10000 uL
Soil Aliquot Vol:	uL	Test:	TCLP Herbicide
Extraction Type:		Injection Volume :	
GPC Factor :	1.0 PH :		
Prep Method :	SW3510C		

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
PS028037.D	1	10/24/24 11:28	10/24/24 17:09	PB164378

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
94-75-7	2,4-D	0.49	U	0.49	2.00	ug/L
93-72-1	2,4,5-TP (Silvex)	0.45	U	0.45	2.00	ug/L
SURROGATES						
19719-28-9	2,4-DCAA	516		39 - 175	103%	SPK: 500

Comments:

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
P = Indicates >25% difference for detected concentrations between the two GC columns
Q = indicates LCS control criteria did not meet requirements
M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution
S = Indicates estimated value where valid five-point calibration was not performed prior to analyte detection in sample.
() = Laboratory InHouse Limit

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028037.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 17:09
Operator : AR\AJ
Sample : PB164378BL
Misc :
ALS Vial : 6 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
PB164378BL

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:41:16 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.093	7.609	1374.5E6	489.7E6	509.646m	516.148
	Target Compounds						

(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

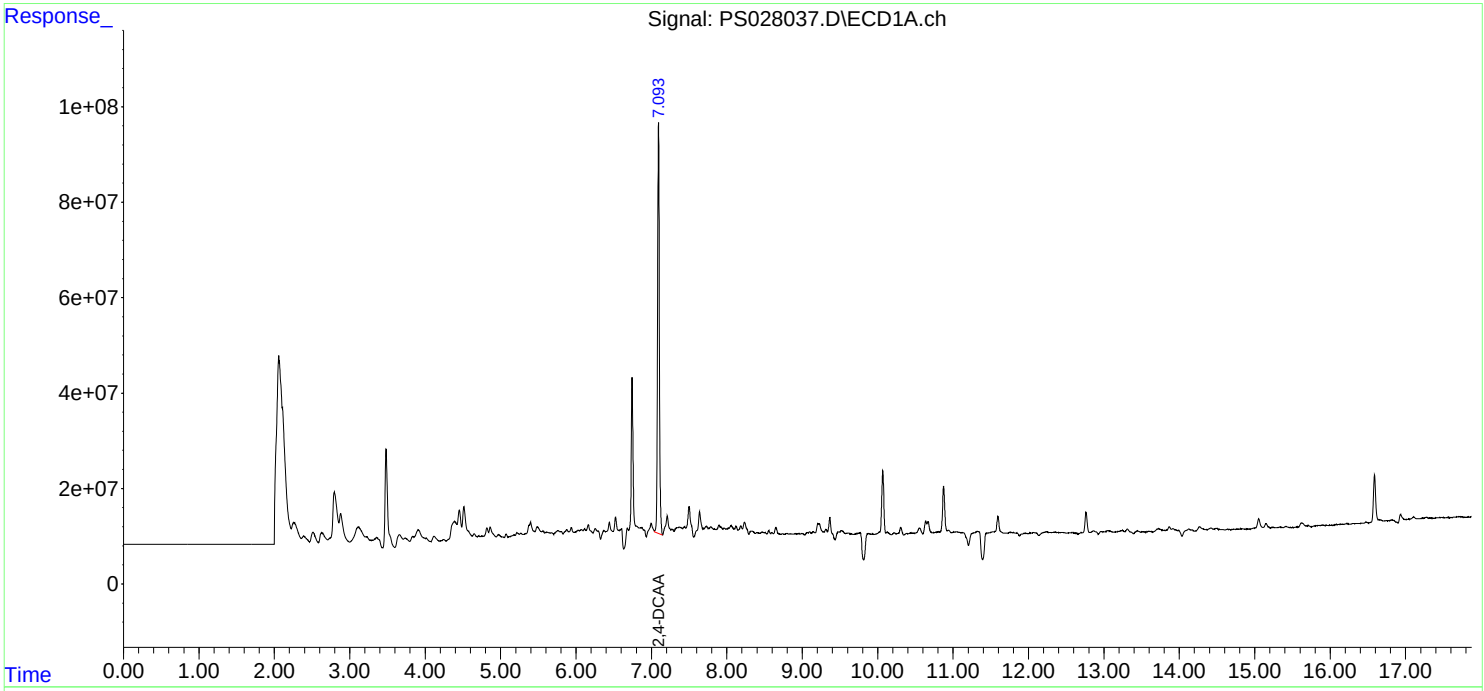
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028037.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 17:09
Operator : AR\AJ
Sample : PB164378BL
Misc :
ALS Vial : 6 Sample Multiplier: 1

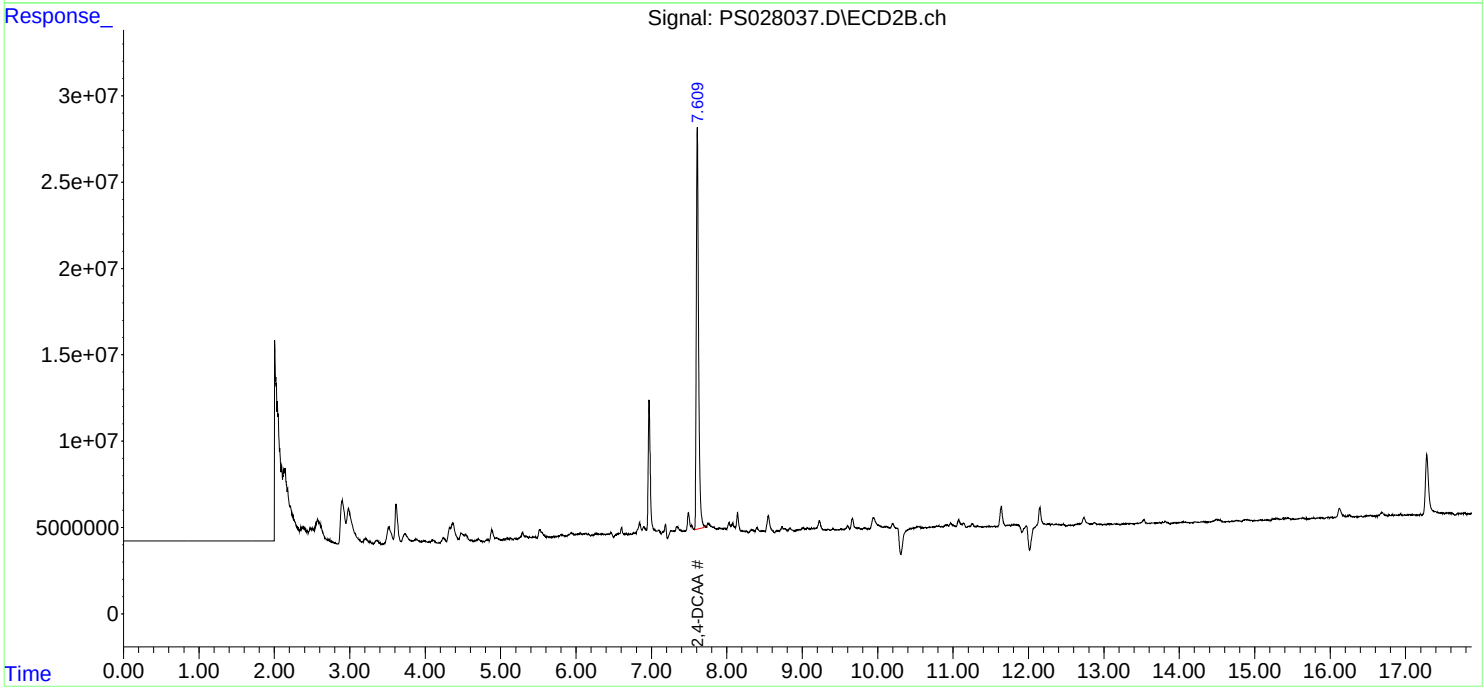
Instrument :
ECD_S
ClientSampleId :
PB164378BL

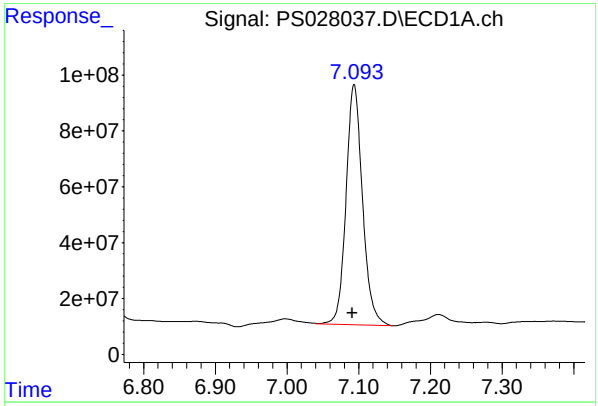
Manual Integrations APPROVED
Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:41:16 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm







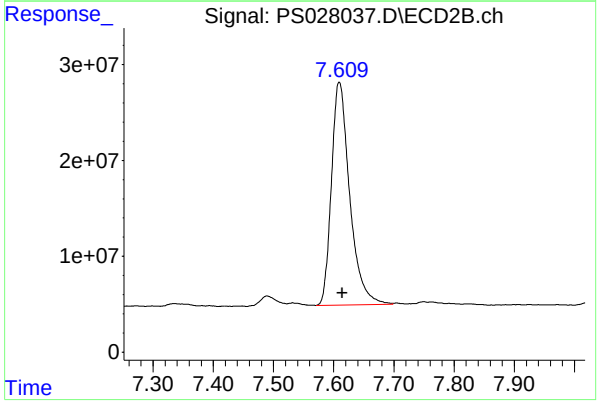
#4 2,4-DCAA

R.T.: 7.093 min
Delta R.T.: 0.002 mi
Response: 1374498746
Conc: 509.65 ng/m

Instrument :
ECD_S
ClientSampleId :
PB164378BL

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024



#4 2,4-DCAA

R.T.: 7.609 min
Delta R.T.: -0.005 min
Response: 489657956
Conc: 516.15 ng/ml

Alliance TECHNICAL GROUP
284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Report of Analysis

Client:	Tetra Tech, EMI	Date Collected:	10/23/24
Project:	R36724	Date Received:	10/23/24
Client Sample ID:	PIBLK-PS028007.D	SDG No.:	P4462
Lab Sample ID:	I.BLK-PS028007.D	Matrix:	TCLP
Analytical Method:	SW8151A	% Solid:	0 Decanted:
Sample Wt/Vol:	1000 Units: mL	Final Vol:	10000 uL
Soil Aliquot Vol:	uL	Test:	TCLP Herbicide
Extraction Type:		Injection Volume :	
GPC Factor :	1.0 PH :		
Prep Method :	SW3510C		

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
PS028007.D	1		10/23/24	PS102324

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
94-75-7	2,4-D	0.49	U	0.49	2.00	ug/L
93-72-1	2,4,5-TP (Silvex)	0.45	U	0.45	2.00	ug/L
SURROGATES						
19719-28-9	2,4-DCAA	489		39 - 175	98%	SPK: 500

Comments:

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
P = Indicates >25% difference for detected concentrations between the two GC columns
Q = indicates LCS control criteria did not meet requirements
M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution
S = Indicates estimated value where valid five-point calibration was not performed prior to analyte detection in sample.
() = Laboratory InHouse Limit

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028007.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 11:04
Operator : AR\AJ
Sample : I.BLK
Misc :
ALS Vial : 2 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
I.BLK

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 13:27:17 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.091	7.616	1317.6E6	437.0E6	488.565	460.591
	Target Compounds						

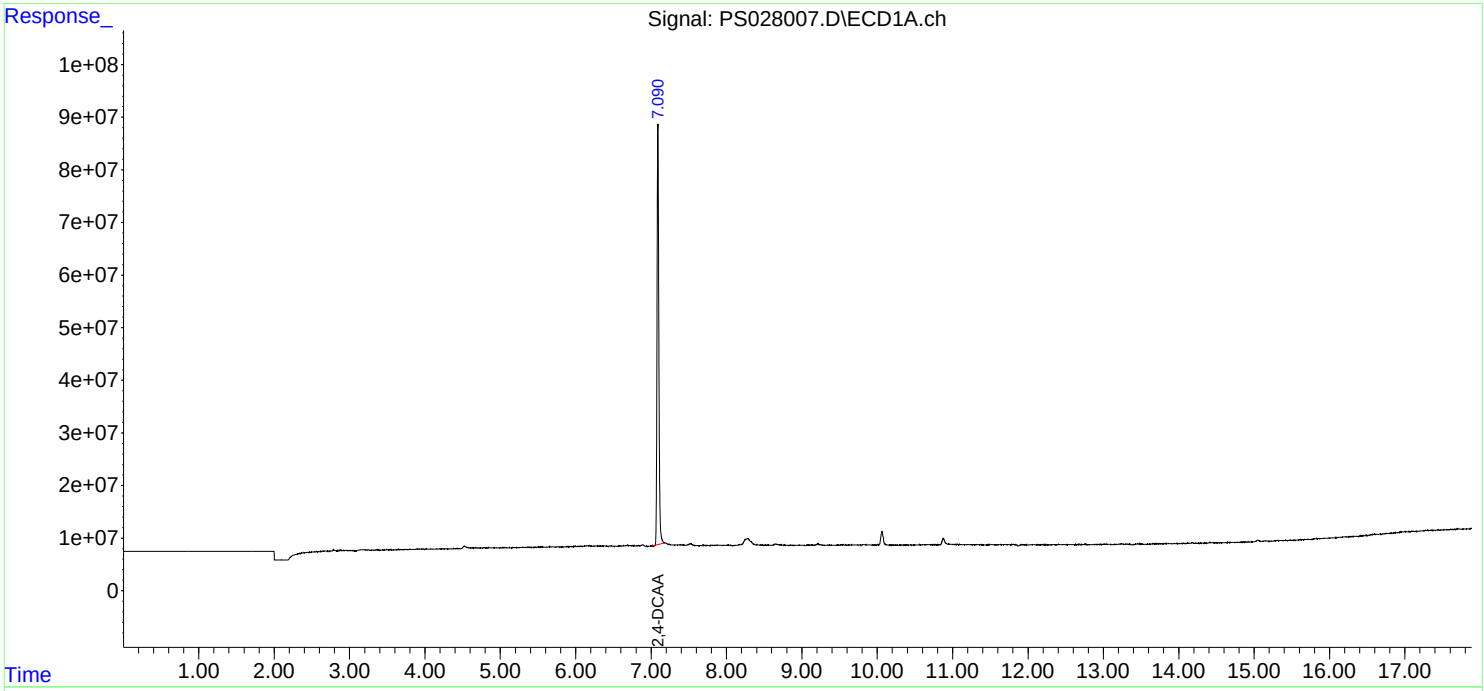
(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

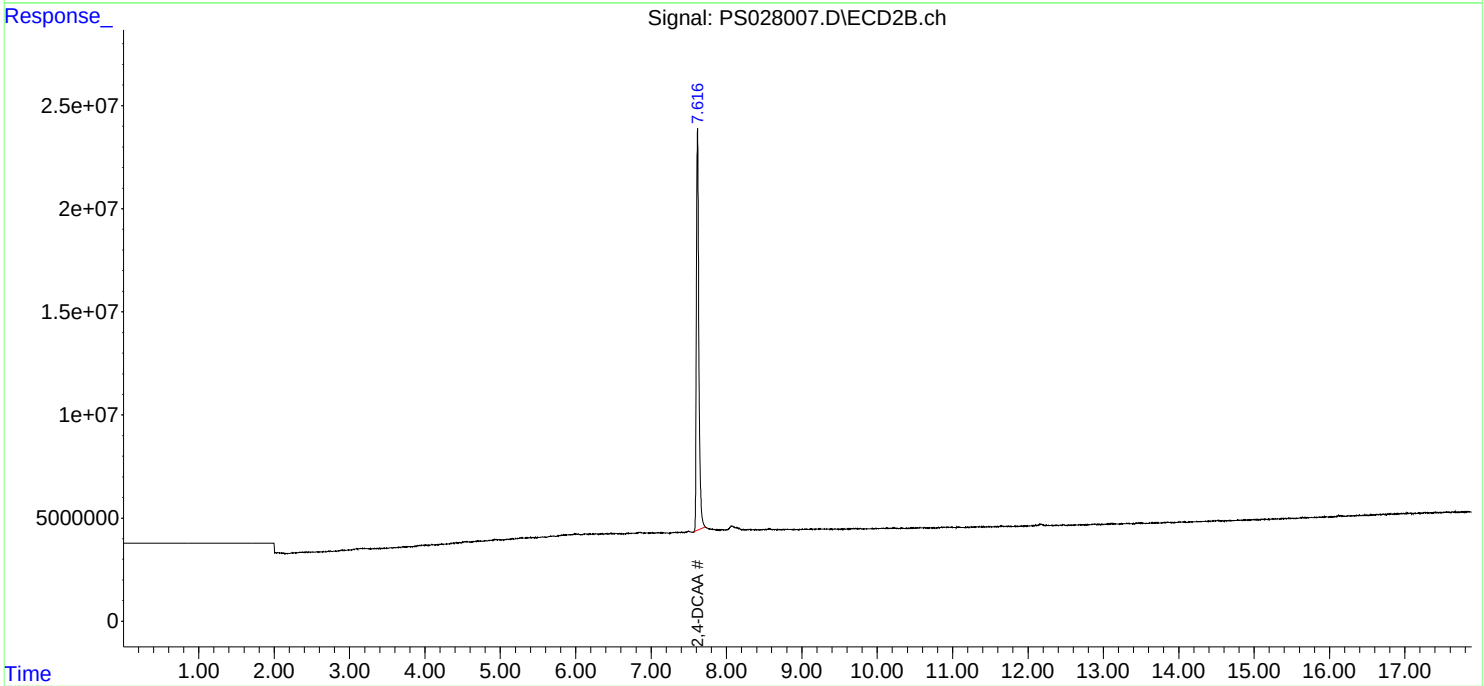
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102324\
Data File : PS028007.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 23 Oct 2024 11:04
Operator : AR\AJ
Sample : I.BLK
Misc :
ALS Vial : 2 Sample Multiplier: 1

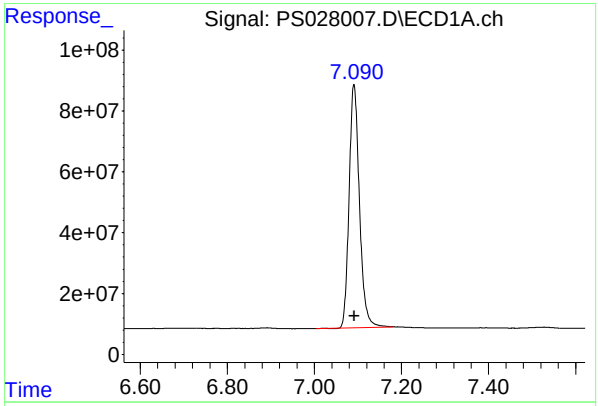
Instrument :
ECD_S
ClientSampleId :
I.BLK

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 23 13:27:17 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm



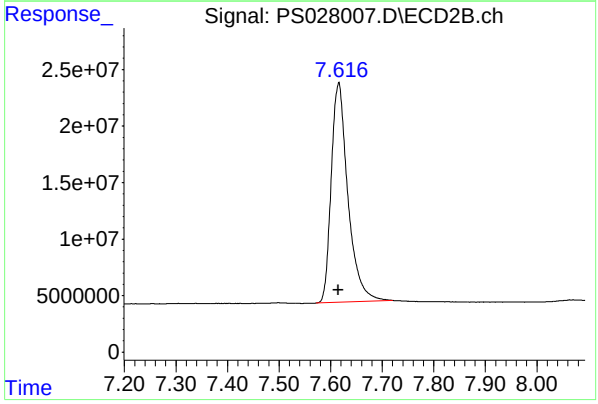




#4 2,4-DCAA

R.T.: 7.091 min
Delta R.T.: 0.000 mi
Response: 1317642979
Conc: 488.57 ng/m

Instrument :
ECD_S
ClientSampleId :
I.BLK



#4 2,4-DCAA

R.T.: 7.616 min
Delta R.T.: 0.001 min
Response: 436952671
Conc: 460.59 ng/ml

Alliance TECHNICAL GROUP
284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Report of Analysis

Client:	Tetra Tech, EMI	Date Collected:	10/24/24
Project:	R36724	Date Received:	10/24/24
Client Sample ID:	PIBLK-PS028035.D	SDG No.:	P4462
Lab Sample ID:	I.BLK-PS028035.D	Matrix:	TCLP
Analytical Method:	SW8151A	% Solid:	0 Decanted:
Sample Wt/Vol:	1000 Units: mL	Final Vol:	10000 uL
Soil Aliquot Vol:	uL	Test:	TCLP Herbicide
Extraction Type:		Injection Volume :	
GPC Factor :	1.0 PH :		
Prep Method :	SW3510C		

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
PS028035.D	1		10/24/24	PS102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
94-75-7	2,4-D	0.49	U	0.49	2.00	ug/L
93-72-1	2,4,5-TP (Silvex)	0.45	U	0.45	2.00	ug/L
SURROGATES						
19719-28-9	2,4-DCAA	508		39 - 175	102%	SPK: 500

Comments:

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
P = Indicates >25% difference for detected concentrations between the two GC columns
Q = indicates LCS control criteria did not meet requirements
M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution
S = Indicates estimated value where valid five-point calibration was not performed prior to analyte detection in sample.
() = Laboratory InHouse Limit

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028035.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 11:01
Operator : AR\AJ
Sample : I.BLK
Misc :
ALS Vial : 2 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
I.BLK

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:40:29 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.090	7.613	1369.0E6	464.2E6	507.593m	489.266
	Target Compounds						

(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

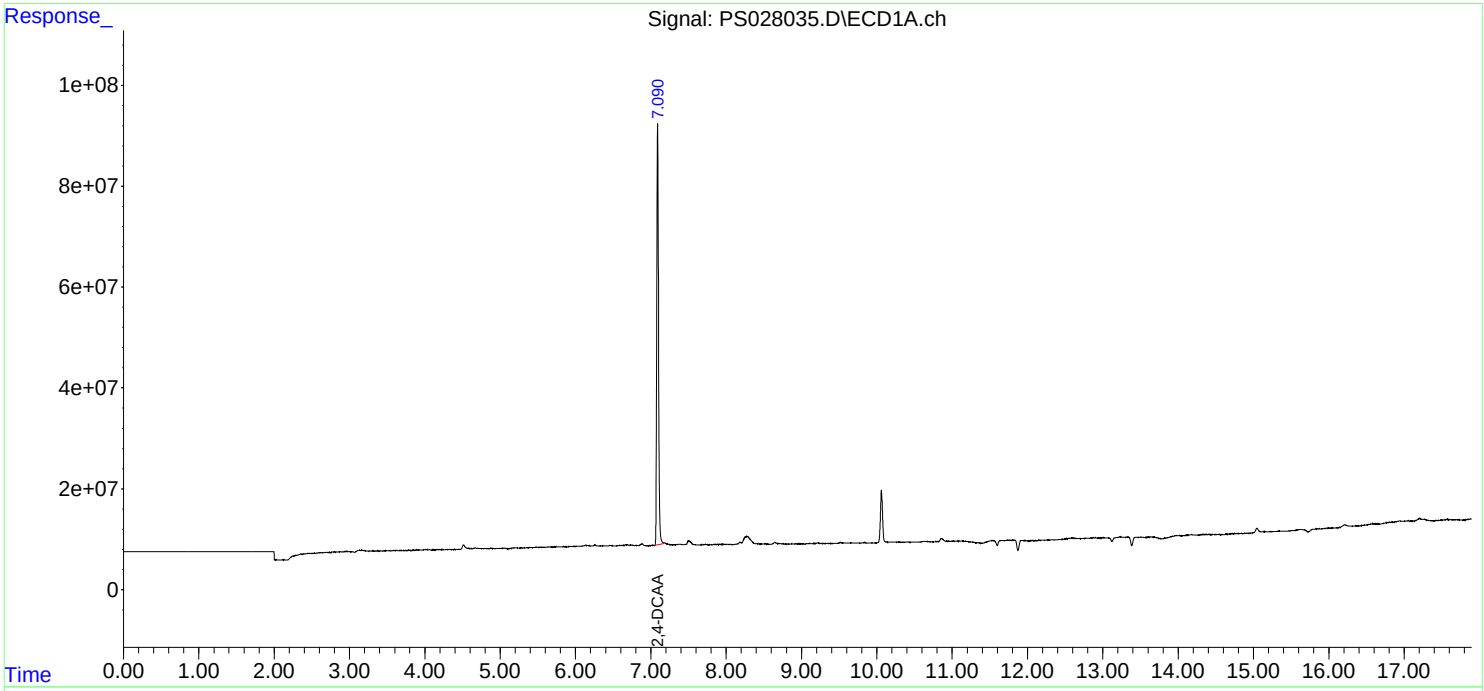
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028035.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 11:01
Operator : AR\AJ
Sample : I.BLK
Misc :
ALS Vial : 2 Sample Multiplier: 1

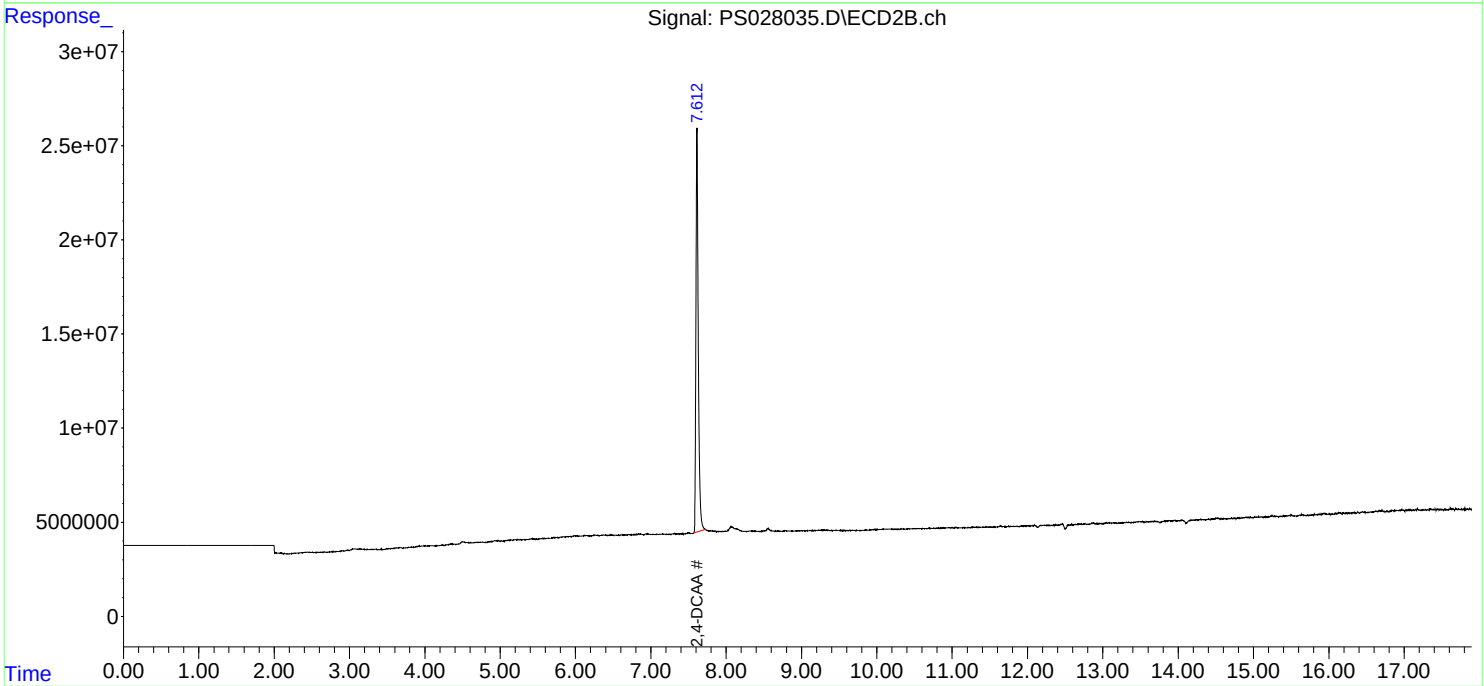
Instrument :
ECD_S
ClientSampleId :
I.BLK

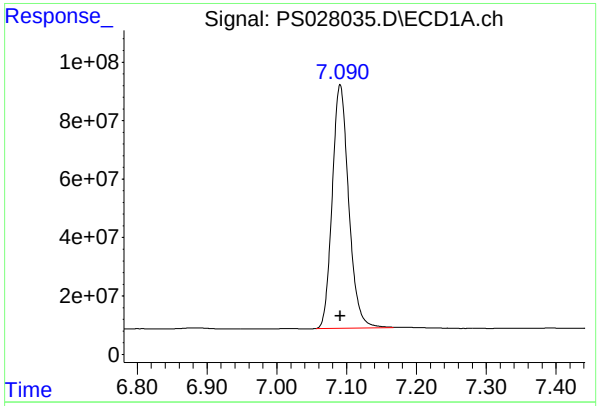
Manual Integrations APPROVED
Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:40:29 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm







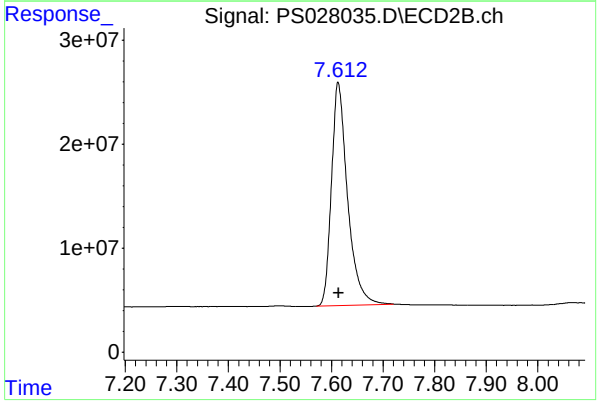
#4 2,4-DCAA

R.T.: 7.090 min
Delta R.T.: 0.000 min
Response: 1368959582
Conc: 507.59 ng/ml

Instrument :
ECD_S
ClientSampleId :
I.BLK

Manual Integrations
APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024



#4 2,4-DCAA

R.T.: 7.613 min
Delta R.T.: -0.002 min
Response: 464155644
Conc: 489.27 ng/ml

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Fax : 908 789 8922

Report of Analysis

Client:	Tetra Tech, EMI	Date Collected:	10/24/24
Project:	R36724	Date Received:	10/24/24
Client Sample ID:	PIBLK-PS028046.D	SDG No.:	P4462
Lab Sample ID:	I.BLK-PS028046.D	Matrix:	TCLP
Analytical Method:	SW8151A	% Solid:	0 Decanted:
Sample Wt/Vol:	1000 Units: mL	Final Vol:	10000 uL
Soil Aliquot Vol:	uL	Test:	TCLP Herbicide
Extraction Type:		Injection Volume :	
GPC Factor :	1.0 PH :		
Prep Method :	SW3510C		

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
PS028046.D	1		10/24/24	PS102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
94-75-7	2,4-D	0.49	U	0.49	2.00	ug/L
93-72-1	2,4,5-TP (Silvex)	0.45	U	0.45	2.00	ug/L
SURROGATES						
19719-28-9	2,4-DCAA	506		39 - 175	101%	SPK: 500

Comments:

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
P = Indicates >25% difference for detected concentrations between the two GC columns
Q = indicates LCS control criteria did not meet requirements
M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution
S = Indicates estimated value where valid five-point calibration was not performed prior to analyte detection in sample.
() = Laboratory InHouse Limit

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028046.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 20:44
Operator : AR\AJ
Sample : I.BLK
Misc :
ALS Vial : 2 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
I.BLK

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:49:59 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.090	7.612	1365.9E6	454.5E6	506.449m	479.127
	Target Compounds						

(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

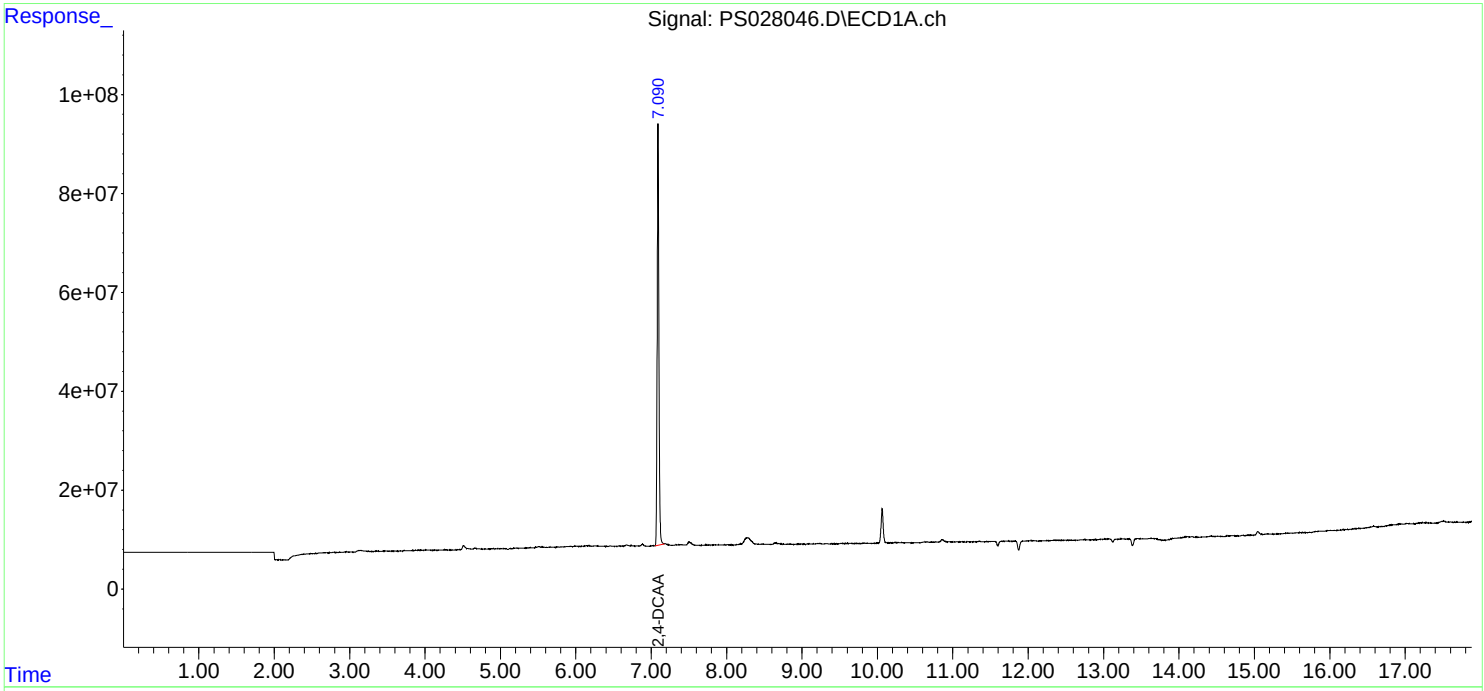
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028046.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 20:44
Operator : AR\AJ
Sample : I.BLK
Misc :
ALS Vial : 2 Sample Multiplier: 1

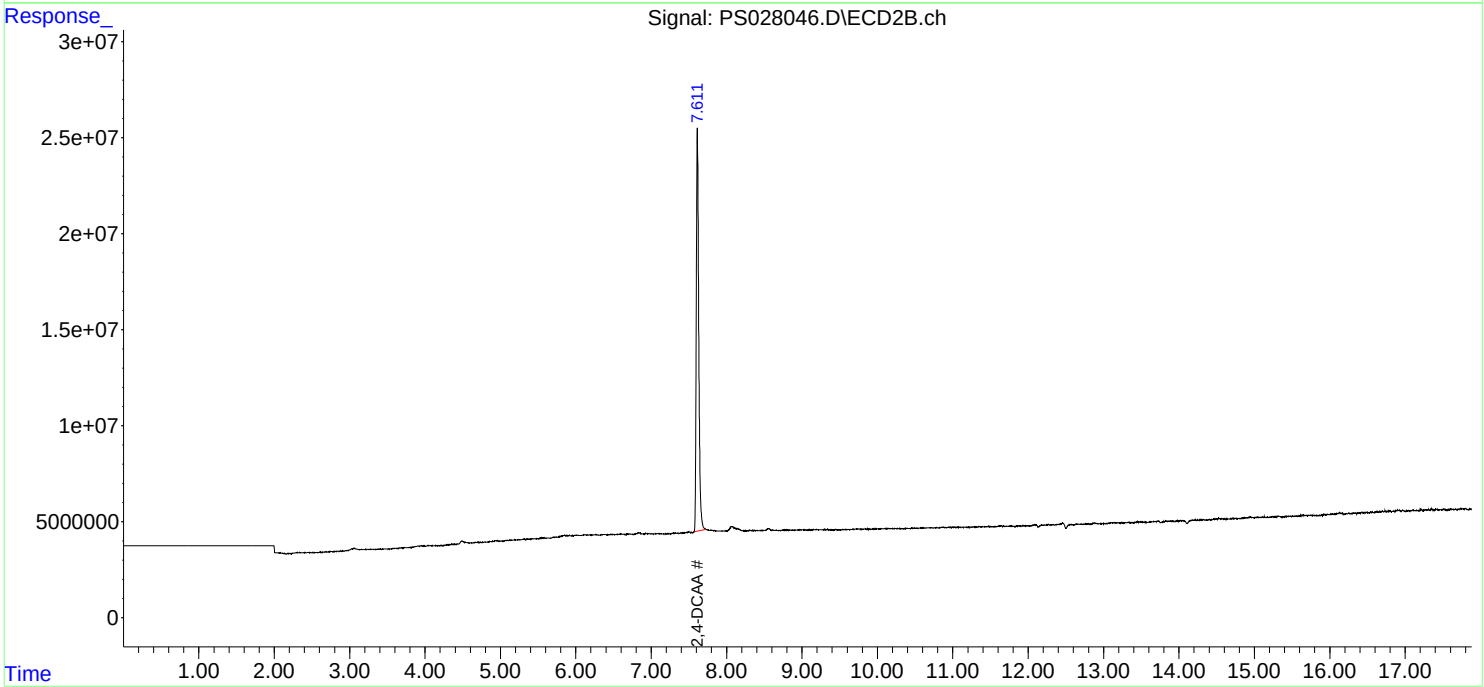
Instrument :
ECD_S
ClientSampleId :
I.BLK

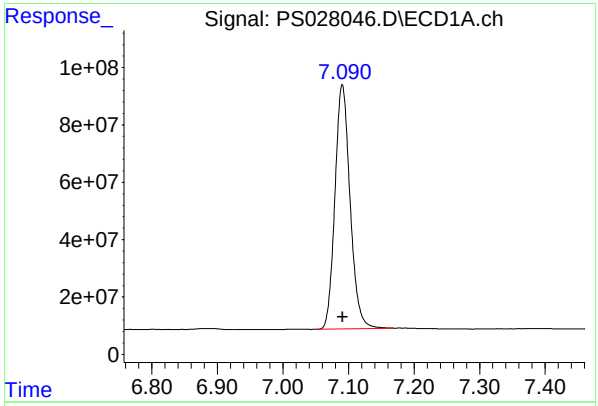
Manual Integrations APPROVED
Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:49:59 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm







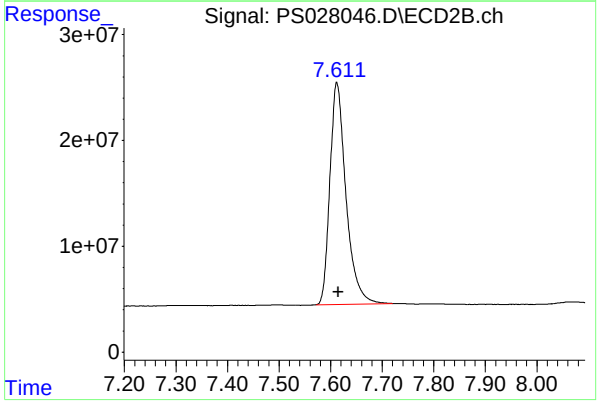
#4 2,4-DCAA

R.T.: 7.090 min
Delta R.T.: 0.000 min
Response: 1365875992
Conc: 506.45 ng/ml

Instrument :
ECD_S
ClientSampleId :
I.BLK

Manual Integrations
APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024



#4 2,4-DCAA

R.T.: 7.612 min
Delta R.T.: -0.002 min
Response: 454536852
Conc: 479.13 ng/ml

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Fax : 908 789 8922

Report of Analysis

Client:	Tetra Tech, EMI	Date Collected:	10/28/24
Project:	R36724	Date Received:	10/28/24
Client Sample ID:	PIBLK-PS028071.D	SDG No.:	P4462
Lab Sample ID:	I.BLK-PS028071.D	Matrix:	TCLP
Analytical Method:	SW8151A	% Solid:	0 Decanted:
Sample Wt/Vol:	1000 Units: mL	Final Vol:	10000 uL
Soil Aliquot Vol:	uL	Test:	TCLP Herbicide
Extraction Type:		Injection Volume :	
GPC Factor :	1.0 PH :		
Prep Method :	SW3510C		

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
PS028071.D	1		10/28/24	PS102824

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
94-75-7	2,4-D	0.49	U	0.49	2.00	ug/L
93-72-1	2,4,5-TP (Silvex)	0.45	U	0.45	2.00	ug/L
SURROGATES						
19719-28-9	2,4-DCAA	501		39 - 175	100%	SPK: 500

Comments:

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
P = Indicates >25% difference for detected concentrations between the two GC columns
Q = indicates LCS control criteria did not meet requirements
M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution
S = Indicates estimated value where valid five-point calibration was not performed prior to analyte detection in sample.
() = Laboratory InHouse Limit

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102824\
Data File : PS028071.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 28 Oct 2024 10:08
Operator : AR\AJ
Sample : I.BLK
Misc :
ALS Vial : 2 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
I.BLK

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 29 00:22:08 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.087	7.608	1350.7E6	458.7E6	500.827m	483.464
	Target Compounds						

(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

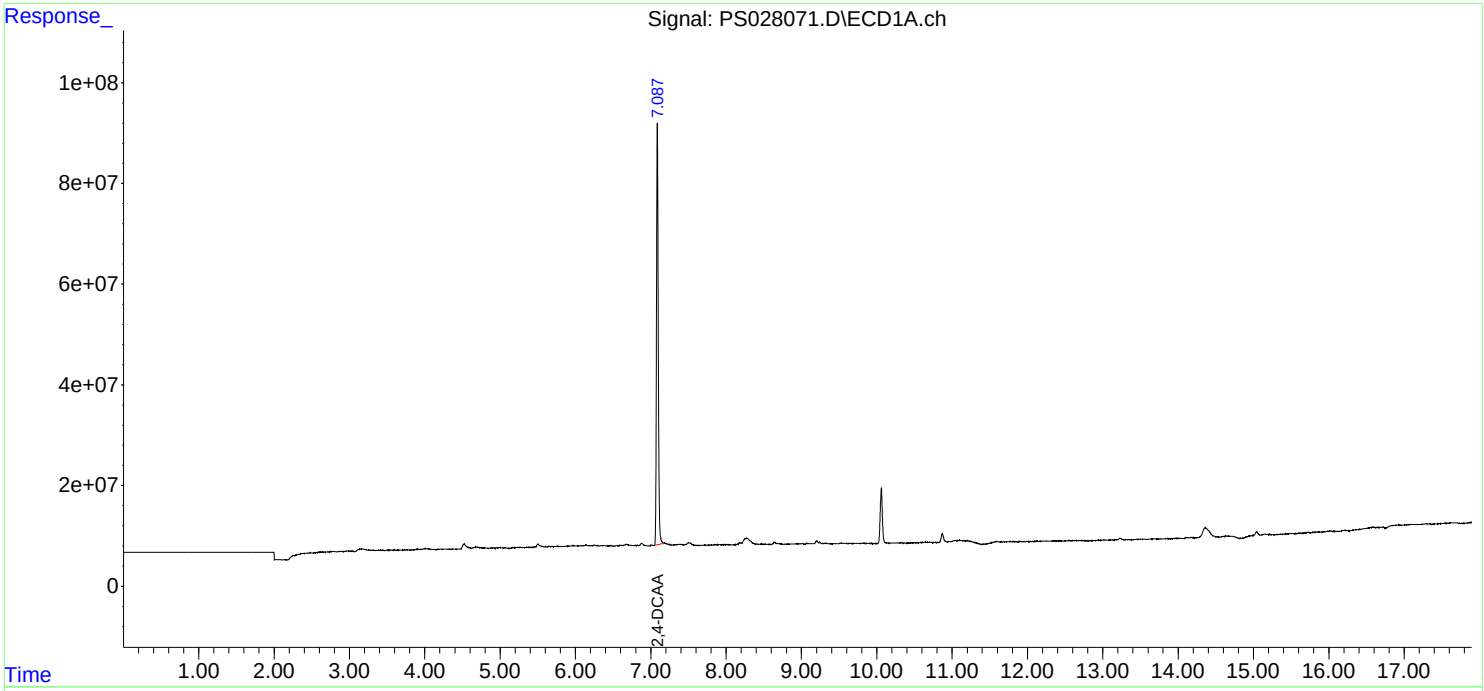
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102824\
Data File : PS028071.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 28 Oct 2024 10:08
Operator : AR\AJ
Sample : I.BLK
Misc :
ALS Vial : 2 Sample Multiplier: 1

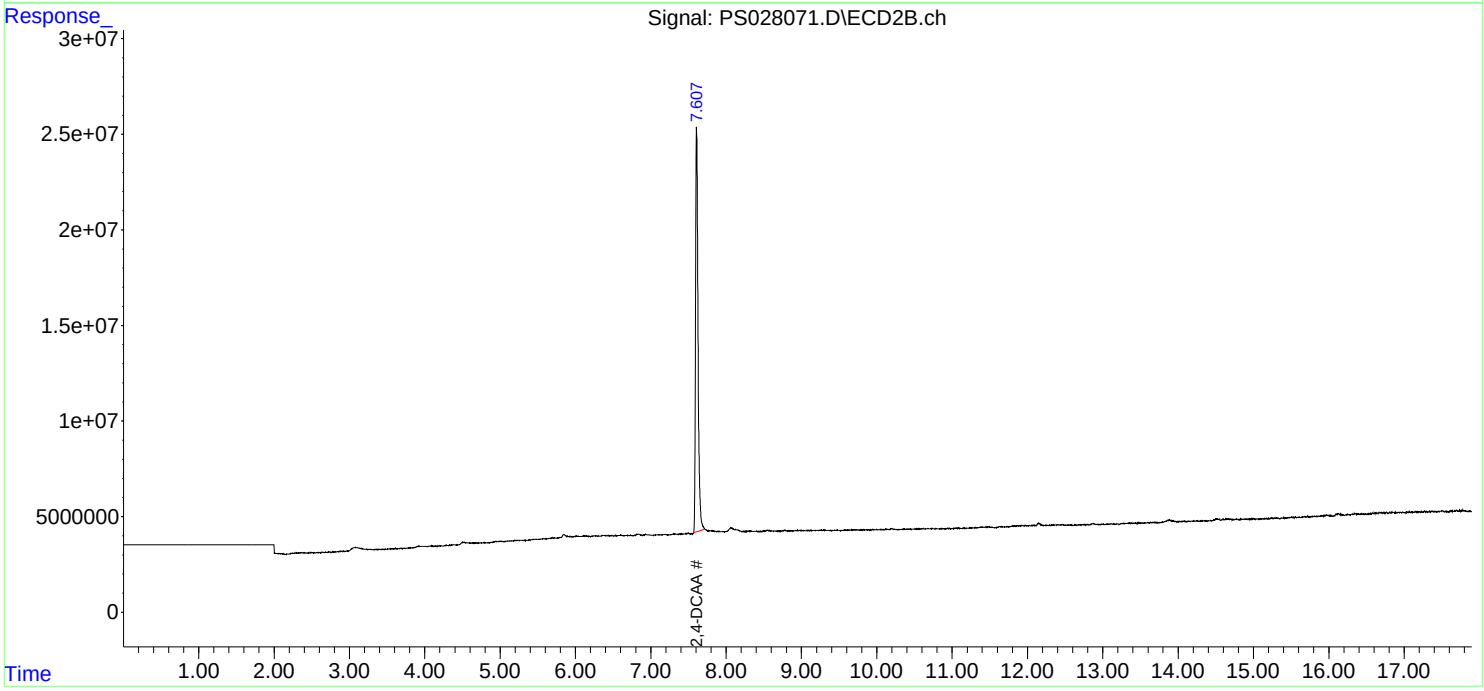
Instrument :
ECD_S
ClientSampleId :
I.BLK

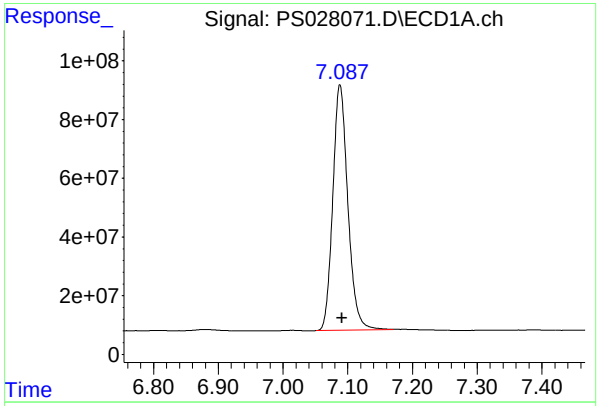
Manual Integrations APPROVED
Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 29 00:22:08 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm







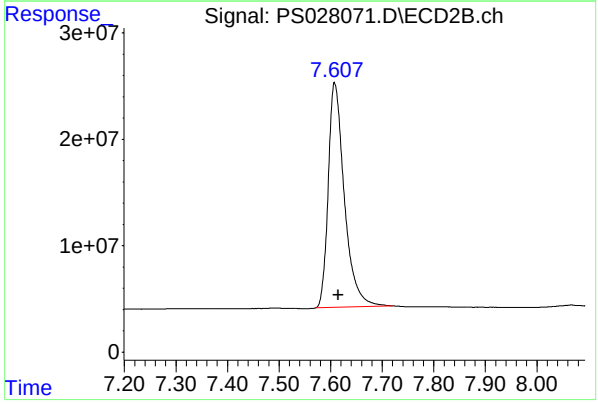
#4 2,4-DCAA

R.T.: 7.087 min
Delta R.T.: -0.004 min
Response: 1350712363
Conc: 500.83 ng/ml

Instrument :
ECD_S
ClientSampleId :
I.BLK

Manual Integrations
APPROVED

Reviewed By :Abdul Mirza 10/29/2024
Supervised By :Ankita Jodhani 10/29/2024



#4 2,4-DCAA

R.T.: 7.608 min
Delta R.T.: -0.006 min
Response: 458651955
Conc: 483.46 ng/ml

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284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Report of Analysis

Client:	Tetra Tech, EMI	Date Collected:	10/28/24
Project:	R36724	Date Received:	10/28/24
Client Sample ID:	PIBLK-PS028075.D	SDG No.:	P4462
Lab Sample ID:	I.BLK-PS028075.D	Matrix:	TCLP
Analytical Method:	SW8151A	% Solid:	0 Decanted:
Sample Wt/Vol:	1000 Units: mL	Final Vol:	10000 uL
Soil Aliquot Vol:	uL	Test:	TCLP Herbicide
Extraction Type:		Injection Volume :	
GPC Factor :	1.0 PH :		
Prep Method :	SW3510C		

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
PS028075.D	1		10/28/24	PS102824

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
94-75-7	2,4-D	0.49	U	0.49	2.00	ug/L
93-72-1	2,4,5-TP (Silvex)	0.45	U	0.45	2.00	ug/L
SURROGATES						
19719-28-9	2,4-DCAA	508		39 - 175	102%	SPK: 500

Comments:

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
P = Indicates >25% difference for detected concentrations between the two GC columns
Q = indicates LCS control criteria did not meet requirements
M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution
S = Indicates estimated value where valid five-point calibration was not performed prior to analyte detection in sample.
() = Laboratory InHouse Limit

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102824\
Data File : PS028075.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 28 Oct 2024 13:59
Operator : AR\AJ
Sample : I.BLK
Misc :
ALS Vial : 2 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
I.BLK

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 29 00:25:54 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.089	7.610	1371.3E6	396.1E6	508.447	417.553
	Target Compounds						

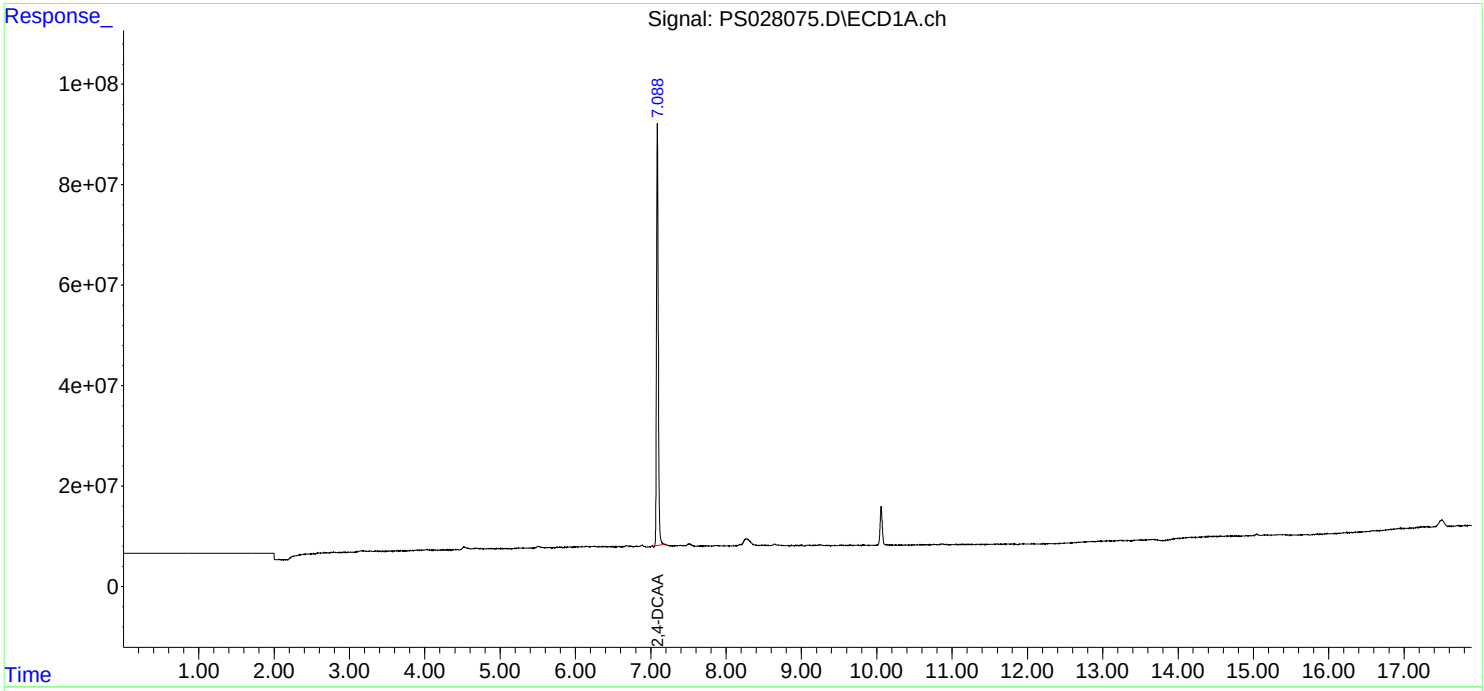
(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

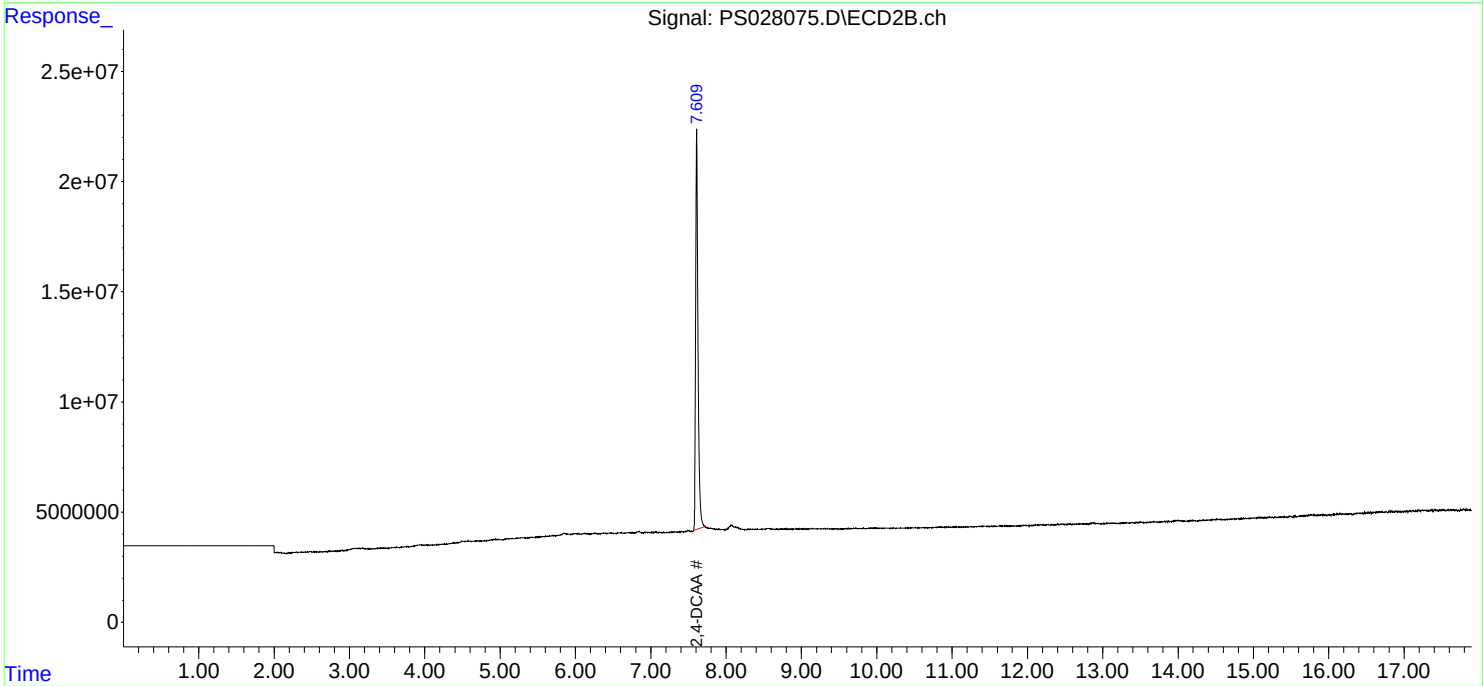
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102824\
Data File : PS028075.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 28 Oct 2024 13:59
Operator : AR\AJ
Sample : I.BLK
Misc :
ALS Vial : 2 Sample Multiplier: 1

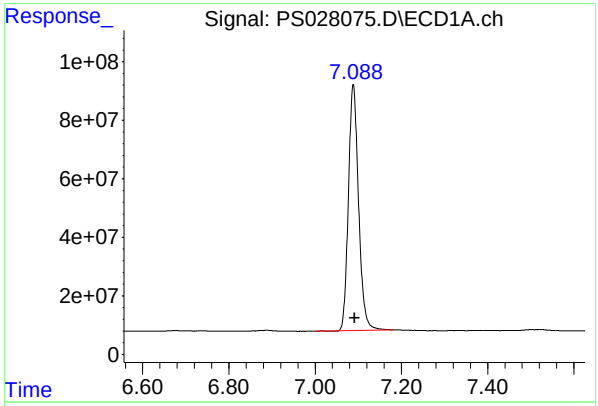
Instrument :
ECD_S
ClientSampleId :
I.BLK

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 29 00:25:54 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm



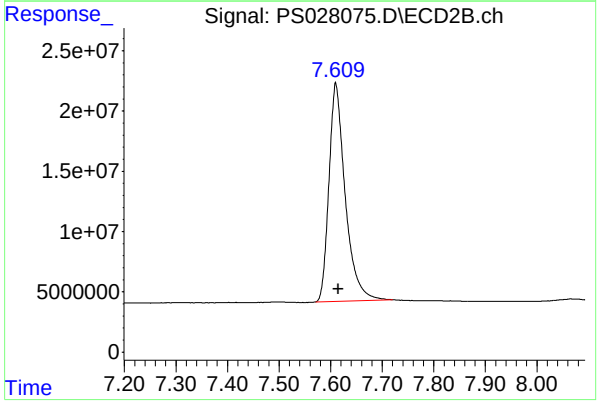




#4 2,4-DCAA

R.T.: 7.089 min
Delta R.T.: -0.003 min
Response: 1371263669
Conc: 508.45 ng/ml

Instrument :
ECD_S
ClientSampleId :
I.BLK



#4 2,4-DCAA

R.T.: 7.610 min
Delta R.T.: -0.004 min
Response: 396123335
Conc: 417.55 ng/ml

Alliance TECHNICAL GROUP
284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Report of Analysis

Client:	Tetra Tech, EMI	Date Collected:	
Project:	R36724	Date Received:	
Client Sample ID:	PB164378BS	SDG No.:	P4462
Lab Sample ID:	PB164378BS	Matrix:	TCLP
Analytical Method:	SW8151A	% Solid:	0 Decanted:
Sample Wt/Vol:	1000 Units: mL	Final Vol:	10000 uL
Soil Aliquot Vol:	uL	Test:	TCLP Herbicide
Extraction Type:		Injection Volume :	
GPC Factor :	1.0 PH :		
Prep Method :	SW3510C		

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
PS028038.D	1	10/24/24 11:28	10/24/24 17:33	PB164378

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
94-75-7	2,4-D	5.00		0.49	2.00	ug/L
93-72-1	2,4,5-TP (Silvex)	5.40		0.45	2.00	ug/L
SURROGATES						
19719-28-9	2,4-DCAA	542		39 - 175	108%	SPK: 500

Comments:

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
P = Indicates >25% difference for detected concentrations between the two GC columns
Q = indicates LCS control criteria did not meet requirements
M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution
S = Indicates estimated value where valid five-point calibration was not performed prior to analyte detection in sample.
() = Laboratory InHouse Limit

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028038.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 17:33
Operator : AR\AJ
Sample : PB164378BS
Misc :
ALS Vial : 7 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
PB164378BS

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:42:13 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.092	7.613	1366.0E6	513.7E6	506.494	541.517
	Target Compounds						
1) T	Dalapon	2.539	2.612	2094.8E6	775.8E6	459.742	454.878
2) T	3,5-DICHL...	6.284	6.586	1837.1E6	659.2E6	464.268	492.861
3) T	4-Nitroph...	6.886	7.146	842.3E6	339.9E6	455.202	491.699
5) T	DICAMBA	7.270	7.805	5231.5E6	1689.3E6	478.335	511.177
6) T	MCPP	7.448	7.908	338.2E6	131.0E6	46.126	50.658
7) T	MCPA	7.592	8.147	482.5E6	228.9E6	45.505	49.742
8) T	DICHLORPROP	7.955	8.512	1377.6E6	488.7E6	477.724	521.599
9) T	2,4-D	8.178	8.837	1661.3E6	496.6E6	490.275	498.000
10) T	Pentachlo...	8.464	9.348	19935.8E6	6669.1E6	503.787	520.776
11) T	2,4,5-TP ...	9.030	9.724	7884.8E6	2460.6E6	488.197	539.051
12) T	2,4,5-T	9.315	10.137	8059.8E6	2165.9E6	482.435	526.673
13) T	2,4-DB	9.877	10.699	1249.0E6	279.6E6	474.374	547.387
14) T	DINOSEB	11.052	11.072	5258.5E6	1672.8E6	477.745	497.146
15) T	Picloram	10.867	12.150	10639.9E6	1877.2E6	477.867	411.959
16) T	DCPA	11.351	12.102	9048.8E6	2545.6E6	489.433	548.485

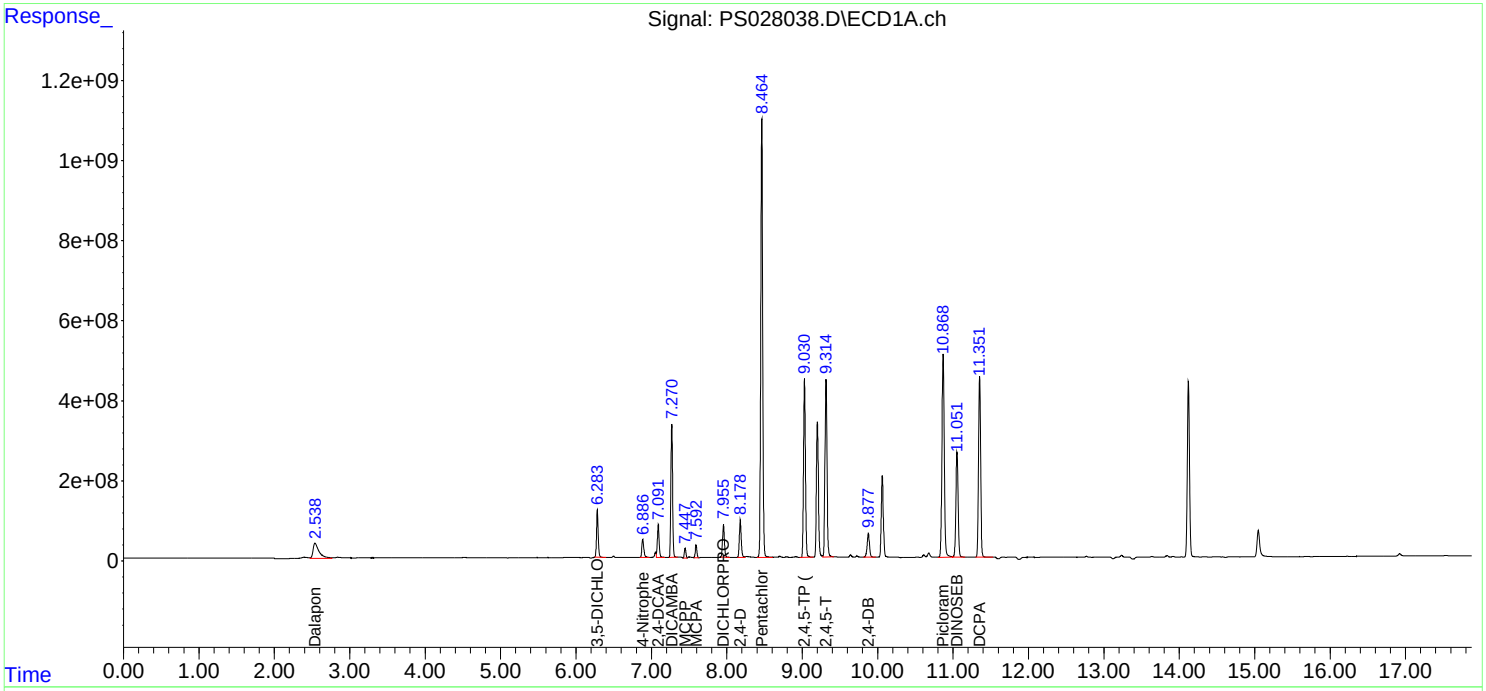
(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

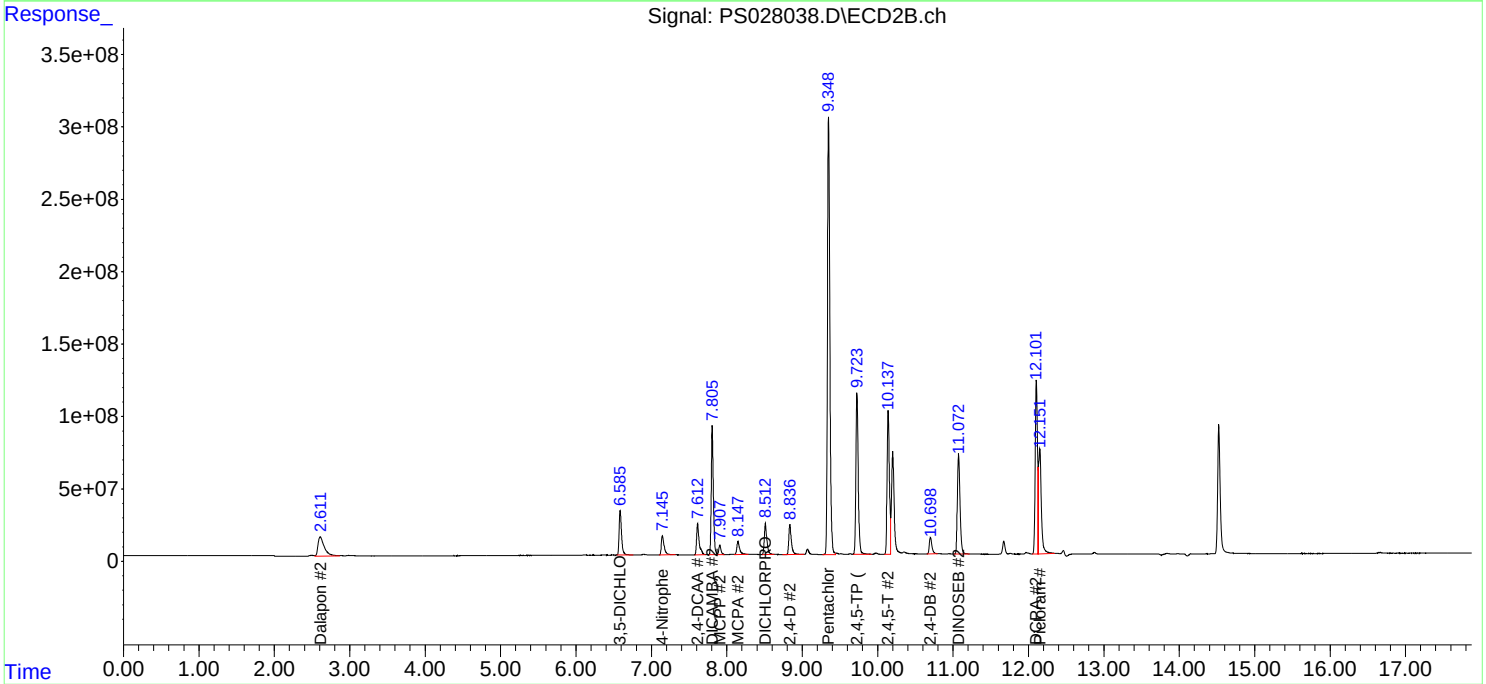
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028038.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 17:33
Operator : AR\AJ
Sample : PB164378BS
Misc :
ALS Vial : 7 Sample Multiplier: 1

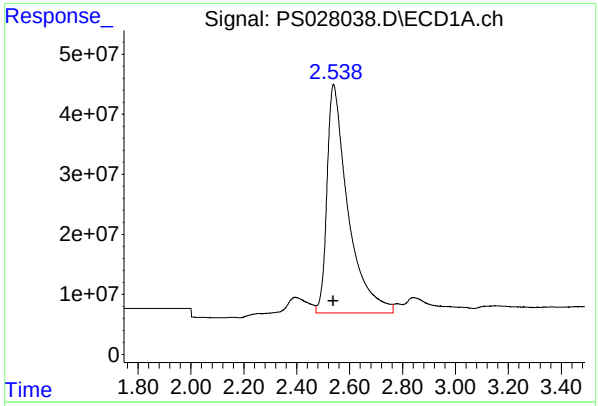
Instrument :
ECD_S
ClientSampleId :
PB164378BS

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:42:13 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm



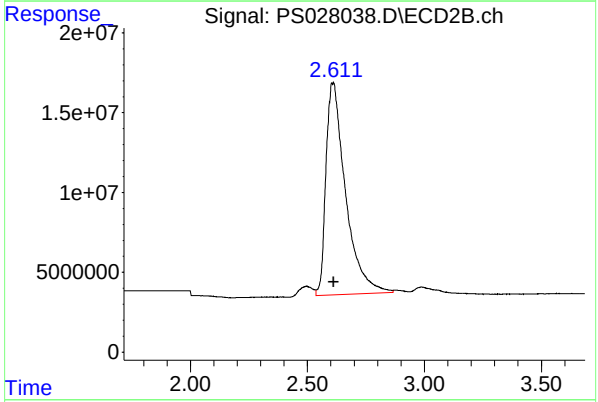




#1 Dalapon

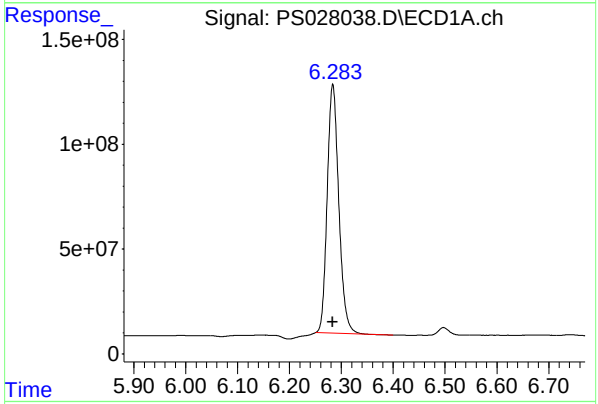
R.T.: 2.539 min
Delta R.T.: 0.001 min
Response: 2094773090
Conc: 459.74 ng/ml

Instrument :
ECD_S
ClientSampleId :
PB164378BS



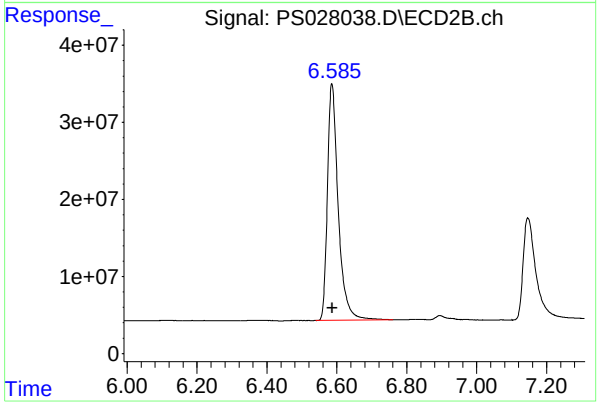
#1 Dalapon

R.T.: 2.612 min
Delta R.T.: 0.000 min
Response: 775757088
Conc: 454.88 ng/ml



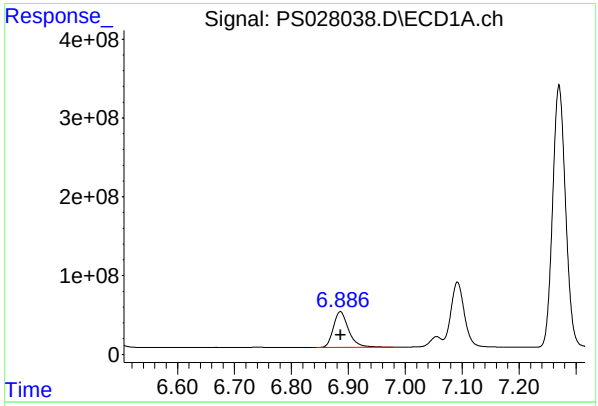
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.284 min
Delta R.T.: 0.000 min
Response: 1837115840
Conc: 464.27 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

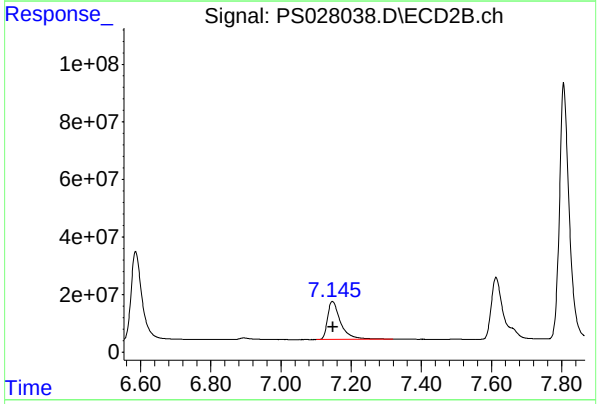
R.T.: 6.586 min
Delta R.T.: -0.002 min
Response: 659204157
Conc: 492.86 ng/ml



#3 4-Nitrophenol

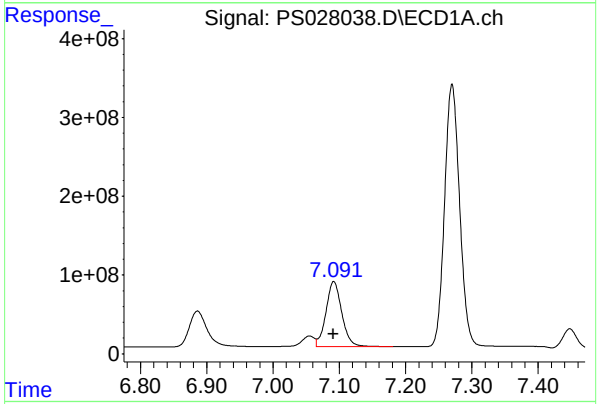
R.T.: 6.886 min
Delta R.T.: 0.000 min
Response: 842313272
Conc: 455.20 ng/ml

Instrument :
ECD_S
ClientSampleId :
PB164378BS



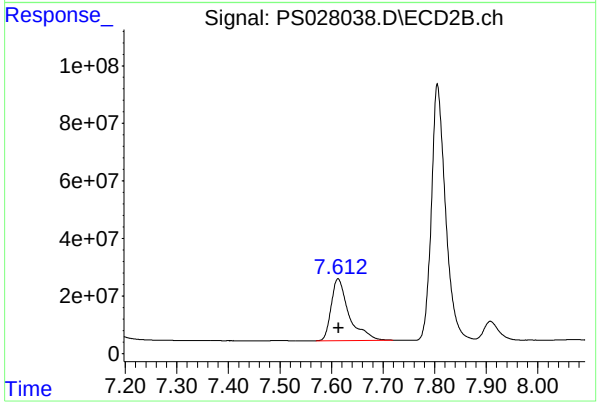
#3 4-Nitrophenol

R.T.: 7.146 min
Delta R.T.: -0.002 min
Response: 339894693
Conc: 491.70 ng/ml



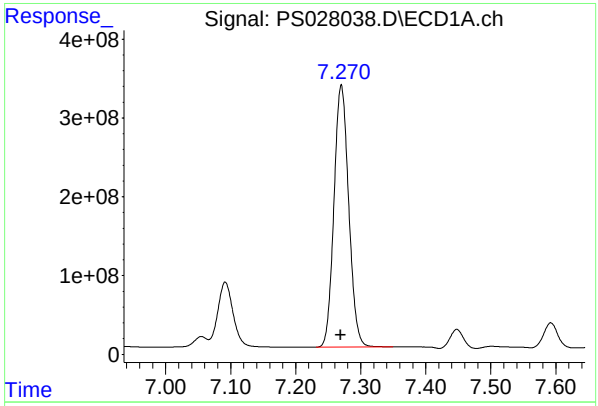
#4 2,4-DCAA

R.T.: 7.092 min
Delta R.T.: 0.000 min
Response: 1365995367
Conc: 506.49 ng/ml



#4 2,4-DCAA

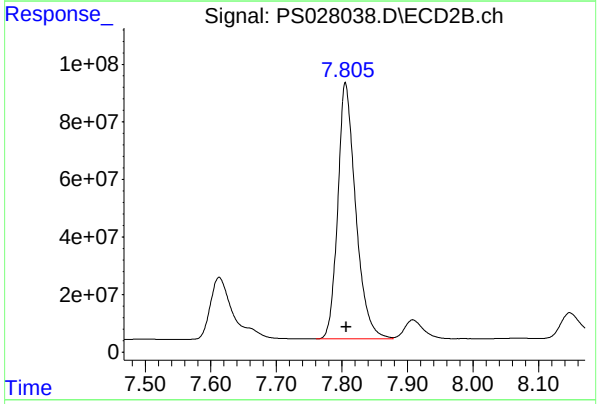
R.T.: 7.613 min
Delta R.T.: -0.002 min
Response: 513725616
Conc: 541.52 ng/ml



#5 DICAMBA

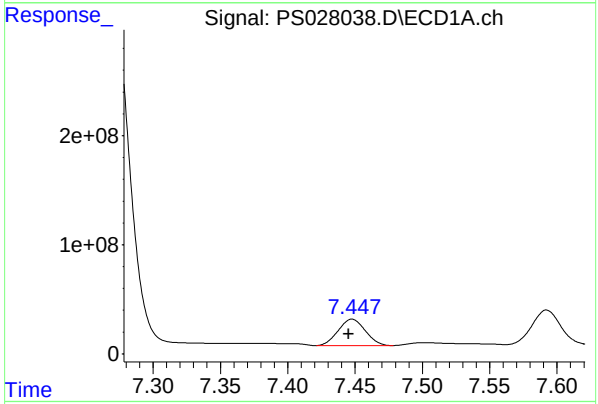
R.T.: 7.270 min
Delta R.T.: 0.000 min
Response: 5231474937
Conc: 478.33 ng/ml

Instrument :
ECD_S
ClientSampleId :
PB164378BS



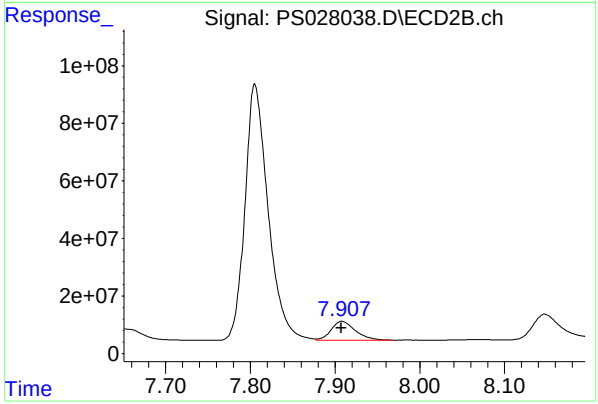
#5 DICAMBA

R.T.: 7.805 min
Delta R.T.: -0.001 min
Response: 1689272241
Conc: 511.18 ng/ml



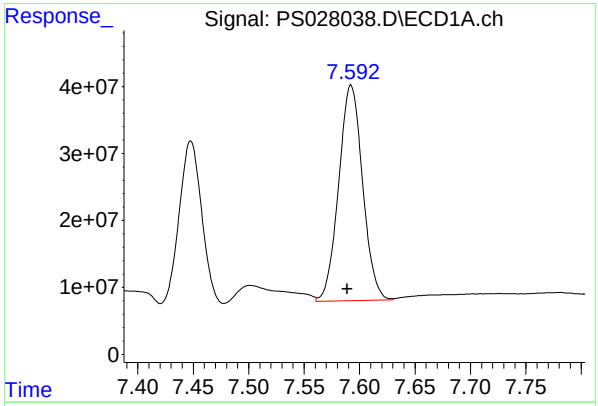
#6 MCPP

R.T.: 7.448 min
Delta R.T.: 0.003 min
Response: 338224223
Conc: 46.13 ug/ml



#6 MCPP

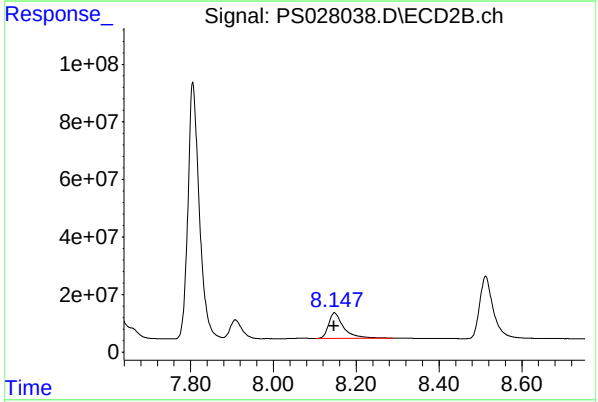
R.T.: 7.908 min
Delta R.T.: 0.000 min
Response: 130951855
Conc: 50.66 ug/ml



#7 MCPA

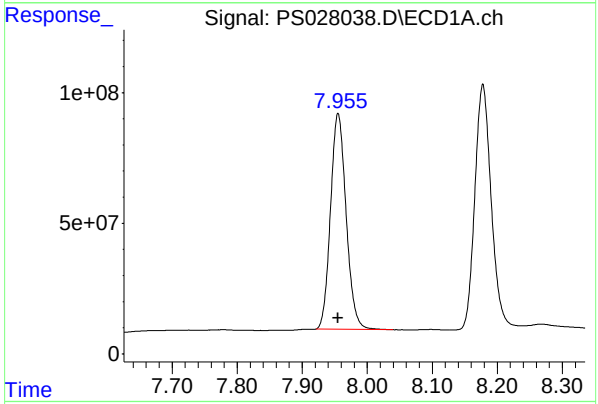
R.T.: 7.592 min
Delta R.T.: 0.003 min
Response: 482524016
Conc: 45.50 ug/ml

Instrument :
ECD_S
ClientSampleId :
PB164378BS



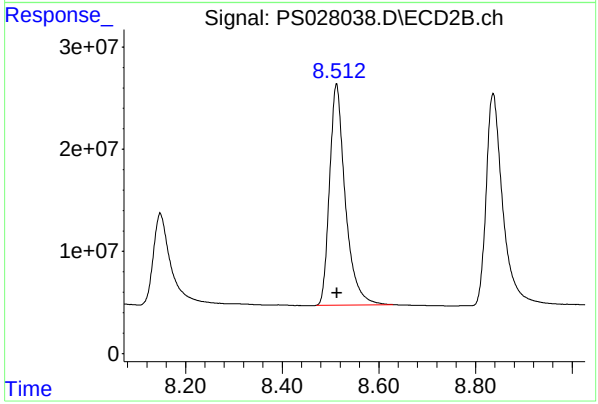
#7 MCPA

R.T.: 8.147 min
Delta R.T.: 0.000 min
Response: 228908177
Conc: 49.74 ug/ml



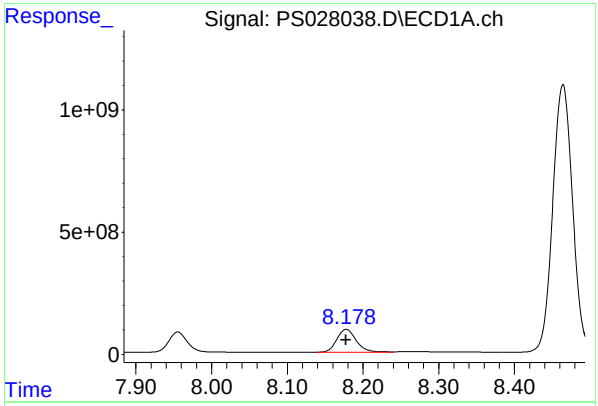
#8 DICHLORPROP

R.T.: 7.955 min
Delta R.T.: 0.000 min
Response: 1377606056
Conc: 477.72 ng/ml



#8 DICHLORPROP

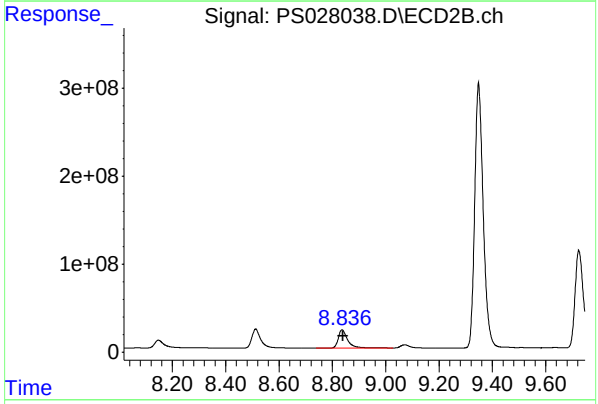
R.T.: 8.512 min
Delta R.T.: 0.000 min
Response: 488713067
Conc: 521.60 ng/ml



#9 2,4-D

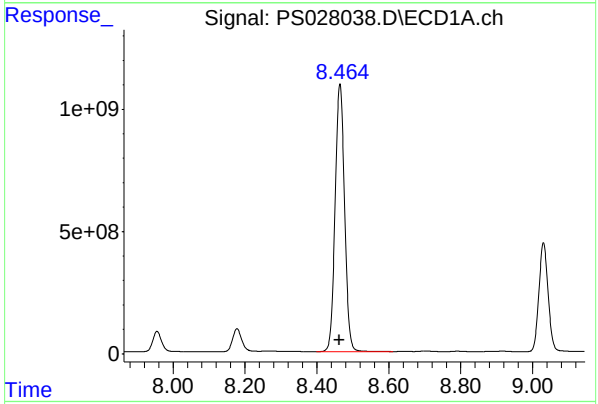
R.T.: 8.178 min
Delta R.T.: 0.000 min
Response: 1661290200
Conc: 490.27 ng/ml

Instrument :
ECD_S
ClientSampleId :
PB164378BS



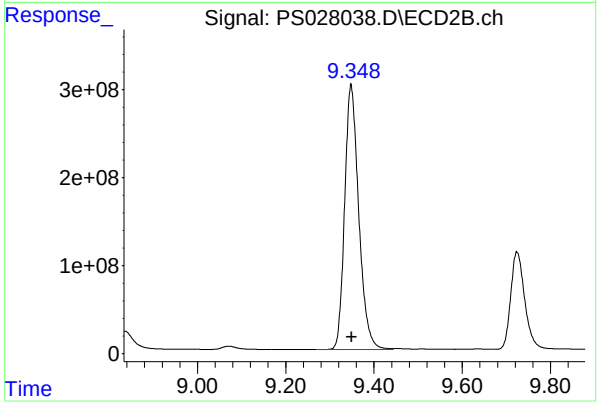
#9 2,4-D

R.T.: 8.837 min
Delta R.T.: -0.003 min
Response: 496578391
Conc: 498.00 ng/ml



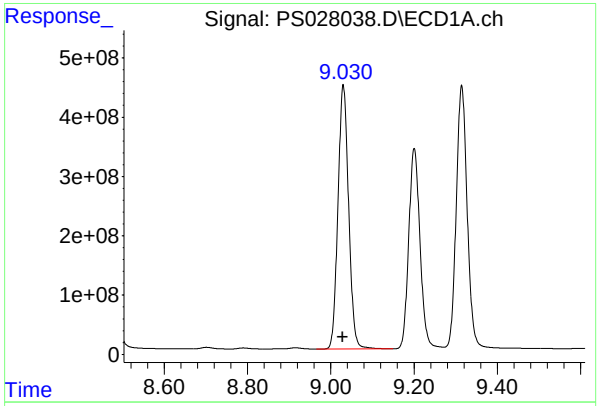
#10 Pentachlorophenol

R.T.: 8.464 min
Delta R.T.: 0.001 min
Response: 19935830038
Conc: 503.79 ng/ml



#10 Pentachlorophenol

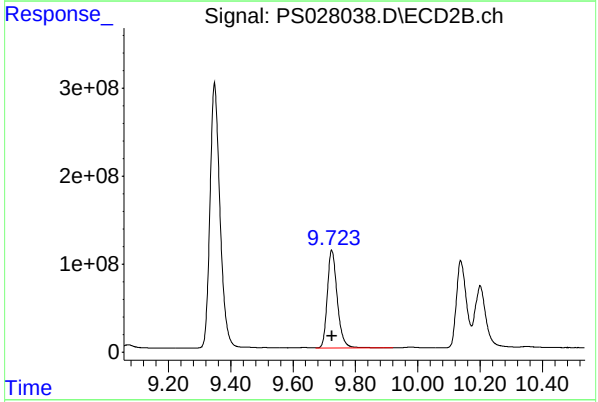
R.T.: 9.348 min
Delta R.T.: -0.001 min
Response: 6669124577
Conc: 520.78 ng/ml



#11 2,4,5-TP (SILVEX)

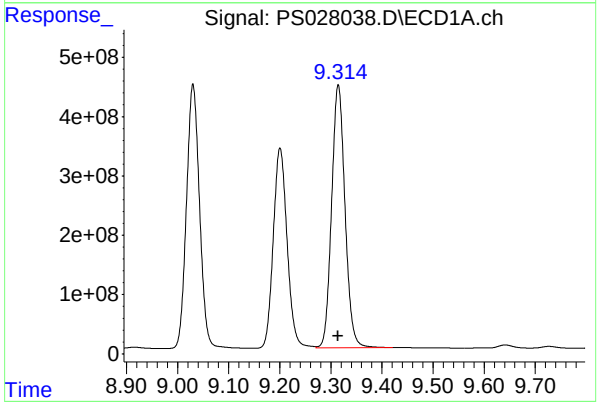
R.T.: 9.030 min
Delta R.T.: 0.001 min
Response: 7884762048
Conc: 488.20 ng/ml

Instrument :
ECD_S
ClientSampleId :
PB164378BS



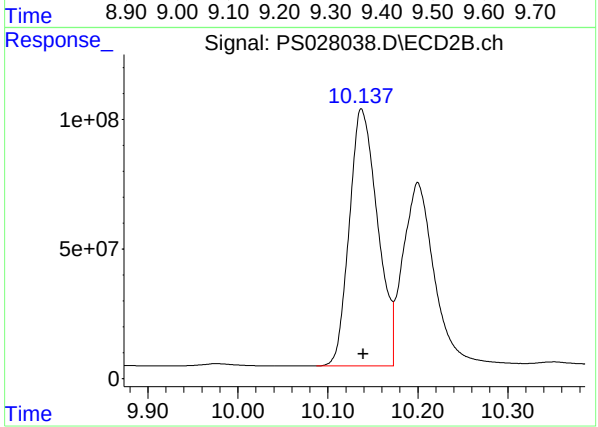
#11 2,4,5-TP (SILVEX)

R.T.: 9.724 min
Delta R.T.: -0.002 min
Response: 2460569571
Conc: 539.05 ng/ml



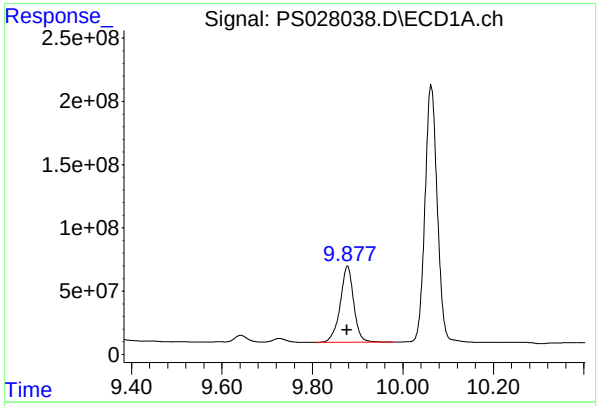
#12 2,4,5-T

R.T.: 9.315 min
Delta R.T.: 0.000 min
Response: 8059819972
Conc: 482.44 ng/ml



#12 2,4,5-T

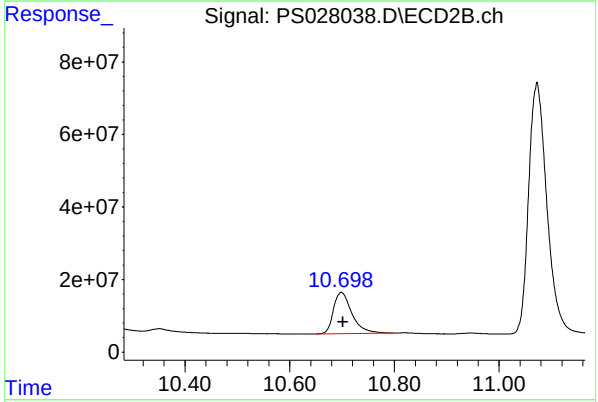
R.T.: 10.137 min
Delta R.T.: -0.002 min
Response: 2165911607
Conc: 526.67 ng/ml



#13 2,4-DB

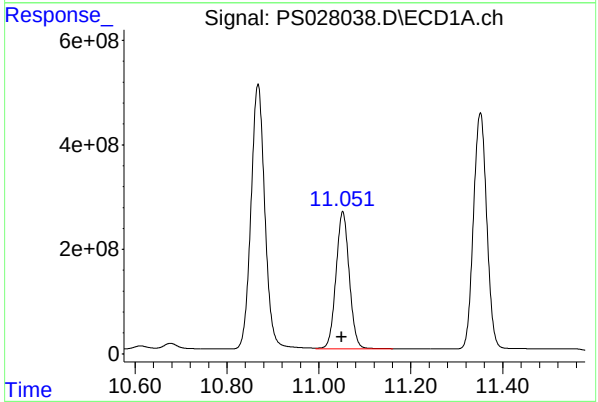
R.T.: 9.877 min
Delta R.T.: 0.000 mi
Response: 1248994392
Conc: 474.37 ng/m

Instrument :
ECD_S
ClientSampleId :
PB164378BS



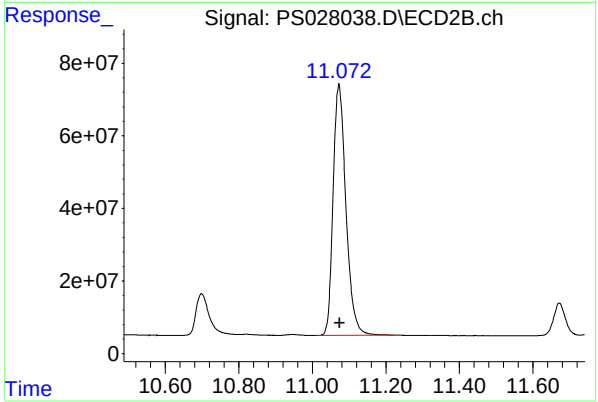
#13 2,4-DB

R.T.: 10.699 min
Delta R.T.: -0.003 min
Response: 279575636
Conc: 547.39 ng/ml



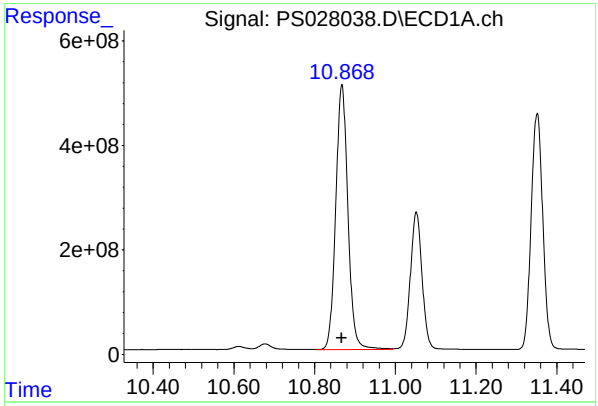
#14 DINOSEB

R.T.: 11.052 min
Delta R.T.: 0.002 min
Response: 5258456691
Conc: 477.75 ng/ml



#14 DINOSEB

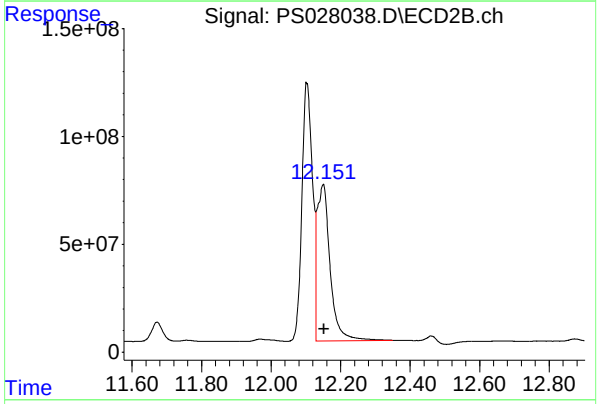
R.T.: 11.072 min
Delta R.T.: -0.002 min
Response: 1672800373
Conc: 497.15 ng/ml



#15 Picloram

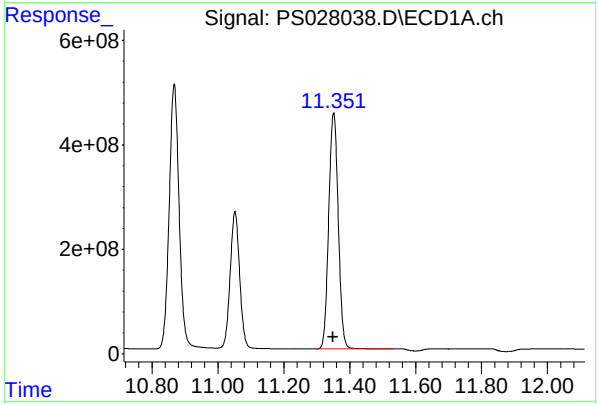
R.T.: 10.867 min
Delta R.T.: 0.000 min
Response: 10639875619
Conc: 477.87 ng/ml

Instrument :
ECD_S
ClientSampleId :
PB164378BS



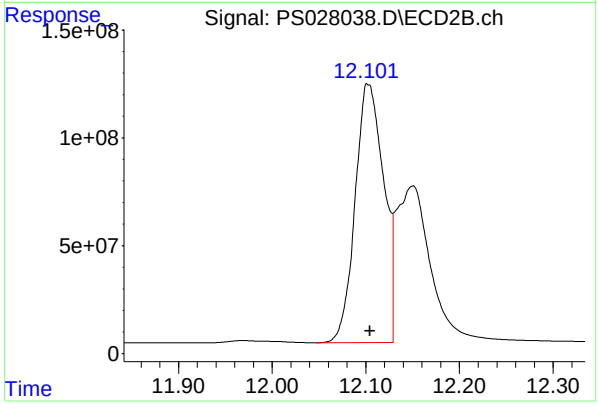
#15 Picloram

R.T.: 12.150 min
Delta R.T.: -0.002 min
Response: 1877212256
Conc: 411.96 ng/ml



#16 DCPA

R.T.: 11.351 min
Delta R.T.: 0.002 min
Response: 9048846125
Conc: 489.43 ng/ml



#16 DCPA

R.T.: 12.102 min
Delta R.T.: -0.002 min
Response: 2545605077
Conc: 548.48 ng/ml

Alliance TECHNICAL GROUP
284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Report of Analysis

Client:	Tetra Tech, EMI	Date Collected:	10/10/24
Project:	R36724	Date Received:	10/11/24
Client Sample ID:	WB-301-BOTMS	SDG No.:	P4462
Lab Sample ID:	P4397-06MS	Matrix:	TCLP
Analytical Method:	SW8151A	% Solid:	0 Decanted:
Sample Wt/Vol:	100 Units: mL	Final Vol:	10000 uL
Soil Aliquot Vol:	uL	Test:	TCLP Herbicide
Extraction Type:		Injection Volume :	
GPC Factor :	1.0 PH :		
Prep Method :	SW3510C		

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
PS028042.D	1	10/24/24 11:28	10/24/24 19:09	PB164378

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
94-75-7	2,4-D	55.2		4.90	20.0	ug/L
93-72-1	2,4,5-TP (Silvex)	106	P	4.50	20.0	ug/L
SURROGATES						
19719-28-9	2,4-DCAA	138	*	39 - 175	28%	SPK: 500

Comments:

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
P = Indicates >25% difference for detected concentrations between the two GC columns
Q = indicates LCS control criteria did not meet requirements
M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution
S = Indicates estimated value where valid five-point calibration was not performed prior to analyte detection in sample.
() = Laboratory InHouse Limit

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028042.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 19:09
Operator : AR\AJ
Sample : P4397-06MS
Misc :
ALS Vial : 11 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMS

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:46:04 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.091	7.612	372.5E6	108.3E6	138.132m	114.209
	Target Compounds						
1) T	Dalapon	2.542	2.617	1501.3E6	593.4E6	329.484	347.931m
2) T	3,5-DICHL...	6.283	6.585	1113.2E6	379.0E6	281.331	283.362
5) T	DICAMBA	7.269	7.806	4487.4E6	1321.2E6	410.303	399.789
6) T	MCPP	7.447	7.907	308.6E6	88714857	42.083m	34.319
7) T	MCPA	7.591	8.144	392.5E6	197.2E6	37.010	42.856m
8) T	DICHLORPROP	7.954	8.509	1244.3E6	447.1E6	431.484	477.210
9) T	2,4-D	8.176	8.835	1660.6E6	550.3E6	490.057	551.913
10) T	Pentachlo...	8.463	9.347	5387.2E6	1448.7E6	136.136	113.125
11) T	2,4,5-TP ...	9.028	9.727	7631.5E6	4822.3E6	472.516	1056.448 #
12) T	2,4,5-T	9.313	10.137	7507.8E6	2074.7E6	449.393	504.482
13) T	2,4-DB	9.875	10.695	1031.4E6	207.3E6	391.725	405.788
14) T	DINOSEB	11.050	11.072	984.3E6	285.6E6	89.429	84.881
15) T	Picloram	10.865	12.144	8825.0E6	1858.8E6	396.357	407.909
16) T	DCPA	11.349	12.104	9964.0E6	2828.9E6	538.930	609.515

(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

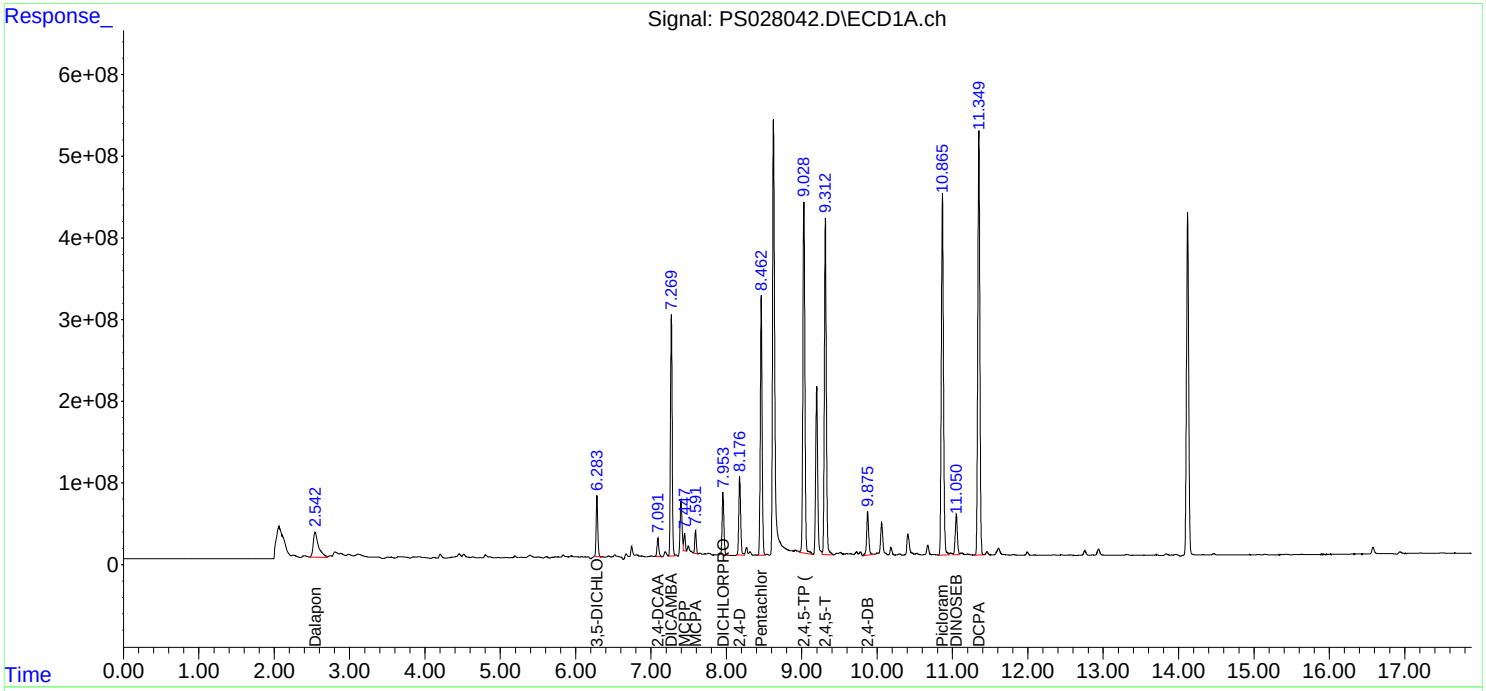
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028042.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 19:09
Operator : AR\AJ
Sample : P4397-06MS
Misc :
ALS Vial : 11 Sample Multiplier: 1

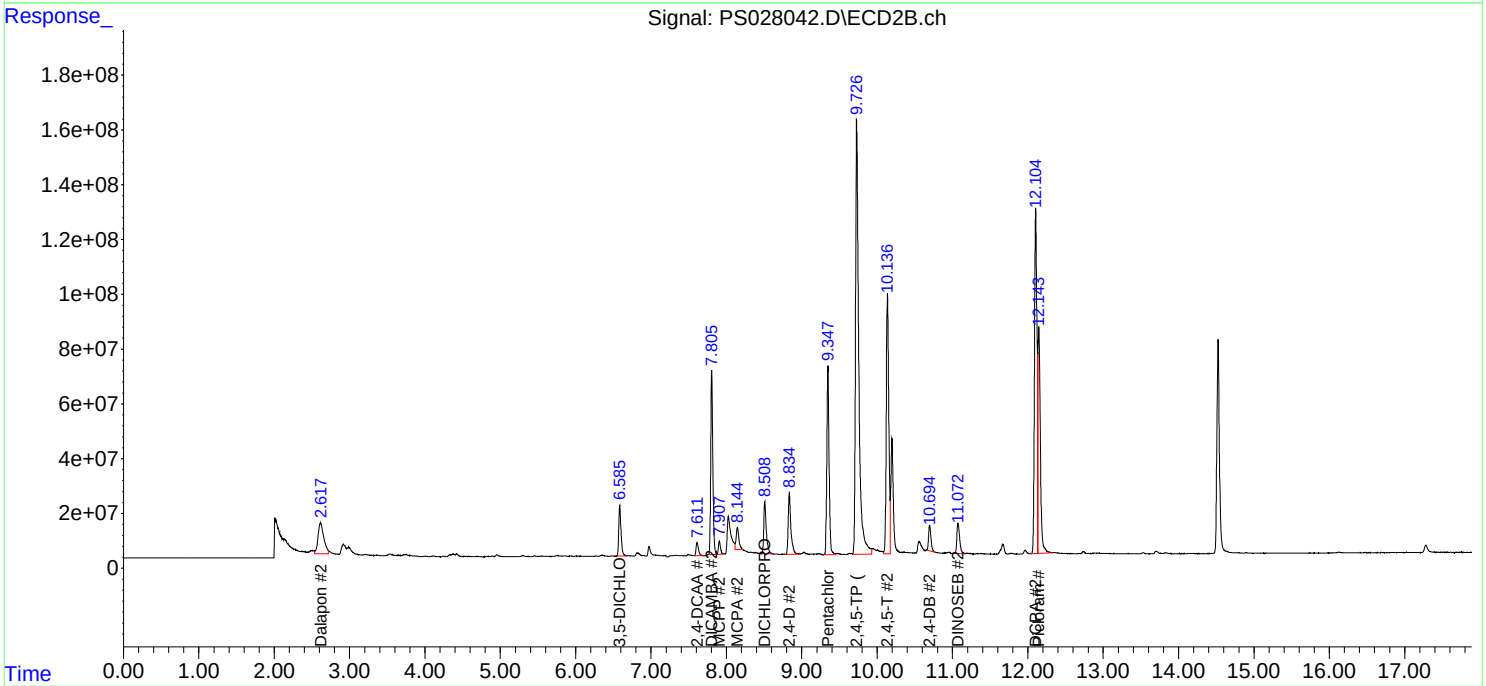
Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMS

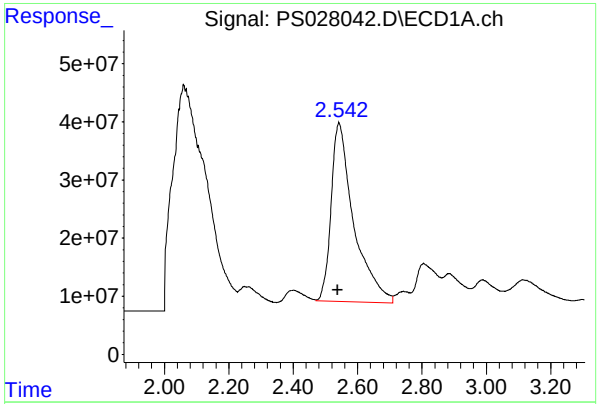
Manual Integrations APPROVED
Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:46:04 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm







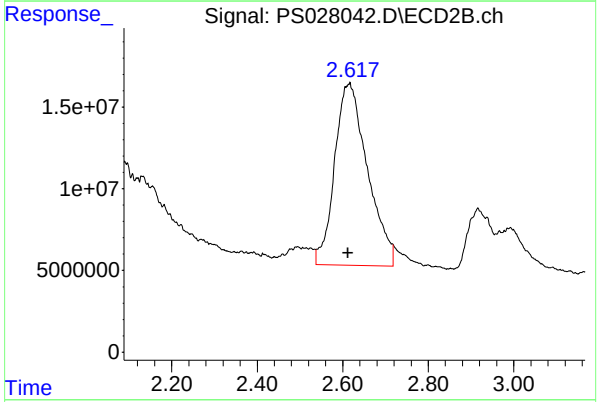
#1 Dalapon

R.T.: 2.542 min
Delta R.T.: 0.004 mi
Response: 1501264090
Conc: 329.48 ng/m

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMS

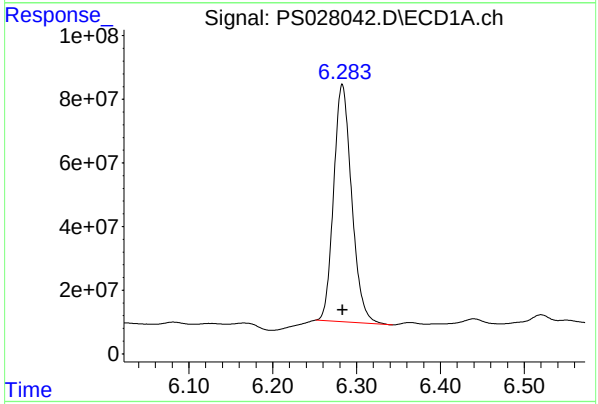
Manual Integrations
APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024



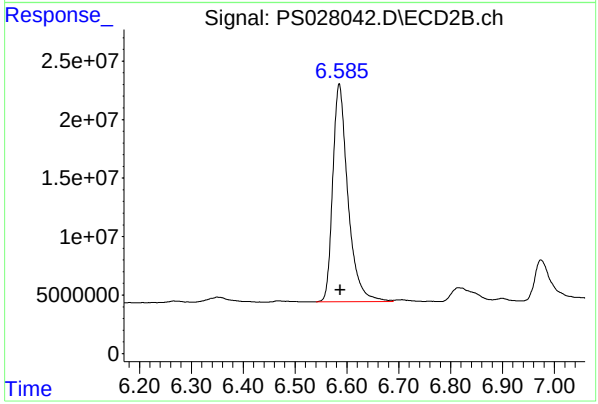
#1 Dalapon

R.T.: 2.617 min
Delta R.T.: 0.004 min
Response: 593368349
Conc: 347.93 ng/ml m



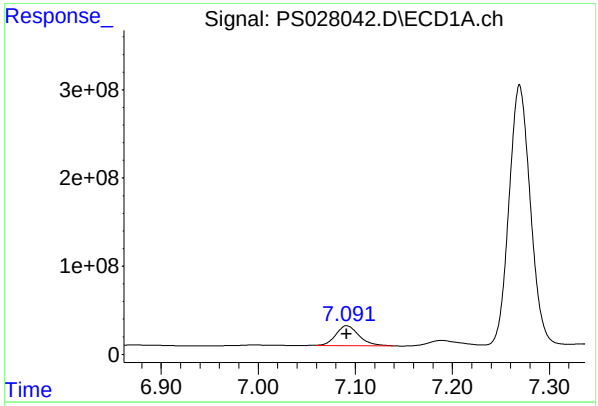
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.283 min
Delta R.T.: 0.000 min
Response: 1113230887
Conc: 281.33 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.585 min
Delta R.T.: -0.002 min
Response: 378998345
Conc: 283.36 ng/ml



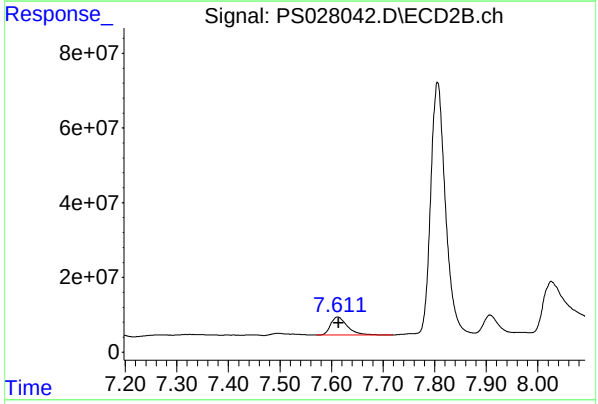
#4 2,4-DCAA

R.T.: 7.091 min
Delta R.T.: 0.000 min
Response: 372535869
Conc: 138.13 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMS

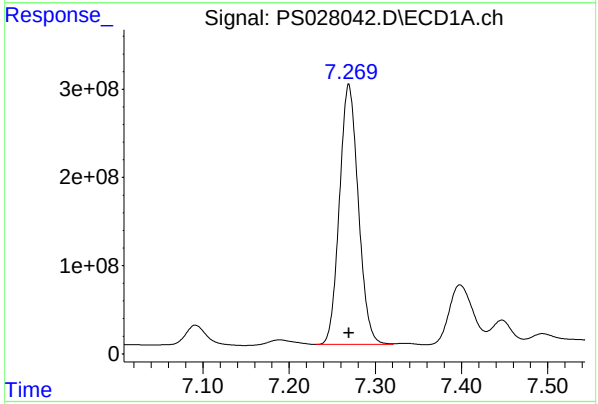
Manual Integrations
APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024



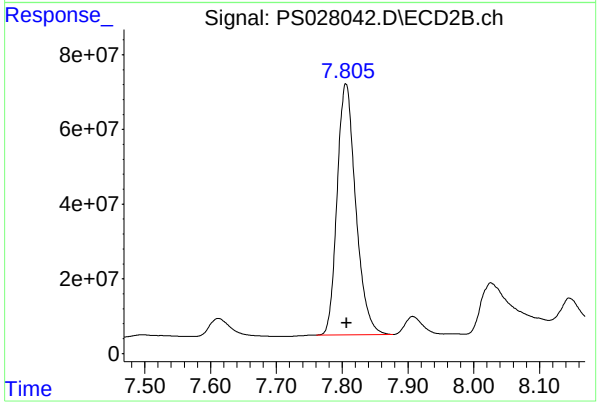
#4 2,4-DCAA

R.T.: 7.612 min
Delta R.T.: -0.003 min
Response: 108347716
Conc: 114.21 ng/ml



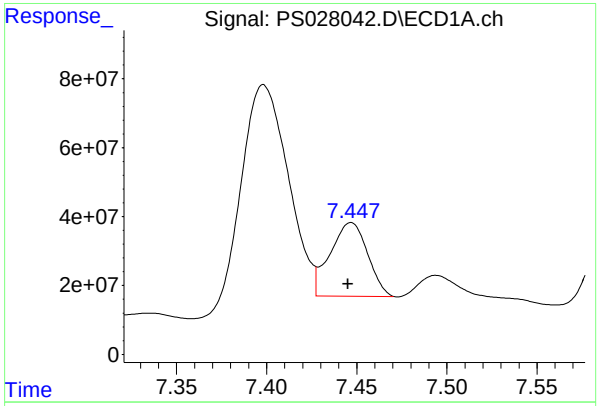
#5 DICAMBA

R.T.: 7.269 min
Delta R.T.: 0.000 min
Response: 4487417818
Conc: 410.30 ng/ml



#5 DICAMBA

R.T.: 7.806 min
Delta R.T.: 0.000 min
Response: 1321170765
Conc: 399.79 ng/ml



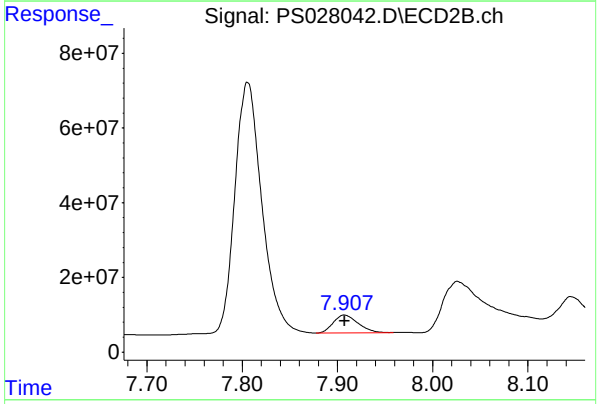
#6 MCPP

R.T.: 7.447 min
Delta R.T.: 0.001 mi
Response: 308578801
Conc: 42.08 ug/m

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMS

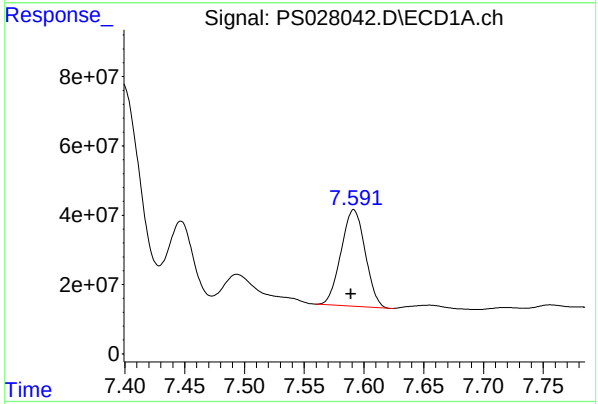
Manual Integrations
APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024



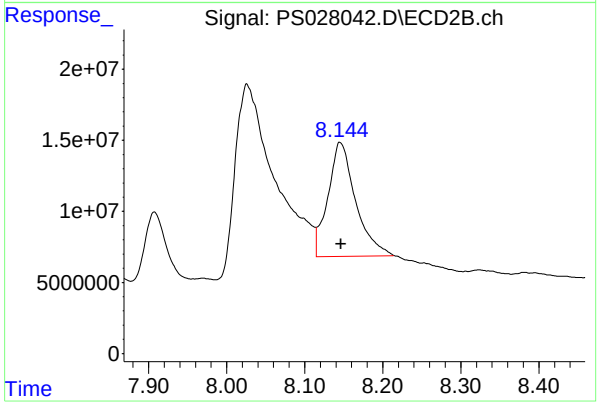
#6 MCPP

R.T.: 7.907 min
Delta R.T.: 0.000 min
Response: 88714857
Conc: 34.32 ug/ml



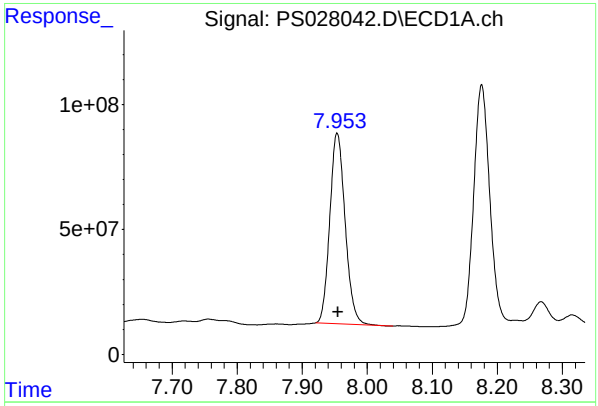
#7 MCPA

R.T.: 7.591 min
Delta R.T.: 0.002 min
Response: 392454219
Conc: 37.01 ug/ml



#7 MCPA

R.T.: 8.144 min
Delta R.T.: -0.002 min
Response: 197220012
Conc: 42.86 ug/ml m



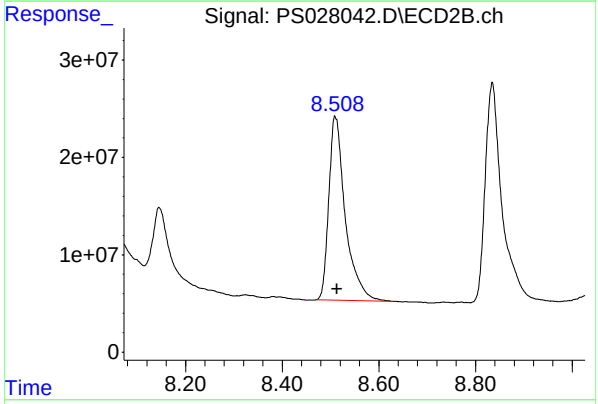
#8 DICHLORPROP

R.T.: 7.954 min
Delta R.T.: 0.000 min
Response: 1244263506
Conc: 431.48 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMS

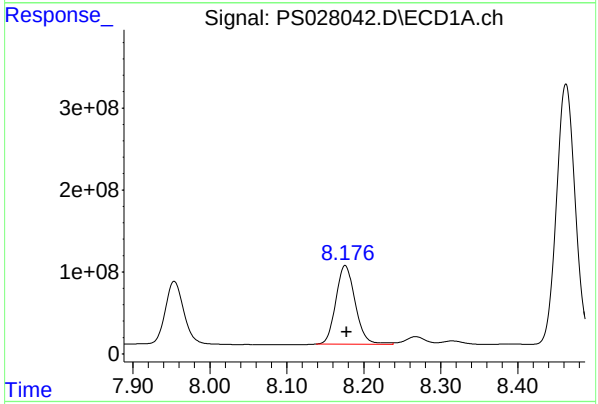
Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024



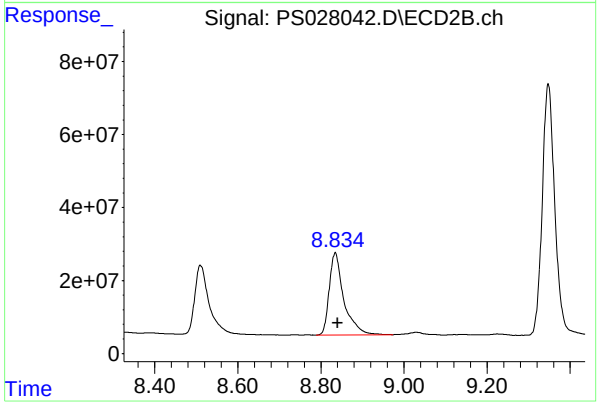
#8 DICHLORPROP

R.T.: 8.509 min
Delta R.T.: -0.004 min
Response: 447122298
Conc: 477.21 ng/ml



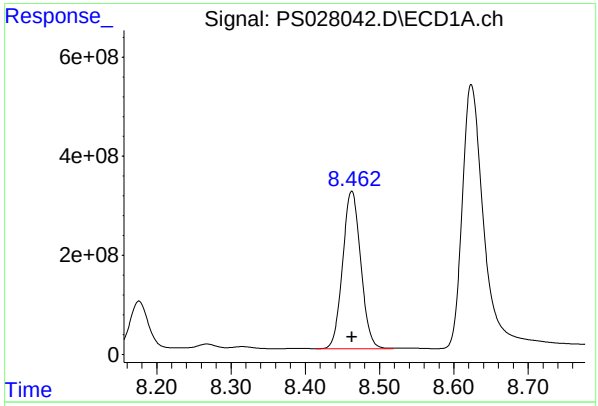
#9 2,4-D

R.T.: 8.176 min
Delta R.T.: -0.001 min
Response: 1660550674
Conc: 490.06 ng/ml



#9 2,4-D

R.T.: 8.835 min
Delta R.T.: -0.005 min
Response: 550337097
Conc: 551.91 ng/ml



#10 Pentachlorophenol

R.T.: 8.463 min
Delta R.T.: 0.000 min
Response: 5387155352
Conc: 136.14 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMS

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
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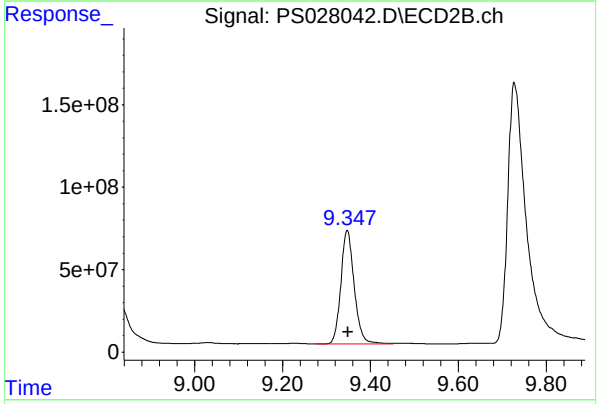
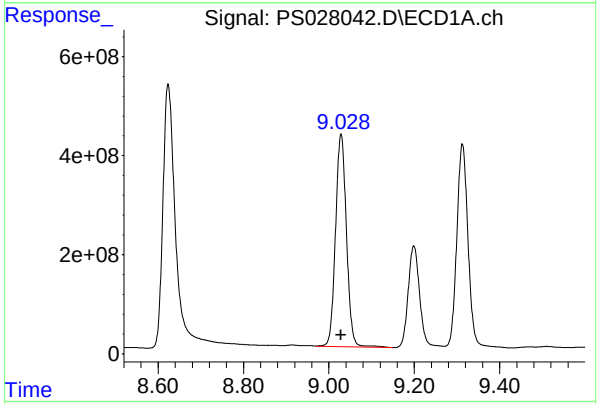


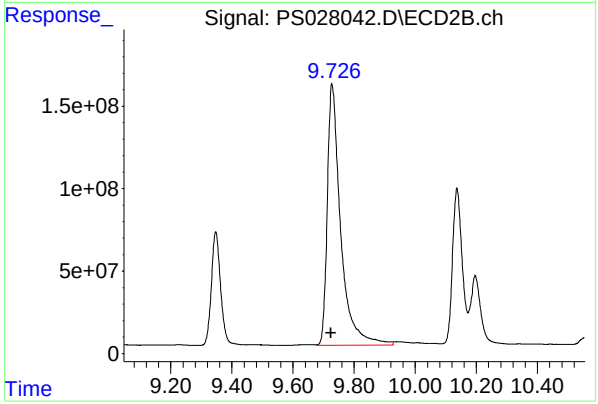
#10 Pentachlorophenol

R.T.: 9.347 min
Delta R.T.: -0.002 min
Response: 1448696039
Conc: 113.13 ng/ml



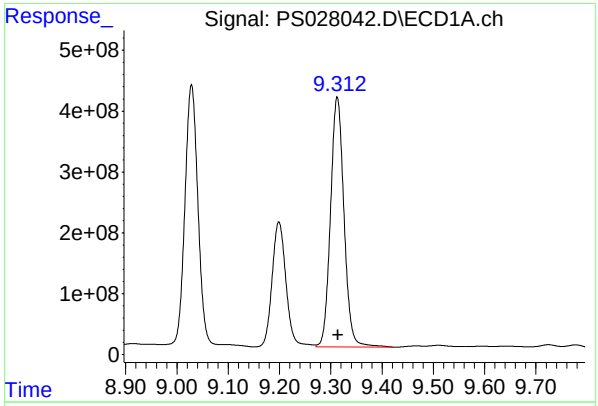
#11 2,4,5-TP (SILVEX)

R.T.: 9.028 min
Delta R.T.: 0.000 min
Response: 7631490456
Conc: 472.52 ng/ml



#11 2,4,5-TP (SILVEX)

R.T.: 9.727 min
Delta R.T.: 0.002 min
Response: 4822299876
Conc: 1056.45 ng/ml



#12 2,4,5-T

R.T.: 9.313 min
Delta R.T.: -0.001 min
Response: 7507806594
Conc: 449.39 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMS

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
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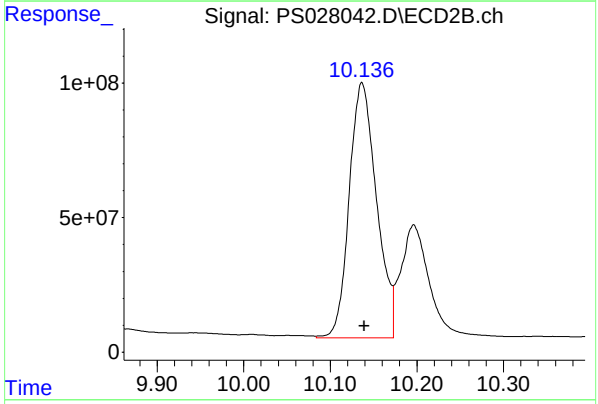
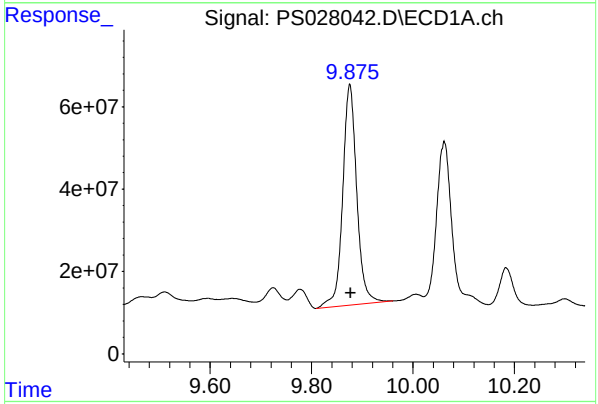


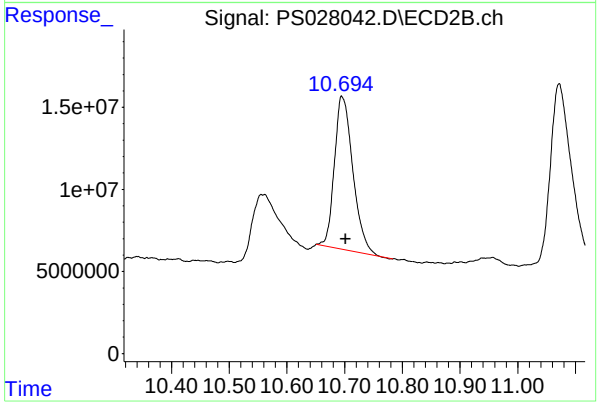
#12 2,4,5-T

R.T.: 10.137 min
Delta R.T.: -0.003 min
Response: 2074652269
Conc: 504.48 ng/ml



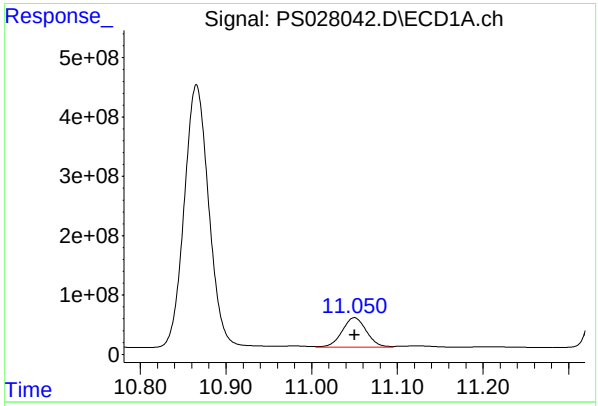
#13 2,4-DB

R.T.: 9.875 min
Delta R.T.: -0.002 min
Response: 1031383225
Conc: 391.72 ng/ml



#13 2,4-DB

R.T.: 10.695 min
Delta R.T.: -0.007 min
Response: 207254595
Conc: 405.79 ng/ml



#14 DINOSEB

R.T.: 11.050 min
Delta R.T.: 0.000 min
Response: 984327287
Conc: 89.43 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMS

Manual Integrations
APPROVED

Reviewed By :Abdul Mirza 10/25/2024
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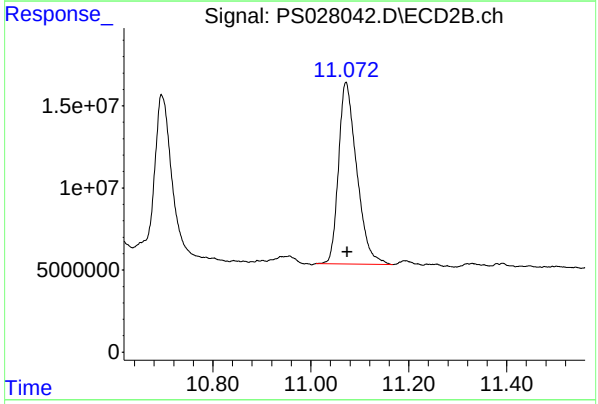
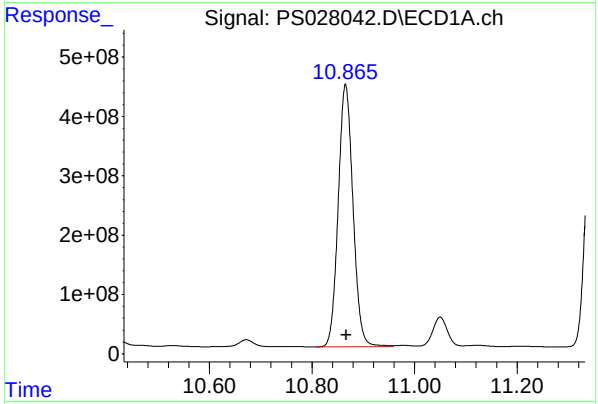


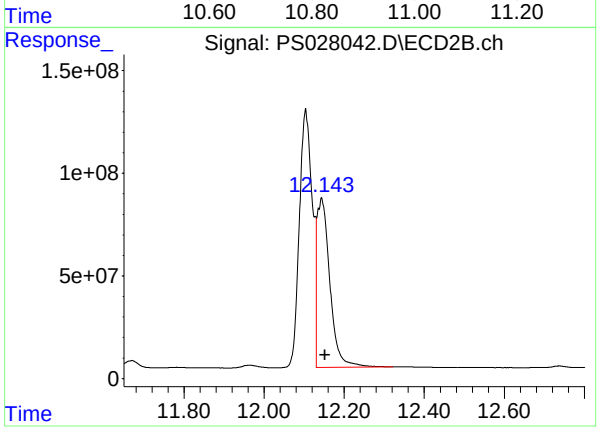
#14 DINOSEB

R.T.: 11.072 min
Delta R.T.: -0.003 min
Response: 285609823
Conc: 84.88 ng/ml



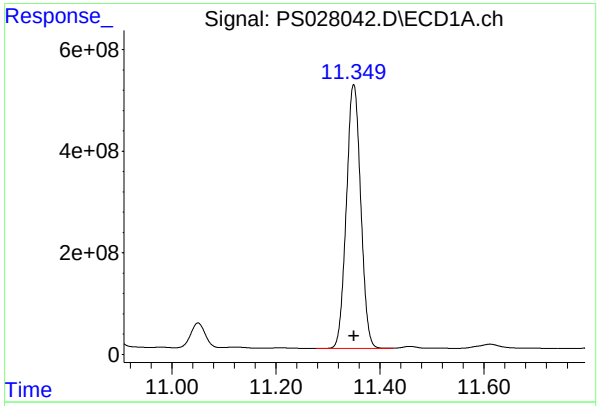
#15 Picloram

R.T.: 10.865 min
Delta R.T.: -0.002 min
Response: 8825037878
Conc: 396.36 ng/ml



#15 Picloram

R.T.: 12.144 min
Delta R.T.: -0.009 min
Response: 1858758028
Conc: 407.91 ng/ml



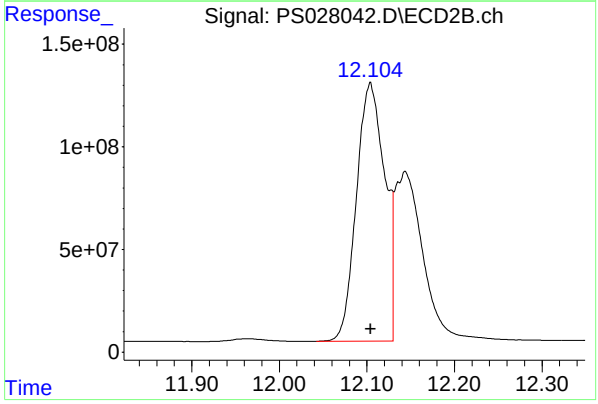
#16 DCPA

R.T.: 11.349 min
Delta R.T.: 0.000 min
Response: 9963960470
Conc: 538.93 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMS

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024



#16 DCPA

R.T.: 12.104 min
Delta R.T.: 0.000 min
Response: 2828854069
Conc: 609.51 ng/ml

Alliance TECHNICAL GROUP
284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Report of Analysis

Client:	Tetra Tech, EMI	Date Collected:	10/10/24
Project:	R36724	Date Received:	10/11/24
Client Sample ID:	WB-301-BOTMSD	SDG No.:	P4462
Lab Sample ID:	P4397-06MSD	Matrix:	TCLP
Analytical Method:	SW8151A	% Solid:	0 Decanted:
Sample Wt/Vol:	100 Units: mL	Final Vol:	10000 uL
Soil Aliquot Vol:	uL	Test:	TCLP Herbicide
Extraction Type:		Injection Volume :	
GPC Factor :	1.0 PH :		
Prep Method :	SW3510C		

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
PS028043.D	1	10/24/24 11:28	10/24/24 19:32	PB164378

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
94-75-7	2,4-D	56.6		4.90	20.0	ug/L
93-72-1	2,4,5-TP (Silvex)	113	P	4.50	20.0	ug/L
SURROGATES						
19719-28-9	2,4-DCAA	142	*	39 - 175	28%	SPK: 500

Comments:

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
P = Indicates >25% difference for detected concentrations between the two GC columns
Q = indicates LCS control criteria did not meet requirements
M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution
S = Indicates estimated value where valid five-point calibration was not performed prior to analyte detection in sample.
() = Laboratory InHouse Limit

Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028043.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 19:32
Operator : AR\AJ
Sample : P4397-06MSD
Misc :
ALS Vial : 12 Sample Multiplier: 1

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMSD

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:47:02 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm

	Compound	RT#1	RT#2	Resp#1	Resp#2	ng/ml	ng/ml
	System Monitoring Compounds						
4) S	2,4-DCAA	7.091	7.612	382.8E6	105.5E6	141.953m	111.164
	Target Compounds						
1) T	Dalapon	2.541	2.604	1470.9E6	630.1E6	322.816	369.479m
2) T	3,5-DICHL...	6.283	6.584	1107.8E6	381.1E6	279.962	284.899
5) T	DICAMBA	7.269	7.805	4448.1E6	1363.8E6	406.710	412.682
6) T	MCPP	7.446	7.908	321.1E6	91444977	43.785m	35.375
7) T	MCPA	7.591	8.146	399.4E6	167.7E6	37.666	36.431m
8) T	DICHLORPROP	7.954	8.510	1249.2E6	460.5E6	433.203	491.502
9) T	2,4-D	8.176	8.834	1666.1E6	564.5E6	491.685	566.078
10) T	Pentachlo...	8.462	9.346	5264.8E6	1426.2E6	133.043	111.367
11) T	2,4,5-TP ...	9.029	9.730	7670.8E6	5164.9E6	474.948	1131.497 #
12) T	2,4,5-T	9.312	10.137	7628.9E6	2075.6E6	456.643	504.712
13) T	2,4-DB	9.875	10.697	1025.3E6	217.2E6	389.413	425.240
14) T	DINOSEB	11.050	11.073	962.5E6	270.8E6	87.443	80.490
15) T	Picloram	10.866	12.144	8907.0E6	2232.6E6	400.039	489.957
16) T	DCPA	11.350	12.104	10107.5E6	2695.1E6	546.695	580.696

(f)=RT Delta > 1/2 Window (#)=Amounts differ by > 25% (m)=manual int.

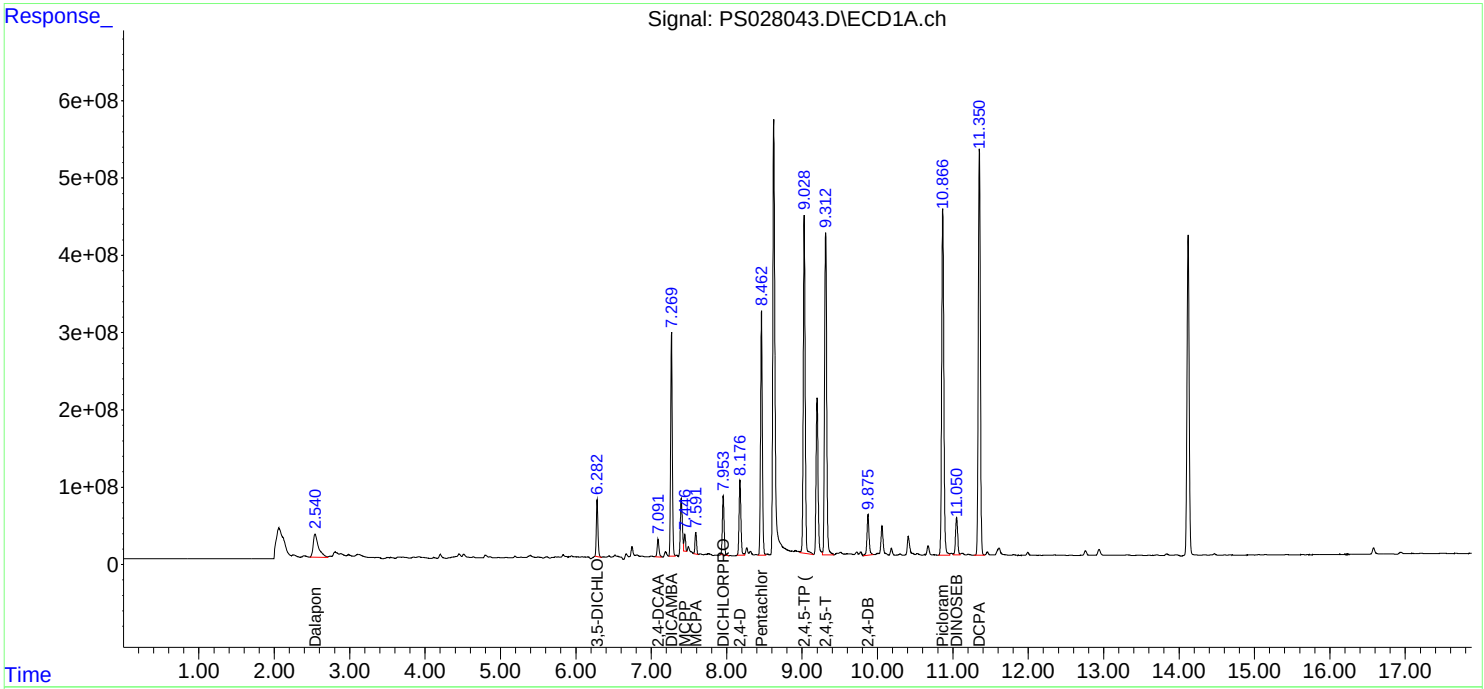
Data Path : Z:\pestpcbsrv\HPCHEM1\ECD_S\Data\PS102424\
Data File : PS028043.D
Signal(s) : Signal #1: ECD1A.ch Signal #2: ECD2B.ch
Acq On : 24 Oct 2024 19:32
Operator : AR\AJ
Sample : P4397-06MSD
Misc :
ALS Vial : 12 Sample Multiplier: 1

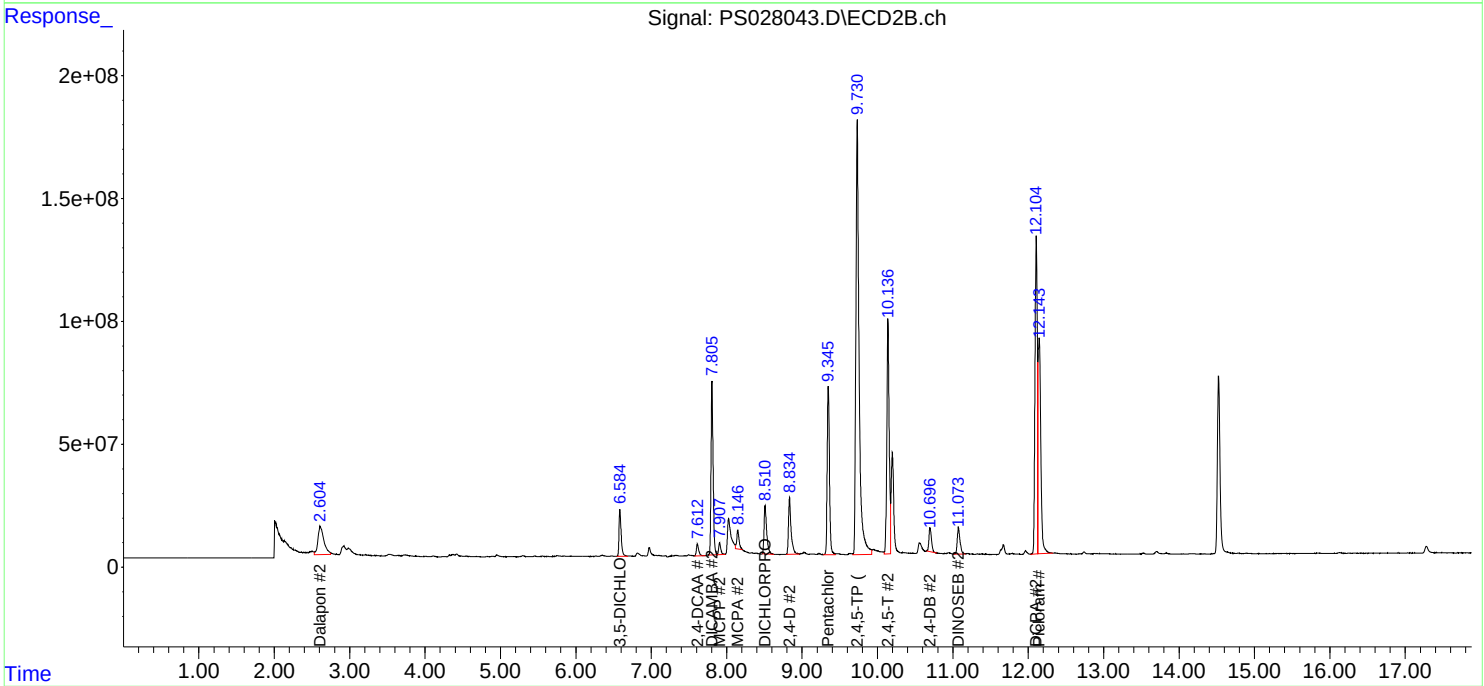
Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMSD

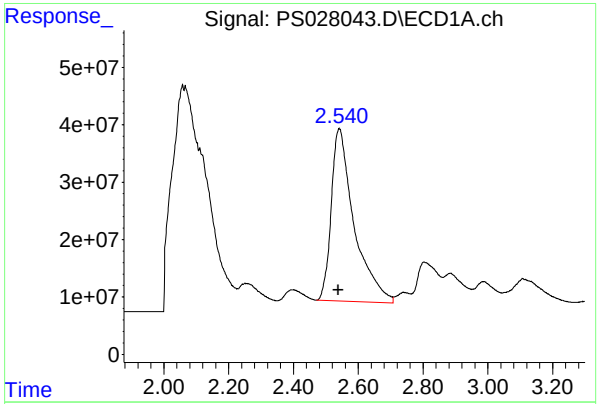
Manual Integrations APPROVED
Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024

Integration File signal 1: autoint1.e
Integration File signal 2: autoint2.e
Quant Time: Oct 25 02:47:02 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\ECD_S\Method\PS102324.M
Quant Title : 8080.M
QLast Update : Wed Oct 23 13:25:49 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal #1 Phase : ZB-MR1 Signal #2 Phase: ZB-MR2
Signal #1 Info : 30M x 0.32mm x0.5 Signal #2 Info : 30M x 0.32mm x 0.25µm







#1 Dalapon

R.T.: 2.541 min
Delta R.T.: 0.003 mi
Response: 1470883647
Conc: 322.82 ng/m

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMSD

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
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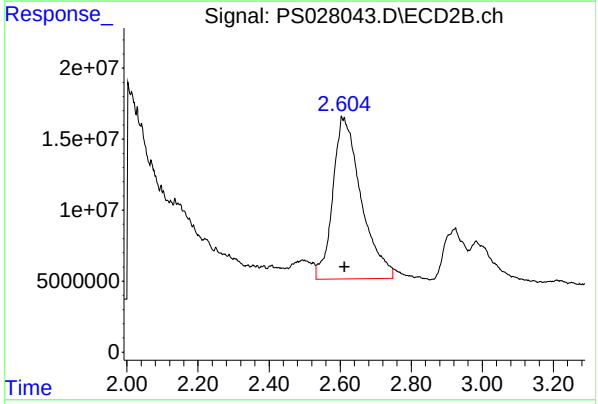
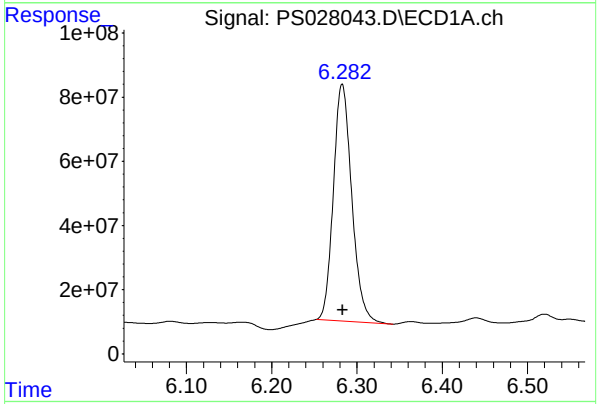


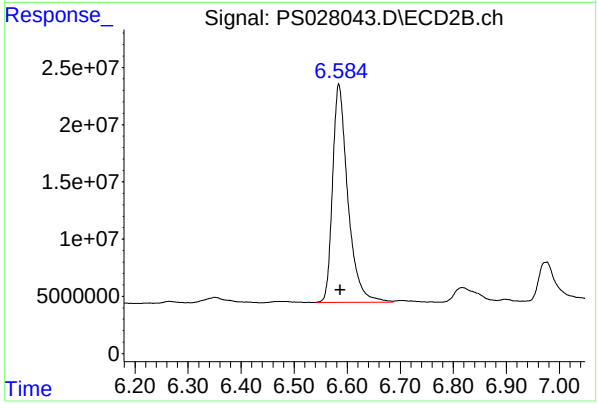
#1 Dalapon

R.T.: 2.604 min
Delta R.T.: -0.009 min
Response: 630116393
Conc: 369.48 ng/ml m



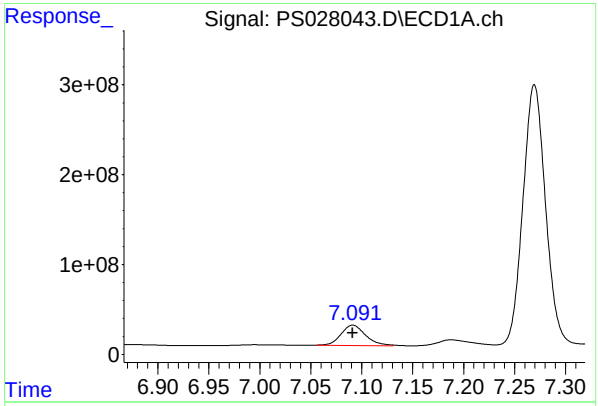
#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.283 min
Delta R.T.: 0.000 min
Response: 1107814297
Conc: 279.96 ng/ml



#2 3,5-DICHLOROBENZOIC ACID

R.T.: 6.584 min
Delta R.T.: -0.003 min
Response: 381053911
Conc: 284.90 ng/ml



#4 2,4-DCAA

R.T.: 7.091 min
Delta R.T.: 0.000 min
Response: 382841863
Conc: 141.95 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMSD

Manual Integrations
APPROVED

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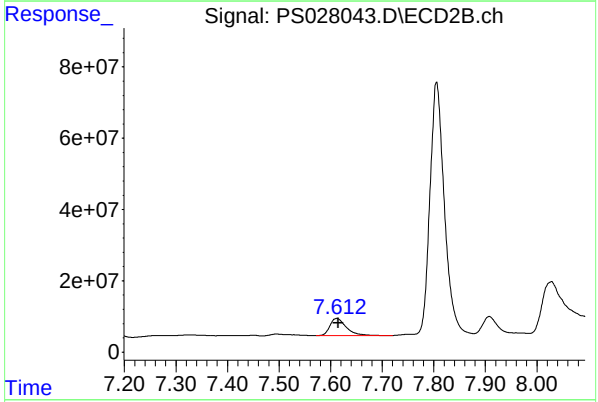
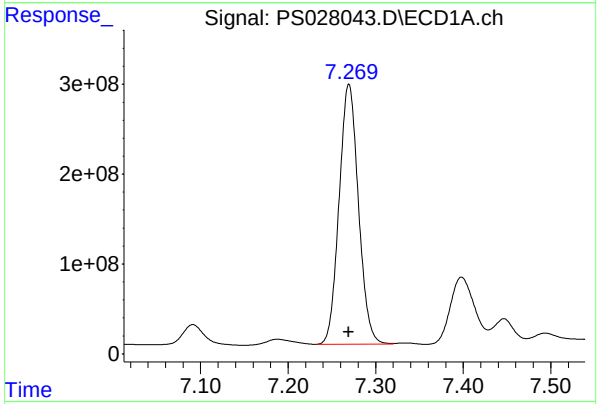


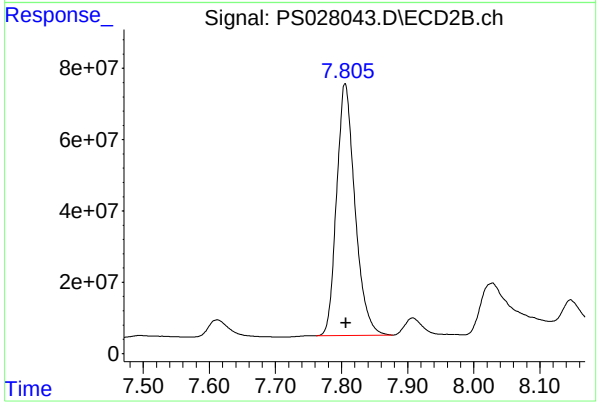
#4 2,4-DCAA

R.T.: 7.612 min
Delta R.T.: -0.002 min
Response: 105458547
Conc: 111.16 ng/ml



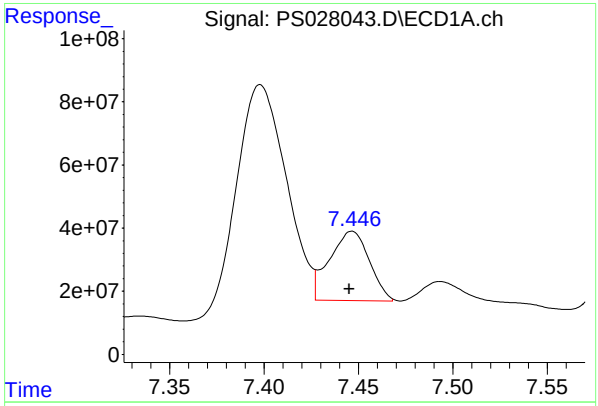
#5 DICAMBA

R.T.: 7.269 min
Delta R.T.: 0.000 min
Response: 4448122153
Conc: 406.71 ng/ml



#5 DICAMBA

R.T.: 7.805 min
Delta R.T.: -0.001 min
Response: 1363779008
Conc: 412.68 ng/ml



#6 MCPP

R.T.: 7.446 min
Delta R.T.: 0.001 mi
Response: 321052821
Conc: 43.78 ug/m

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMSD

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
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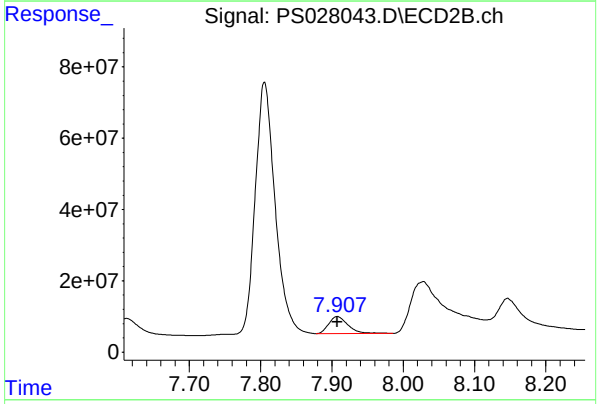
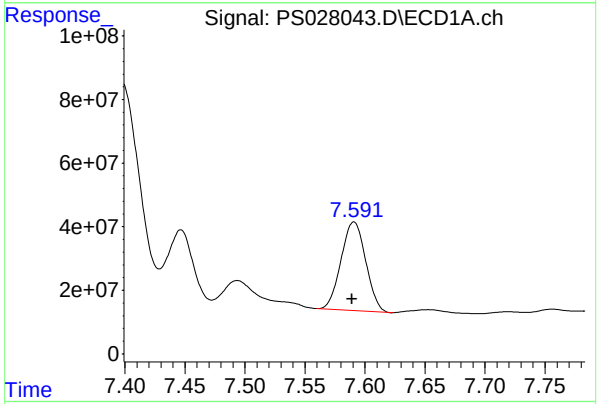


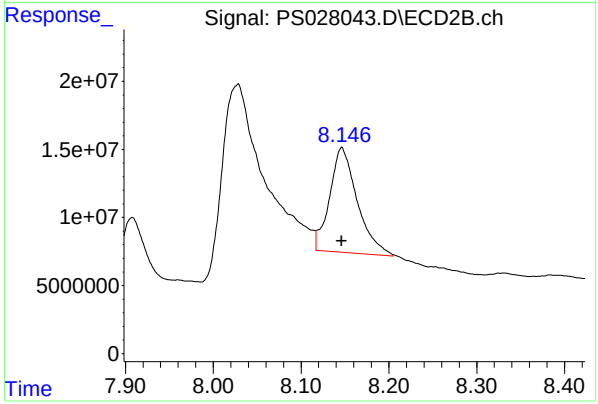
#6 MCPP

R.T.: 7.908 min
Delta R.T.: 0.000 min
Response: 91444977
Conc: 35.37 ug/ml



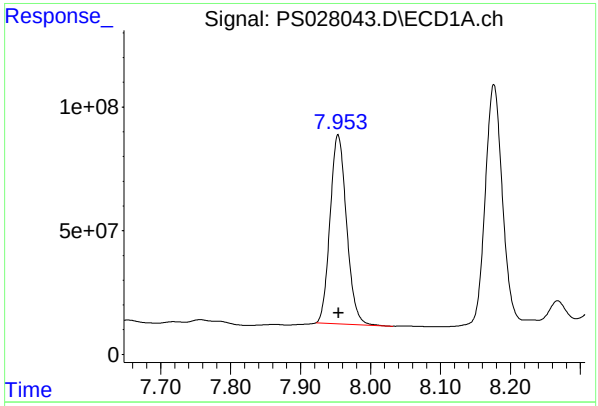
#7 MCPA

R.T.: 7.591 min
Delta R.T.: 0.002 min
Response: 399401785
Conc: 37.67 ug/ml



#7 MCPA

R.T.: 8.146 min
Delta R.T.: 0.000 min
Response: 167650653
Conc: 36.43 ug/ml m



#8 DICHLORPROP

R.T.: 7.954 min
Delta R.T.: -0.001 min
Response: 1249222319
Conc: 433.20 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMSD

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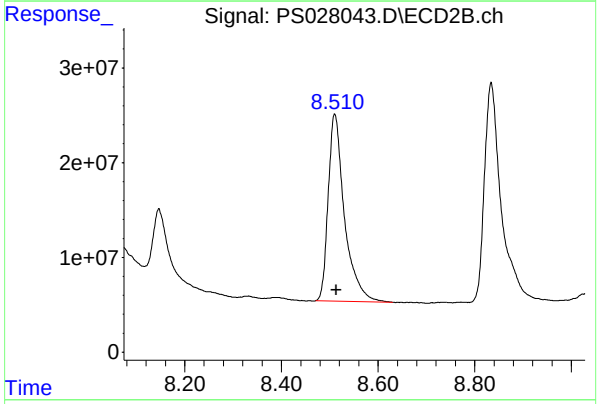
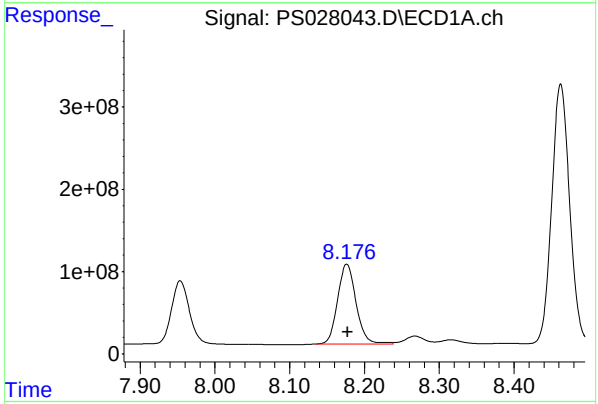


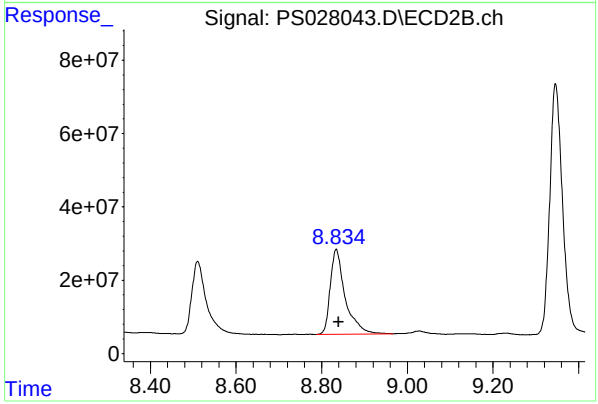
#8 DICHLORPROP

R.T.: 8.510 min
Delta R.T.: -0.003 min
Response: 460513870
Conc: 491.50 ng/ml



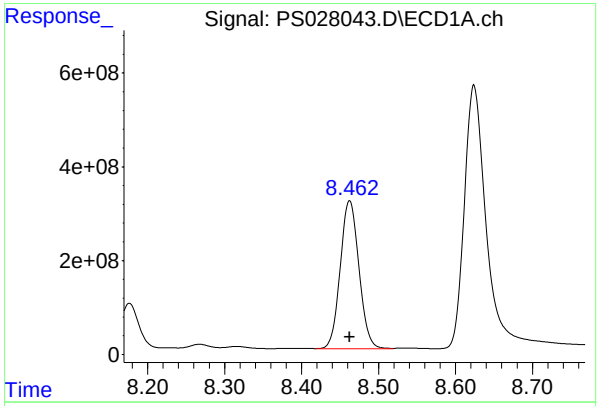
#9 2,4-D

R.T.: 8.176 min
Delta R.T.: -0.001 min
Response: 1666067666
Conc: 491.68 ng/ml



#9 2,4-D

R.T.: 8.834 min
Delta R.T.: -0.006 min
Response: 564461508
Conc: 566.08 ng/ml



#10 Pentachlorophenol

R.T.: 8.462 min
Delta R.T.: 0.000 min
Response: 5264771616
Conc: 133.04 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMSD

Manual Integrations APPROVED

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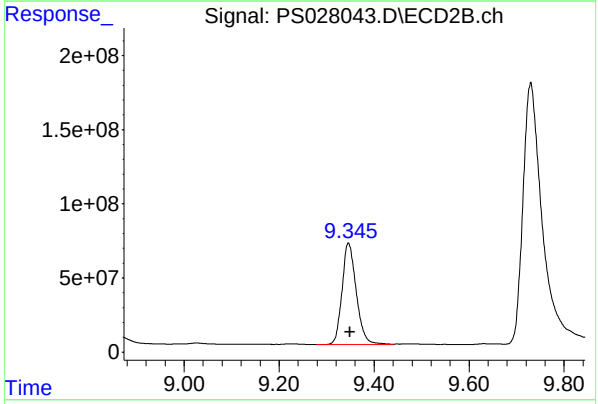
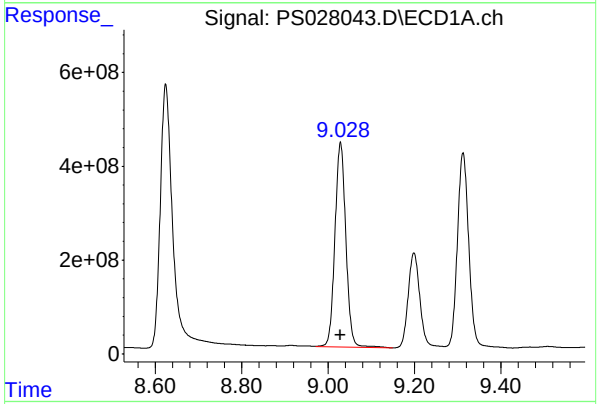


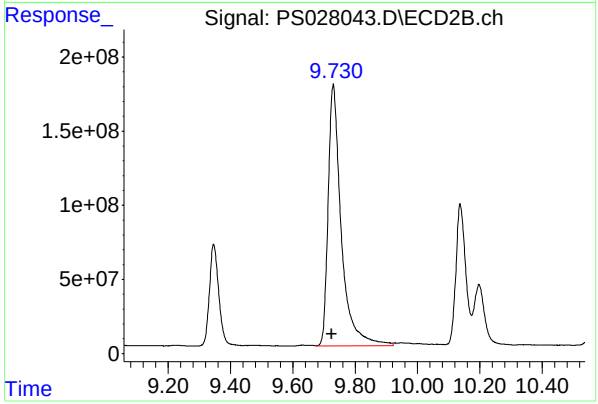
#10 Pentachlorophenol

R.T.: 9.346 min
Delta R.T.: -0.003 min
Response: 1426172918
Conc: 111.37 ng/ml



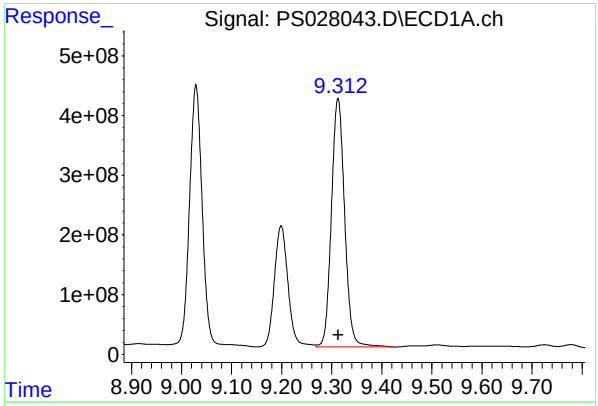
#11 2,4,5-TP (SILVEX)

R.T.: 9.029 min
Delta R.T.: 0.000 min
Response: 7670777325
Conc: 474.95 ng/ml



#11 2,4,5-TP (SILVEX)

R.T.: 9.730 min
Delta R.T.: 0.005 min
Response: 5164867014
Conc: 1131.50 ng/ml



#12 2,4,5-T

R.T.: 9.312 min
Delta R.T.: -0.001 min
Response: 7628914760
Conc: 456.64 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMSD

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
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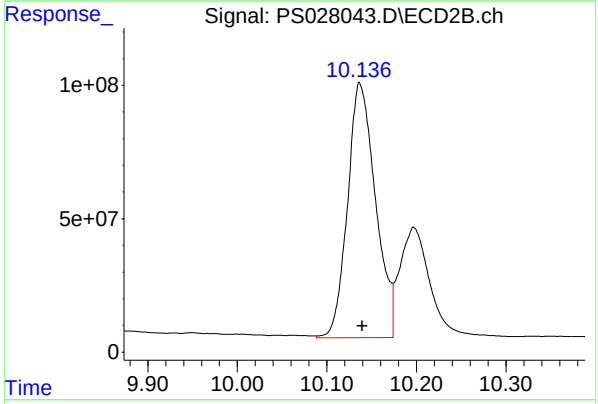
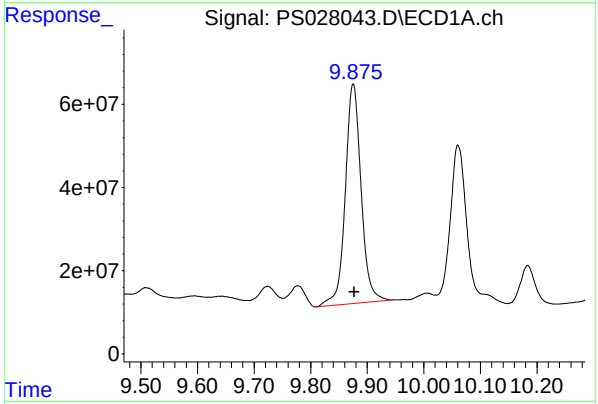


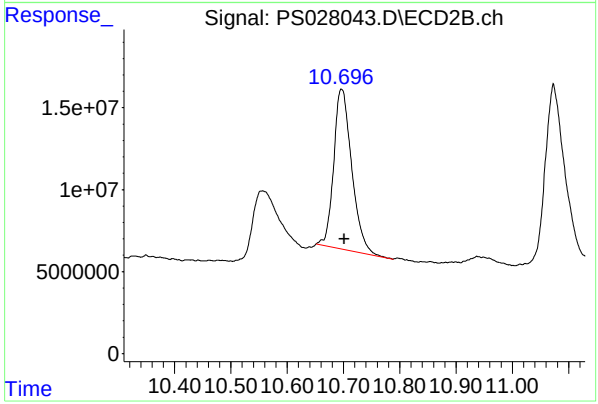
#12 2,4,5-T

R.T.: 10.137 min
Delta R.T.: -0.003 min
Response: 2075597139
Conc: 504.71 ng/ml



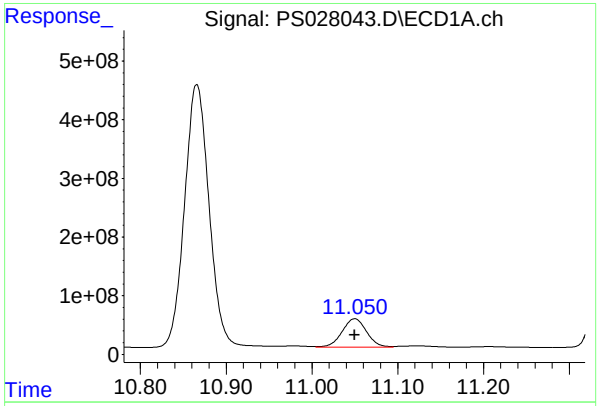
#13 2,4-DB

R.T.: 9.875 min
Delta R.T.: -0.002 min
Response: 1025297552
Conc: 389.41 ng/ml



#13 2,4-DB

R.T.: 10.697 min
Delta R.T.: -0.005 min
Response: 217189182
Conc: 425.24 ng/ml



#14 DINOSEB

R.T.: 11.050 min
Delta R.T.: 0.000 min
Response: 962464370
Conc: 87.44 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMSD

Manual Integrations
APPROVED

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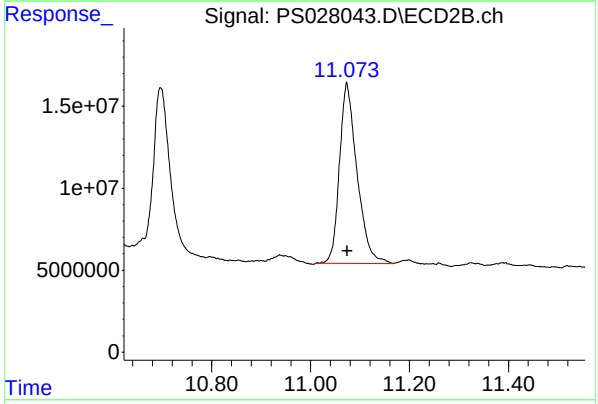
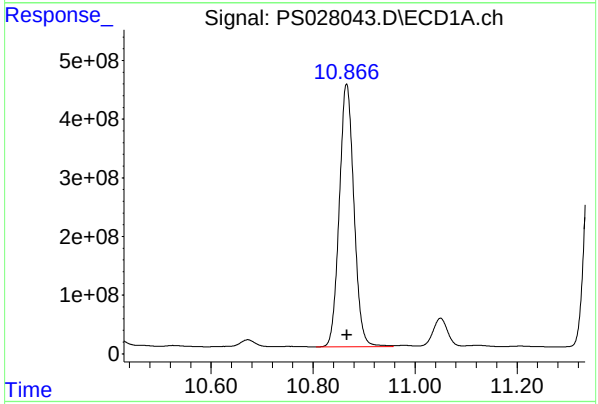


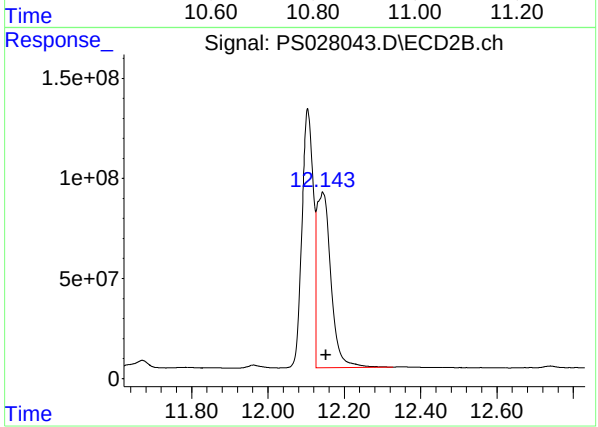
#14 DINOSEB

R.T.: 11.073 min
Delta R.T.: -0.002 min
Response: 270831861
Conc: 80.49 ng/ml



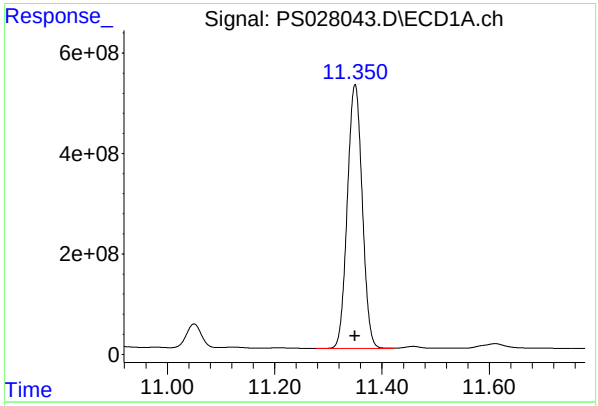
#15 Picloram

R.T.: 10.866 min
Delta R.T.: -0.001 min
Response: 8907020297
Conc: 400.04 ng/ml



#15 Picloram

R.T.: 12.144 min
Delta R.T.: -0.009 min
Response: 2232633890
Conc: 489.96 ng/ml



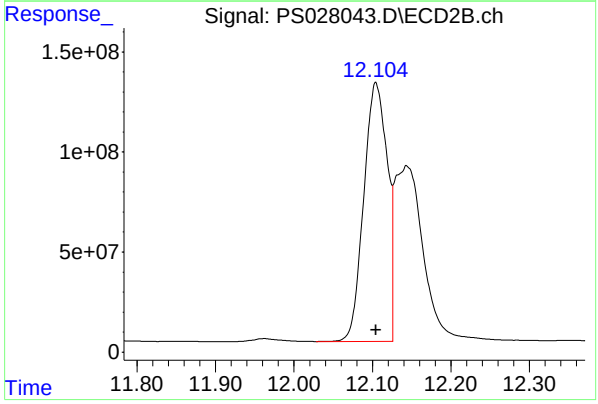
#16 DCPA

R.T.: 11.350 min
Delta R.T.: 0.000 min
Response: 10107519978
Conc: 546.69 ng/ml

Instrument :
ECD_S
ClientSampleId :
WB-301-BOTMSD

Manual Integrations APPROVED

Reviewed By :Abdul Mirza 10/25/2024
Supervised By :Ankita Jodhani 10/28/2024



#16 DCPA

R.T.: 12.104 min
Delta R.T.: 0.000 min
Response: 2695100462
Conc: 580.70 ng/ml

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900, Fax : 908 789 8922

Manual Integration Report

Sequence:	PS102324	Instrument	ECD_s

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
HSTDICC200	PS028008.D	MCPA #2	Abdul	10/24/2024 2:21:48 PM	Ankita	10/24/2024 2:24:57	Peak Integrated by Software
HSTDICC1000	PS028011.D	2,4-DCAA	Abdul	10/24/2024 2:21:51 PM	Ankita	10/24/2024 2:24:58	Peak Integrated by Software
HSTDCCC750	PS028015.D	Dalapon #2	Abdul	10/24/2024 2:21:55 PM	Ankita	10/24/2024 2:25:00	Peak Integrated by Software
HSTDCCC750	PS028024.D	Picloram #2	Abdul	10/24/2024 2:22:11 PM	Ankita	10/24/2024 2:25:11	Peak Integrated by Software

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Manual Integration Report

Sequence:	PS102424	Instrument	ECD_s

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
I.BLK	PS028031.D	2,4-DCAA	Abdul	10/25/2024 3:27:05 PM	Ankita	10/28/2024 9:12:15	Peak Integrated by Software
I.BLK	PS028035.D	2,4-DCAA	Abdul	10/25/2024 3:27:09 PM	Ankita	10/28/2024 9:12:17	Peak Integrated by Software
PB164378BL	PS028037.D	2,4-DCAA	Abdul	10/25/2024 3:27:12 PM	Ankita	10/28/2024 9:12:19	Peak Integrated by Software
PB164336TB	PS028040.D	2,4-DCAA #2	Abdul	10/25/2024 3:27:15 PM	Ankita	10/28/2024 9:12:20	Peak Integrated by Software
P4397-06MS	PS028042.D	2,4-DCAA	Abdul	10/25/2024 3:27:21 PM	Ankita	10/28/2024 9:12:23	Peak Integrated by Software
P4397-06MS	PS028042.D	Dalapon #2	Abdul	10/25/2024 3:27:21 PM	Ankita	10/28/2024 9:12:23	Peak Integrated by Software
P4397-06MS	PS028042.D	MCPA #2	Abdul	10/25/2024 3:27:21 PM	Ankita	10/28/2024 9:12:23	Peak Integrated by Software
P4397-06MS	PS028042.D	MCPP	Abdul	10/25/2024 3:27:21 PM	Ankita	10/28/2024 9:12:23	Peak Integrated by Software
P4397-06MSD	PS028043.D	2,4-DCAA	Abdul	10/25/2024 3:27:24 PM	Ankita	10/28/2024 9:12:26	Peak Integrated by Software
P4397-06MSD	PS028043.D	Dalapon #2	Abdul	10/25/2024 3:27:24 PM	Ankita	10/28/2024 9:12:26	Peak Integrated by Software
P4397-06MSD	PS028043.D	MCPA #2	Abdul	10/25/2024 3:27:24 PM	Ankita	10/28/2024 9:12:26	Peak Integrated by Software
P4397-06MSD	PS028043.D	MCPP	Abdul	10/25/2024 3:27:24 PM	Ankita	10/28/2024 9:12:26	Peak Integrated by Software
I.BLK	PS028046.D	2,4-DCAA	Abdul	10/25/2024 3:27:33 PM	Ankita	10/28/2024 9:12:29	Peak Integrated by Software

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Manual Integration Report

Sequence:	PS102424	Instrument	ECD_s

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900, Fax : 908 789 8922

Manual Integration Report

Sequence:	PS102824	Instrument	ECD_s

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
I.BLK	PS028071.D	2,4-DCAA	Abdul	10/29/2024 8:52:10 AM	Ankita	10/29/2024 8:52:39	Peak Integrated by Software
HSTDCCC750	PS028072.D	MCPP #2	Abdul	10/29/2024 8:52:11 AM	Ankita	10/29/2024 8:52:40	Peak Integrated by Software
PB164261TB	PS028073.D	2,4-DCAA	Abdul	10/29/2024 8:52:14 AM	Ankita	10/29/2024 8:52:41	Peak Integrated by Software
PB164336TB	PS028074.D	2,4-DCAA	Abdul	10/29/2024 8:52:15 AM	Ankita	10/29/2024 8:52:43	Peak Integrated by Software

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Instrument ID: ECD_S

Daily Analysis Runlog For Sequence/QCBatch ID # PS102324

Review By	Abdul	Review On	10/24/2024 2:22:53 PM		
Supervise By	Ankita	Supervise On	10/24/2024 2:25:32 PM		
SubDirectory	PS102324	HP Acquire Method		HP Processing Method	ps102324 8151

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	P23457,PP23458,PP23459,PP23460,PP23461,PP23462,PP23467,PP23468,PP23469
CCC	PP23462
Internal Standard/PEM	
ICV/I.BLK	PP23469
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	HEXANE	PS028006.D	23 Oct 2024 10:40	AR\AJ	Ok
2	I.BLK	PS028007.D	23 Oct 2024 11:04	AR\AJ	Ok
3	HSTDICC200	PS028008.D	23 Oct 2024 11:28	AR\AJ	Ok,M
4	HSTDICC500	PS028009.D	23 Oct 2024 11:52	AR\AJ	Ok
5	HSTDICC750	PS028010.D	23 Oct 2024 12:16	AR\AJ	Ok
6	HSTDICC1000	PS028011.D	23 Oct 2024 12:40	AR\AJ	Ok,M
7	HSTDICC1500	PS028012.D	23 Oct 2024 13:04	AR\AJ	Ok
8	HSTDICV750	PS028013.D	23 Oct 2024 13:28	AR\AJ	Ok
9	I.BLK	PS028014.D	23 Oct 2024 14:14	AR\AJ	Ok
10	HSTDCCC750	PS028015.D	23 Oct 2024 14:38	AR\AJ	Ok,M
11	P4443-01	PS028016.D	23 Oct 2024 15:02	AR\AJ	Ok,M
12	P4443-06	PS028017.D	23 Oct 2024 15:26	AR\AJ	Ok,M
13	P4458-01	PS028018.D	23 Oct 2024 15:49	AR\AJ	Ok,M
14	P4458-01MS	PS028019.D	23 Oct 2024 16:13	AR\AJ	Ok,M
15	P4458-01MSD	PS028020.D	23 Oct 2024 16:37	AR\AJ	Ok,M
16	PB174307BL	PS028021.D	23 Oct 2024 17:01	AR\AJ	Ok,M
17	PB174307BS	PS028022.D	23 Oct 2024 17:25	AR\AJ	Ok
18	I.BLK	PS028023.D	23 Oct 2024 18:14	AR\AJ	Ok
19	HSTDCCC750	PS028024.D	23 Oct 2024 18:38	AR\AJ	Ok,M
20	P4468-03	PS028025.D	23 Oct 2024 19:02	AR\AJ	Ok,M
21	P4468-05	PS028026.D	23 Oct 2024 19:26	AR\AJ	Ok

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Fax : 908 789 8922

Instrument ID: ECD_S

Daily Analysis Runlog For Sequence/QCBatch ID # PS102324

Review By	Abdul	Review On	10/24/2024 2:22:53 PM		
Supervise By	Ankita	Supervise On	10/24/2024 2:25:32 PM		
SubDirectory	PS102324	HP Acquire Method		HP Processing Method	ps102324 8151

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	P23457,PP23458,PP23459,PP23460,PP23461,PP23462,PP23467,PP23468,PP23469
CCC	PP23462
Internal Standard/PEM	
ICV/I.BLK	PP23469
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

22	P4467-01	PS028027.D	23 Oct 2024 19:50	AR\AJ	Ok
23	I.BLK	PS028028.D	24 Oct 2024 01:27	AR\AJ	Ok
24	HSTDCCC750	PS028029.D	24 Oct 2024 01:51	AR\AJ	Ok

M : Manual Integration

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Instrument ID: ECD_S

Daily Analysis Runlog For Sequence/QCBatch ID # PS102424

Review By	Abdul	Review On	10/25/2024 3:28:01 PM		
Supervise By	Ankita	Supervise On	10/28/2024 9:12:45 AM		
SubDirectory	PS102424	HP Acquire Method		HP Processing Method	ps102324 8151

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	P23457,PP23458,PP23459,PP23460,PP23461,PP23462,PP23467,PP23468,PP23469
CCC	PP23462
Internal Standard/PEM	
ICV/I.BLK	PP23469
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	HEXANE	PS028030.D	24 Oct 2024 09:02	AR\AJ	Ok
2	I.BLK	PS028031.D	24 Oct 2024 09:26	AR\AJ	Ok,M
3	HSTDCCC750	PS028032.D	24 Oct 2024 09:50	AR\AJ	Ok
4	P4472-01	PS028033.D	24 Oct 2024 10:13	AR\AJ	Ok
5	P4472-05	PS028034.D	24 Oct 2024 10:37	AR\AJ	Ok
6	I.BLK	PS028035.D	24 Oct 2024 11:01	AR\AJ	Ok,M
7	HSTDCCC750	PS028036.D	24 Oct 2024 11:25	AR\AJ	Ok
8	PB164378BL	PS028037.D	24 Oct 2024 17:09	AR\AJ	Ok,M
9	PB164378BS	PS028038.D	24 Oct 2024 17:33	AR\AJ	Ok
10	PB164261TB	PS028039.D	24 Oct 2024 17:57	AR\AJ	Not Ok
11	PB164336TB	PS028040.D	24 Oct 2024 18:21	AR\AJ	Not Ok
12	P4397-06	PS028041.D	24 Oct 2024 18:45	AR\AJ	Ok,M
13	P4397-06MS	PS028042.D	24 Oct 2024 19:09	AR\AJ	Ok,M
14	P4397-06MSD	PS028043.D	24 Oct 2024 19:32	AR\AJ	Ok,M
15	P4460-04	PS028044.D	24 Oct 2024 19:56	AR\AJ	Not Ok
16	P4462-02	PS028045.D	24 Oct 2024 20:20	AR\AJ	Ok
17	I.BLK	PS028046.D	24 Oct 2024 20:44	AR\AJ	Ok,M
18	HSTDCCC750	PS028047.D	24 Oct 2024 21:08	AR\AJ	Ok

M : Manual Integration

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Instrument ID: ECD_S

Daily Analysis Runlog For Sequence/QCBatch ID # PS102824

Review By	Abdul	Review On	10/29/2024 8:52:20 AM		
Supervise By	Ankita	Supervise On	10/29/2024 8:52:48 AM		
SubDirectory	PS102824	HP Acquire Method		HP Processing Method	ps102324 8151

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	P23457,PP23458,PP23459,PP23460,PP23461,PP23462,PP23467,PP23468,PP23469
CCC	PP23462
Internal Standard/PEM	
ICV/I.BLK	PP23469
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	HEXANE	PS028070.D	28 Oct 2024 09:44	AR\AJ	Ok
2	I.BLK	PS028071.D	28 Oct 2024 10:08	AR\AJ	Ok,M
3	HSTDCCC750	PS028072.D	28 Oct 2024 10:32	AR\AJ	Ok,M
4	PB164261TB	PS028073.D	28 Oct 2024 13:11	AR\AJ	Ok,M
5	PB164336TB	PS028074.D	28 Oct 2024 13:35	AR\AJ	Ok,M
6	I.BLK	PS028075.D	28 Oct 2024 13:59	AR\AJ	Ok
7	HSTDCCC750	PS028076.D	28 Oct 2024 17:17	AR\AJ	Ok

M : Manual Integration

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Instrument ID: ECD_S

Daily Analysis Runlog For Sequence/QCBatch ID # PS102324

Review By	Abdul	Review On	10/24/2024 2:22:53 PM		
Supervise By	Ankita	Supervise On	10/24/2024 2:25:32 PM		
SubDirectory	PS102324	HP Acquire Method		HP Processing Method	ps102324 8151

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	P23457,PP23458,PP23459,PP23460,PP23461,PP23462,PP23467,PP23468,PP23469
CCC	PP23462
Internal Standard/PEM	
ICV/I.BLK	PP23469
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	HEXANE	HEXANE	PS028006.D	23 Oct 2024 10:40		AR\AJ	Ok
2	I.BLK	I.BLK	PS028007.D	23 Oct 2024 11:04		AR\AJ	Ok
3	HSTDICC200	HSTDICC200	PS028008.D	23 Oct 2024 11:28		AR\AJ	Ok,M
4	HSTDICC500	HSTDICC500	PS028009.D	23 Oct 2024 11:52		AR\AJ	Ok
5	HSTDICC750	HSTDICC750	PS028010.D	23 Oct 2024 12:16		AR\AJ	Ok
6	HSTDICC1000	HSTDICC1000	PS028011.D	23 Oct 2024 12:40		AR\AJ	Ok,M
7	HSTDICC1500	HSTDICC1500	PS028012.D	23 Oct 2024 13:04		AR\AJ	Ok
8	HSTDICV750	ICVPS102324	PS028013.D	23 Oct 2024 13:28		AR\AJ	Ok
9	I.BLK	I.BLK	PS028014.D	23 Oct 2024 14:14		AR\AJ	Ok
10	HSTDCCC750	HSTDCCC750	PS028015.D	23 Oct 2024 14:38		AR\AJ	Ok,M
11	P4443-01	OG-315-HR-502-COMF	PS028016.D	23 Oct 2024 15:02		AR\AJ	Ok,M
12	P4443-06	OG-315-HR-502-COMF	PS028017.D	23 Oct 2024 15:26		AR\AJ	Ok,M
13	P4458-01	280517	PS028018.D	23 Oct 2024 15:49		AR\AJ	Ok,M
14	P4458-01MS	280517MS	PS028019.D	23 Oct 2024 16:13	Some compound recovery fail	AR\AJ	Ok,M
15	P4458-01MSD	280517MSD	PS028020.D	23 Oct 2024 16:37	Some compound recovery fail , RPD is high in MCPA	AR\AJ	Ok,M
16	PB174307BL	PB174307BL	PS028021.D	23 Oct 2024 17:01	Typo PB164307BL	AR\AJ	Ok,M
17	PB174307BS	PB174307BS	PS028022.D	23 Oct 2024 17:25	Typo PB164307BS	AR\AJ	Ok

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Fax : 908 789 8922

Instrument ID: ECD_S

Daily Analysis Runlog For Sequence/QCBatch ID # PS102324

Review By	Abdul	Review On	10/24/2024 2:22:53 PM		
Supervise By	Ankita	Supervise On	10/24/2024 2:25:32 PM		
SubDirectory	PS102324	HP Acquire Method		HP Processing Method	ps102324 8151

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	P23457,PP23458,PP23459,PP23460,PP23461,PP23462,PP23467,PP23468,PP23469
CCC	PP23462
Internal Standard/PEM	
ICV/I.BLK	PP23469
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

18	I.BLK	I.BLK	PS028023.D	23 Oct 2024 18:14		AR\AJ	Ok
19	HSTDCCC750	HSTDCCC750	PS028024.D	23 Oct 2024 18:38		AR\AJ	Ok,M
20	P4468-03	ETGI-329	PS028025.D	23 Oct 2024 19:02		AR\AJ	Ok,M
21	P4468-05	ETGI-345	PS028026.D	23 Oct 2024 19:26		AR\AJ	Ok
22	P4467-01	TP-1	PS028027.D	23 Oct 2024 19:50		AR\AJ	Ok
23	I.BLK	I.BLK	PS028028.D	24 Oct 2024 01:27		AR\AJ	Ok
24	HSTDCCC750	HSTDCCC750	PS028029.D	24 Oct 2024 01:51		AR\AJ	Ok

M : Manual Integration

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Instrument ID: ECD_S

Daily Analysis Runlog For Sequence/QCBatch ID # PS102424

Review By	Abdul	Review On	10/25/2024 3:28:01 PM		
Supervise By	Ankita	Supervise On	10/28/2024 9:12:45 AM		
SubDirectory	PS102424	HP Acquire Method		HP Processing Method	ps102324 8151

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	P23457,PP23458,PP23459,PP23460,PP23461,PP23462,PP23467,PP23468,PP23469
CCC	PP23462
Internal Standard/PEM	
ICV/I.BLK	PP23469
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	HEXANE	HEXANE	PS028030.D	24 Oct 2024 09:02		AR\AJ	Ok
2	I.BLK	I.BLK	PS028031.D	24 Oct 2024 09:26		AR\AJ	Ok,M
3	HSTDCCC750	HSTDCCC750	PS028032.D	24 Oct 2024 09:50		AR\AJ	Ok
4	P4472-01	BP-F-28	PS028033.D	24 Oct 2024 10:13		AR\AJ	Ok
5	P4472-05	BP-F-6	PS028034.D	24 Oct 2024 10:37		AR\AJ	Ok
6	I.BLK	I.BLK	PS028035.D	24 Oct 2024 11:01		AR\AJ	Ok,M
7	HSTDCCC750	HSTDCCC750	PS028036.D	24 Oct 2024 11:25		AR\AJ	Ok
8	PB164378BL	PB164378BL	PS028037.D	24 Oct 2024 17:09		AR\AJ	Ok,M
9	PB164378BS	PB164378BS	PS028038.D	24 Oct 2024 17:33		AR\AJ	Ok
10	PB164261TB	PB164261TB	PS028039.D	24 Oct 2024 17:57	surrogate fail in 2nd column	AR\AJ	Not Ok
11	PB164336TB	PB164336TB	PS028040.D	24 Oct 2024 18:21	surrogate fail in 2nd column	AR\AJ	Not Ok
12	P4397-06	WB-301-BOT	PS028041.D	24 Oct 2024 18:45	both surrogate fail confirms with ms/msd	AR\AJ	Ok,M
13	P4397-06MS	WB-301-BOTMS	PS028042.D	24 Oct 2024 19:09	both surrogate fail , some comp recovery fails	AR\AJ	Ok,M
14	P4397-06MSD	WB-301-BOTMSD	PS028043.D	24 Oct 2024 19:32	both surrogate fail , some comp recovery fails	AR\AJ	Ok,M
15	P4460-04	WB-303-BOT	PS028044.D	24 Oct 2024 19:56	both Surrogate Fail	AR\AJ	Not Ok
16	P4462-02	C0AL2	PS028045.D	24 Oct 2024 20:20		AR\AJ	Ok
17	I.BLK	I.BLK	PS028046.D	24 Oct 2024 20:44		AR\AJ	Ok,M

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Fax : 908 789 8922

Instrument ID: ECD_S

Daily Analysis Runlog For Sequence/QCBatch ID # PS102424

Review By	Abdul	Review On	10/25/2024 3:28:01 PM		
Supervise By	Ankita	Supervise On	10/28/2024 9:12:45 AM		
SubDirectory	PS102424	HP Acquire Method		HP Processing Method	ps102324 8151

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	P23457,PP23458,PP23459,PP23460,PP23461,PP23462,PP23467,PP23468,PP23469
CCC	PP23462
Internal Standard/PEM	
ICV/I.BLK	PP23469
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

18	HSTDCCC750	HSTDCCC750	PS028047.D	24 Oct 2024 21:08		AR\AJ	Ok

M : Manual Integration

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

Instrument ID: ECD_S

Daily Analysis Runlog For Sequence/QCBatch ID # PS102824

Review By	Abdul	Review On	10/29/2024 8:52:20 AM		
Supervise By	Ankita	Supervise On	10/29/2024 8:52:48 AM		
SubDirectory	PS102824	HP Acquire Method		HP Processing Method	ps102324 8151

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	P23457,PP23458,PP23459,PP23460,PP23461,PP23462,PP23467,PP23468,PP23469
CCC	PP23462
Internal Standard/PEM	
ICV/I.BLK	PP23469
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	HEXANE	HEXANE	PS028070.D	28 Oct 2024 09:44		AR\AJ	Ok
2	I.BLK	I.BLK	PS028071.D	28 Oct 2024 10:08		AR\AJ	Ok,M
3	HSTDCCC750	HSTDCCC750	PS028072.D	28 Oct 2024 10:32		AR\AJ	Ok,M
4	PB164261TB	PB164261TB	PS028073.D	28 Oct 2024 13:11		AR\AJ	Ok,M
5	PB164336TB	PB164336TB	PS028074.D	28 Oct 2024 13:35		AR\AJ	Ok,M
6	I.BLK	I.BLK	PS028075.D	28 Oct 2024 13:59		AR\AJ	Ok
7	HSTDCCC750	HSTDCCC750	PS028076.D	28 Oct 2024 17:17		AR\AJ	Ok

M : Manual Integration

Alliance TECHNICAL GROUP

TCLP EXTRACTION LOGPAGE

PB164336

SOP ID : M1311-TCLP-15

SDG No : N/A
Weigh By : N/A
Balance ID : N/A
pH Meter ID : WC PH METER-1
Extraction By : JP
Filter By : JP
Pippete ID : N/A
Tumbler ID : N/A
TCLP Filter ID : N/A

Start Prep Date : N/A **Time :** N/A
End Prep Date : N/A **Time :** N/A
Combination Ratio : N/A
ZHE Cleaning Batch : N/A
Initial Room Temperature: N/A
Final Room Temperature: N/A
TCLP Technician Signature : JP
Supervisor By : 12

Standared Name	MLS USED	STD REF. # FROM LOG
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A

Chemical Used	ML/SAMPLE U	Lot Number
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
pH Strips	N/A	W1931,W1934,W2350,W2755
pH Strips	N/A	W1937,W1938,W1939,W1940,W1941,W1942
N/A	N/A	N/A
120ml Plastic bottle	N/A	21029
1:1 HNO3	MP81119	N/A

Extraction Conformance/Non-Conformance Comments:

Matrix spikes are added after fiftration and before preservation. p4513-04 IS ISED FOR MS-MSD.

Date / Time	Prepped Sample Relinquished By/Location	Received By/Location
~~10/24/24~~ 11:00	JP / Cell Room	JP Lab Inorganic
	Preparation Group	Analysis Group

JP 10/24/24 11:00

Alliance TECHNICAL GROUP

TCLP EXTRACTION LOGPAGE

PB164336

Sample ID	ClientID	TCLP Vessel ID	Sample Wt (g)	Volume Extraction Fluid #1 (mL)	Multi phasic	Phase Miscible	Phases Combined	Final Leachate PH	Metals Leachate Adj. PH	Prep Pos
P4462-02	C0AL2	N/A	N/A	N/A	N/A	N/A	N/A	8.0	1.5	N/A
~~P4488-03~~	~~HCC-1~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~4.5~~	~~1.0~~	~~N/A~~
~~P4488-05~~	~~HCC-2~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~5.0~~	~~1.5~~	~~N/A~~
P4511-01	266	N/A	N/A	N/A	N/A	N/A	N/A	8.0	1.0	N/A
P4512-01	3140	N/A	N/A	N/A	N/A	N/A	N/A	7.6	1.5	N/A
P4512-02	3149	N/A	N/A	N/A	N/A	N/A	N/A	7.6	1.0	N/A
P4513-04	D3682	N/A	N/A	N/A	N/A	N/A	N/A	8.6	1.5	N/A
PB164336TB	LEB336	N/A	N/A	N/A	N/A	N/A	N/A	4.94	1.0	N/A

SampleID	ClientID	Sample Weight (g)	Filter Weight (g)	Filtrate (mL)	Filter + Solid (After 100°C)	% solids	% Dry Solids
P4462-02	C0AL2	N/A	N/A	N/A	N/A	<0.5	N/A
~~P4488-03~~	~~HCC-1~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~<0.5~~	~~N/A~~
~~P4488-05~~	~~HCC-2~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~<0.5~~	N/A
P4511-01	266	N/A	N/A	N/A	N/A	<0.5	N/A
P4512-01	3140	N/A	N/A	N/A	N/A	<0.5	N/A
P4512-02	3149	N/A	N/A	N/A	N/A	<0.5	N/A
P4513-04	D3682	N/A	N/A	N/A	N/A	<0.5	N/A
PB164336TB	LEB336	N/A	N/A	N/A	N/A	N/A	N/A

WORKLIST(Hardcopy Internal Chain)

WorkList Name : tclp 4462 water **WorkList ID :** 184708 **Department :** TCLP Extraction **Date :** 10-23-2024 12:32:18

Sample	Customer Sample	Matrix	Test	Preservative	Customer	Raw Sample Storage Location	Collect Date	Method
P4462-02	C0AL2	Water	TCLP Extraction	Cool 4 deg C	TETR16	K51	10/17/2024	1311
P4511-01	266	Water	TCLP Extraction	Cool 4 deg C	PSEG03	K61	10/23/2024	1311
P4512-01	3140	Water	TCLP Extraction	Cool 4 deg C	PSEG03	K61	10/23/2024	1311
P4512-02	3149	Water	TCLP Extraction	Cool 4 deg C	PSEG03	K61	10/23/2024	1311
P4513-04	D3682	Water	TCLP Extraction	Cool 4 deg C	PSEG03	K61	10/23/2024	1311

Date/Time 10/23/24 16:10

Raw Sample Received by: TD (WC)

Raw Sample Relinquished by:

Date/Time 10/23/24 18:00

Raw Sample Received by:

Raw Sample Relinquished by: TD (WC)

Alliance TECHNICAL GROUP

EXTRACTION LOGPAGE

PB164378

SOP ID: M8151A-Herbicide-22

Clean Up SOP #: N/A

Matrix : Water

Weigh By: N/A

Balance check: N/A

Balance ID: N/A

pH Strip Lot#: E3574

Extraction By: RJ

Filter By: EH

pH Meter ID: N/A

Hood ID: 4,7

Extraction Start Date : 10/24/2024

Extraction Start Time : 11:28

Extraction End Date : 10/24/2024

Extraction End Time : 16:30

Concentration By: EH

Supervisor By : rajesh

Extraction Method: [√] Seperatory Funnel [_] Continious Liquid/Liquid [_] Sonication [_] Waste Dilution [_] Soxhlet

Standared Name	MLS USED	Concentration ug/mL	STD REF. # FROM LOG
Spike Sol 1	1.0ML	5/500 PPM	PP23699
Surrogate	1.0ML	5000 PPB	PP23907
N/A	N/A	N/A	N/A
N/A	N/A	N/A	N/A
N/A	N/A	N/A	N/A

Chemical Used	ML/SAMPLE USED	Lot Number
Ether	N/A	E3370
Acidified Na2SO4	N/A	EP2503
12N H2SO4	N/A	EP2552
NAOH 6N	N/A	EP2491
ISO OCTANE	N/A	E3554
METHANOL	N/A	V14150
Diazomethane	N/A	EP2529
Hexane	N/A	E3816
NACL	N/A	M4459
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A

Extraction Conformance/Non-Conformance Comments:

pH Adjusted with 6N NaOH>12 prior to Hydrolysis, PH adjusted with cold 12N H2SO4<2 after Hydrolysis, Derivatization procedure is completed and samples are ready to Analyze, 40ml Vial Lot # 03-40BTS721.

KD Bath ID: N/A

KD Bath Temperature: N/A

Envap ID: NE VAP-02

Envap Temperature: 40 °C

Date / Time	Prepped Sample Relinquished By/Location	Received By/Location
10/24/24	RP (Ext. Lab)	[signature] Pest/PCB Lab
16:35	Preparation Group	Analysis Group

Alliance TECHNICAL GROUP

EXTRACTION LOGPAGE

PrepBatch ID : PB164378

Analytical Method: M8151A-Herbicide-22

Concentration Date: 10/24/2024

Sample ID	Client Sample ID	Test	g / mL	PH	Surr/Spike By:		Final Vol. (mL)	JarID	Comments	Prep Pos
					AddedBy	VerifiedBy				
PB164261TB	PB164261TB	TCLP Herbicide	100	6	RUPESH	ritesh	10			SEP-08
PB164336TB	PB164336TB	TCLP Herbicide	100	6	RUPESH	ritesh	10			9
PB164378BL	HBLK378	TCLP Herbicide	1000	6	RUPESH	ritesh	10			10
PB164378BS	HLCS378	TCLP Herbicide	1000	6	RUPESH	ritesh	10			11
P4397-06	WB-301-BOT	TCLP Herbicide	100	6	RUPESH	ritesh	10	A		12
P4397-06MS	WB-301-BOTMS	TCLP Herbicide	100	6	RUPESH	ritesh	10	A		13
P4397-06MSD	WB-301-BOTMSD	TCLP Herbicide	100	6	RUPESH	ritesh	10	A		14
P4460-04	WB-303-BOT	TCLP Herbicide	100	6	RUPESH	ritesh	10	A		15
P4462-02	C0AL2	TCLP Herbicide	100	6	RUPESH	ritesh	10	A		16

* **Extracts relinquished on the same date as received.**

10/24/24

Alliance TECHNICAL GROUP

TCLP EXTRACTION LOGPAGE

PB164336

Sample ID	ClientID	TCLP Vessel ID	Sample Wt (g)	Volume Extraction Fluid #1 (mL)	Multi phasic	Phase Miscible	Phases Combined	Final Leachate PH	Metals Leachate Adj. PH	Prep Po
P4462-02	C0AL2	N/A	N/A	N/A	N/A	N/A	N/A	8.0	1.5	N/A
~~P4488-03~~	~~HCC-1~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~4.5~~	~~1.0~~	~~N/A~~
~~P4488-05~~	~~HCC-2~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~N/A~~	~~5.0~~	~~1.5~~	~~N/A~~
P4511-01	266	N/A	N/A	N/A	N/A	N/A	N/A	8.0	1.0	N/A
P4512-01	3140	N/A	N/A	N/A	N/A	N/A	N/A	7.6	1.5	N/A
P4512-02	3149	N/A	N/A	N/A	N/A	N/A	N/A	7.6	1.0	N/A
P4513-04	D3682	N/A	N/A	N/A	N/A	N/A	N/A	8.6	1.5	N/A
PB164336TB	LEB336	N/A	N/A	N/A	N/A	N/A	N/A	4.94	1.0	N/A

Alliance TECHNICAL GROUP

TCLP EXTRACTION LOGPAGE

PB164261

Sample ID	ClientID	TCLP Vessel ID	Sample Wt (g)	Volume Extraction Fluid #1 (mL)	Multi phasic	Phase Miscible	Phases Combined	Final Leachate PH	Metals Leachate Adj. PH	Pr... P...
P4397-06	WB-301-BOT	01	100.03	2000	N/A	N/A	N/A	5.6	1.5	T-...
P4443-05	OG-315-HR-502-COMP-29	02	100.02	2000	N/A	N/A	N/A	5.5	1.0	T-...
P4443-10	OG-315-HR-502-COMP-30	03	100.03	2000	N/A	N/A	N/A	4.5	1.5	T-...
P4458-02	280517	04	100.02	2000	N/A	N/A	N/A	5.6	1.0	T-...
P4460-04	WB-303-BOT	05	100.03	2000	N/A	N/A	N/A	6.0	1.5	T-...
PB164261TB	LEB261	06	N/A	2000	N/A	N/A	N/A	4.93	1.0	T-...

10/21/2024

08:00

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Prep Standard - Chemical Standard Summary

Order ID : P4462

Test : TCLP Herbicide

Prepbatch ID : PB164378,

Sequence ID/Qc Batch ID: PS102424,PS102824,

Standard ID :
EP2491,EP2503,EP2552,PP23457,PP23458,PP23459,PP23460,PP23461,PP23462,PP23467,PP23468,PP23469,PP23699,PP23907,

Chemical ID :
E3370,E3551,E3554,E3657,E3754,E3788,E3815,M5037,M5173,P11179,P12618,P12661,P12707,P12782,P12783,P13498,P13499,P13500,P13501,P23457,P8828,P8901,P9004,W2606,W3112,

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Extractions STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
3884	6 N NAOH	EP2491	06/03/2024	10/24/2024	Rajesh Parikh	Extraction_SCALE_2 (EX-SC-2)	None	RUPESHKUMAR SHAH 06/03/2024

FROM 1000.00000ml of W2606 + 240.00000gram of E3657 = Final Quantity: 1000.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
601	Acidified Sodium Sulphate 2	EP2503	07/01/2024	12/15/2024	Rajesh Parikh	Extraction_SCALE_2 (EX-SC-2)	None	RUPESHKUMAR SHAH 07/01/2024

FROM 100.00000ml of E3370 + 150.00000ml of M5037 + 3000.00000ml of E3551 = Final Quantity: 3000.000 gram

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Extractions STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
3883	12N H2SO4 solution	EP2552	10/21/2024	04/21/2025	Rajesh Parikh	None	None	RUPESHKUMAR SHAH 10/21/2024

FROM 333.00000ml of M5173 + 667.00000ml of W3112 = Final Quantity: 1000.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1321	2/200 PPM Herb Mega Mix	PP23457	06/17/2024	12/04/2024	Abdul Mirza	None	None	Ankita Jodhani 06/18/2024

FROM 0.20000ml of P8828 + 1.00000ml of P11179 + 1.00000ml of P12618 + 1.00000ml of P12661 + 1.00000ml of P8901 + 95.80000ml of E3754 = Final Quantity: 100.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1452	1500 PPB HERB MIX STD	PP23458	06/17/2024	12/04/2024	Abdul Mirza	None	None	Ankita Jodhani 06/18/2024

FROM 0.25000ml of E3754 + 75.00000ml of PP23457 = Final Quantity: 1.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1453	1000 PPB Herb MIX STD	PP23459	06/17/2024	12/04/2024	Abdul Mirza	None	None	Ankita Jodhani 06/18/2024

FROM 0.50000ml of E3754 + 0.50000ml of PP23457 = Final Quantity: 1.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1455	500 PPB Herb MIX STD	PP23460	06/17/2024	12/04/2024	Abdul Mirza	None	None	Ankita Jodhani 06/18/2024

FROM 0.50000ml of E3754 + 0.50000ml of PP23459 = Final Quantity: 1.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1456	200 PPB Herb MIX STD	PP23461	06/17/2024	12/04/2024	Abdul Mirza	None	None	Ankita Jodhani 06/18/2024

FROM 0.80000ml of E3754 + 0.20000ml of PP23459 = Final Quantity: 1.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1454	750 PPB Herb MIX STD	PP23462	06/17/2024	12/04/2024	Abdul Mirza	None	None	Ankita Jodhani 06/18/2024

FROM 0.25000ml of E3754 + 0.75000ml of PP23459 = Final Quantity: 1.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1851	2/200 PPM Herb Mega Mix 2nd Source	PP23467	06/17/2024	12/04/2024	Abdul Mirza	None	None	Ankita Jodhani 06/18/2024

FROM 0.50000ml of P9004 + 1.00000ml of P12707 + 48.50000ml of E3754 = Final Quantity: 50.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1854	1000 PPB HERB MIX ICV STD	PP23468	06/17/2024	12/04/2024	Abdul Mirza	None	None	Ankita Jodhani 06/18/2024

FROM 0.50000ml of E3754 + 0.50000ml of PP23467 = Final Quantity: 1.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1691	750 PPB ICV HERB STD	PP23469	06/17/2024	12/04/2024	Abdul Mirza	None	None	Ankita Jodhani 06/18/2024

FROM 0.25000ml of E3754 + 0.75000ml of PP23468 = Final Quantity: 1.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1848	5000/500000 PPB Herbicide Spike (Free Acid)	PP23699	09/24/2024	02/13/2025	Abdul Mirza	None	None	Ankita Jodhani 10/01/2024

FROM 1.25000ml of P12782 + 1.25000ml of P12783 + 47.50000ml of E3788 = Final Quantity: 50.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
60	5000 PPB Herbicide Surg Spike (Free Acid)	PP23907	10/21/2024	04/04/2025	Abdul Mirza	None	None	Ankita Jodhani 10/22/2024

FROM 1.25000ml of P13498 + 1.25000ml of P13499 + 1.25000ml of P13500 + 1.25000ml of P13501 + 195.00000ml of E3815 = Final Quantity: 200.000 ml

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CHEMICAL RECEIPT LOG BOOK

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9244-03 / Ether, Anhydrous, Purified (cs/4x4L)	0000288039	01/17/2025	08/01/2022 / Rajesh	07/13/2022 / Rajesh	E3370

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
PCI Scientific Supply, Inc.	PC19631-100 / SODIUM SULFATE, ANHYDROUS, PEST GRADE, 1	313201	01/03/2025	01/03/2024 / Rajesh	07/20/2023 / Rajesh	E3551

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9335-02 / Iso-Octane (2,2,4-Trimethypentane) Ultra Resi-Analyzed Grade	63160	01/05/2025	08/09/2023 / Rajesh	08/09/2023 / Rajesh	E3554

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
PCI Scientific Supply, Inc.	PC19510-5 / Sodium Hydroxide Pellets 2.5 Kg, Pk of 4	23B1556310	12/31/2025	12/04/2023 / Rajesh	12/01/2023 / Rajesh	E3657

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9262-03 / Hexane, Ultra-Resi (cs/4x4L)	24C1862008	12/04/2024	06/04/2024 / Rajesh	05/31/2024 / Rajesh	E3754

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9254-03 / Acetone, Ultra Resi (cs/4x4L)	23H1462005	04/23/2025	08/13/2024 / Rajesh	08/13/2024 / Rajesh	E3788

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CHEMICAL RECEIPT LOG BOOK

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9254-03 / Acetone, Ultra Resi (cs/4x4L)	24H1462005	04/04/2025	10/04/2024 / Rajesh	10/04/2024 / Rajesh	E3815

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9673-33 / Sulfuric Acid, Instra-Analyzed (cs/6c2.5L)	0000250349	12/15/2024	01/06/2022 / mohan	09/18/2021 / mohan	M5037

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9673-33 / Sulfuric Acid, Instra-Analyzed (cs/6c2.5L)	0000281827	06/02/2025	06/01/2022 /	04/05/2022 / william	M5173

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	32050 / Herbicide, 8000 series, 515 Surrogate [ester] 2,4-dichlorophenyl acetic acid methyl ester, 1mL, 200ug/mL, Hexane	A0172864	12/17/2024	06/17/2024 / Abdul	11/01/2021 / Abdul	P11179

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	32062 / Herbicide Mix, 500/8000, Standard #4 [methyl ester] 200ug/mL, hexane, 1mL/ampul	A0155055	12/17/2024	06/17/2024 / Abdul	07/03/2023 / Abdul	P12618

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	32055 / Herbicide Mix, 500/8000, Standard #1 [methyl ester] 200ug/mL, hexane, 1mL/ampul	A0199693	12/17/2024	06/17/2024 / Abdul	07/14/2023 / Ankita	P12661

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CHEMICAL RECEIPT LOG BOOK

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Agilent Technologies	HBM-8151M / Chlorinated Herbicide Mixtures, Methyl Esters	0006752480	12/17/2024	06/17/2024 / Abdul	08/09/2023 / Abdul	P12707

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Agilent Technologies	HBM-8151M / Chlorinated Herbicide Mixtures, Methyl Esters	0006752480	12/17/2024	06/17/2024 / Abdul	08/09/2023 / Abdul	P12707

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Agilent Technologies	HBM-8151A / Chlorinated Herbicide Mixtures, Free Acids	0006750243	03/24/2025	09/24/2024 / Abdul	09/11/2023 / Abdul	P12782

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Agilent Technologies	HBM-8151A / Chlorinated Herbicide Mixtures, Free Acids	0006750243	03/24/2025	09/24/2024 / Abdul	09/11/2023 / Abdul	P12782

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Agilent Technologies	HBM-8151A / Chlorinated Herbicide Mixtures, Free Acids	0006750243	03/24/2025	09/24/2024 / Abdul	09/11/2023 / Abdul	P12783

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Agilent Technologies	HBM-8151A / Chlorinated Herbicide Mixtures, Free Acids	0006750243	03/24/2025	09/24/2024 / Abdul	09/11/2023 / Abdul	P12783

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CHEMICAL RECEIPT LOG BOOK

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	32049 / Herbicide, 8000 series, 515 Surrogate [free acid] 2,4-dichlorophenyl acetic acid, 1mL, 200ug/mL, MeOH	A0212676	04/21/2025	10/21/2024 / Abdul	08/16/2024 / yogesh	P13498

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	32049 / Herbicide, 8000 series, 515 Surrogate [free acid] 2,4-dichlorophenyl acetic acid, 1mL, 200ug/mL, MeOH	A0212676	04/21/2025	10/21/2024 / Abdul	08/16/2024 / yogesh	P13499

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	32049 / Herbicide, 8000 series, 515 Surrogate [free acid] 2,4-dichlorophenyl acetic acid, 1mL, 200ug/mL, MeOH	A0212676	04/21/2025	10/21/2024 / Abdul	08/16/2024 / yogesh	P13500

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	32049 / Herbicide, 8000 series, 515 Surrogate [free acid] 2,4-dichlorophenyl acetic acid, 1mL, 200ug/mL, MeOH	A0212676	04/21/2025	10/21/2024 / Abdul	08/16/2024 / yogesh	P13501

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	32254 / Dalapon Methyl Ester, 1000 ug/ml	A0148063	12/17/2024	06/17/2024 / Abdul	08/16/2019 / Stephen	P8828

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	32059 / Herbicide Mix#3 (Methyl Ester), 20000 ug/ml	A0152499	12/17/2024	06/17/2024 / Abdul	08/16/2019 / Stephen	P8901

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

CHEMICAL RECEIPT LOG BOOK

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	32050 / Herbicide, 8000 series, 515 Surrogate [ester] 2,4-dichlorophenyl acetic acid methyl ester, 1mL, 200ug/mL, Hexane	A0152705	12/17/2024	06/17/2024 / Abdul	10/11/2019 / Stephen	P9004

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	DIW / DI Water	Daily Lab-Certified	10/24/2024	10/24/2019 / apatel	10/24/2019 / apatel	W2606

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	DIW / DI Water	Daily Lab-Certified	07/03/2029	07/03/2024 / Iwona	07/03/2024 / Iwona	W3112

Ether, Anhydrous
BAKER ANALYZED® A.C.S. Reagent
Contains BHT as a Preservative
Suitable for Fat Extraction

avantor™ | J.T.Baker®

Material No.: 9244-03
Batch No.: 0000288039
Manufactured Date: 2021/07/22
Expiration Date: 2023/07/22
Revision No: 1

Certificate of Analysis

Meets ACS Reagent Chemical Requirements,

Test	Specification	Result
Assay ($(C_2H_5)_2O$) (by GC, corrected for water)	>= 99.0 %	100.0
Alcohol (C_2H_5OH)	Passes Test	PT
Carbonyl Compounds (as HCHO) (by polarography)	<= 0.001 %	< 0.001
Color (APHA)	<= 10	< 5
Peroxide (as H_2O_2)	<= 1 ppm	< 1
Preservative (BHT)	>= 7 ppm	9
Residue after Evaporation	<= 0.0010 %	< 0.0010
Titrable Acid (µeq/g)	<= 0.2	< 0.2
Water (by KF, coulometric)	<= 0.01 %	0.01

For Laboratory, Research or Manufacturing Use
Meets Reagent Specifications for testing USP/NF monographs

Country of Origin: US

Recd. by RP on 9/13/22

E 3370

James T Ethier
Jamie Ethier
Vice President Global Quality

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700
Avantor Performance Materials, LLC
100 Matsonford Rd, Suite 200, Radnor, PA 19087. U.S.A. Phone: 610.386.1700

PRODUCTOS QUIMICOS MONTERREY, S.A. DE C.V.

MIRADOR 201, COL. MIRADOR
MONTERREY, N.L. MEXICO
CP 64070
TEL +52 81 13 52 57 57
www.pqm.com.mx

CERTIFICATE OF ANALYSIS

PRODUCT :	SODIUM SULFATE CRYSTALS ANHYDROUS		
QUALITY :	ACS (CODE RMB3375)	FORMULA :	Na_2SO_4
SPECIFICATION NUMBER :	6399	RELEASE DATE:	ABR/21/2023
LOT NUMBER :	313201		

TEST	SPECIFICATIONS	LOT VALUES
Assay (Na_2SO_4)	Min. 99.0%	99.7 %
pH of a 5% solution at 25°C	5.2 - 9.2	6.1
Insoluble matter	Max. 0.01%	0.005 %
Loss on ignition	Max. 0.5%	0.1 %
Chloride (Cl)	Max. 0.001%	<0.001 %
Nitrogen compounds (as N)	Max. 5 ppm	<5 ppm
Phosphate (PO_4)	Max. 0.001%	<0.001 %
Heavy metals (as Pb)	Max. 5 ppm	<5 ppm
Iron (Fe)	Max. 0.001%	<0.001 %
Calcium (Ca)	Max. 0.01%	0.002 %
Magnesium (Mg)	Max. 0.005%	0.001 %
Potassium (K)	Max. 0.008%	0.003 %
Extraction-concentration suitability	Passes test	Passes test
Appearance	Passes test	Passes test
Identification	Passes test	Passes test
Solubility and foreing matter	Passes test	Passes test
Retained on US Standard No. 10 sieve	Max. 1%	0.1 %
Retained on US Standard No. 60 sieve	Min. 94%	97.3 %
Through US Standard No. 60 sieve	Max. 5%	2.5 %
Through US Standard No. 100 sieve	Max. 10%	0.1 %

COMMENTS

QC: PhC Irma Belmares

If you need further details, please call our factory or contact our local distributor.

RG-02-01, Ed. 3

Recd. by RB on 7/24/23 E3551

Certificate of Analysis

MilliporeSigma

Date of Release: 6/9/2023

Name: 2,2,4–Trimethylpentane [Isooctane] OmniSolv®

Item No: TX1389 all size codes

Lot / Batch No: 63160

Country of Origin: Germany

Characteristic	Requirement		Results	Units
	Min.	Max.		
Assay (GC)	99.5		> 99.99	%
Capillary ECD responsive substances (as PCNB)		5	0.24	ng/L
Color (APHA)		10	< 10	
Evaporation residue		1	< 0.5	ppm
Filtered through 0.2 µm filter			Passes test	
Fluorescence (as quinine base)		250	71	ppt
Form			Clear liquid	
Infrared Spectrum			Conforms	
Refractive index (at 20°C)			1.3915	
UV Abs. at 200 nm		1.00	0.137	AU
UV Abs. at 220 nm		0.05	0.024	AU
UV Abs. at 230 nm		0.02	0.003	AU
UV Abs. at 250 nm		0.005	0.003	AU
UV Abs. at 270 nm		0.005	0.002	AU
UV Abs. at 300 nm		0.005	0.004	AU
UV Cut–off		200	191.1	nm
Water (H2O)		0.01	0.001	%

Michael Hutchinson,

Quality Control Manager

This document has been produced electronically and is valid without a signature.

EMD Millipore is a division of Merck KGaA,Darmstadt, Germany
EMD Millipore Corporation
400 Summit Drive,
Burlington, MA 01803
U.S.A

Recd by RP on 8/9/23

E3554

VWR®

Certificate of Analysis

Sodium Hydroxide (Pellets)

Material: 0583
Grade: ACS GRADE
Batch Number: 23B1556310

Chemical Formula: NaOH
Molecular Weight: 40
CAS #: 1310-73-2
Appearance:

Pellets

Manufacture Date: 12/14/2022
Expiration Date: 12/31/2025

Storage: Room Temperature

TEST	SPECIFICATION	ANALYSIS	DISPOSITION
Calcium	<= 0.005 %	<0.005 %	PASS
Chloride	<= 0.005 %	0.002 %	PASS
Heavy Metals	<= 0.002 %	<0.002 %	PASS
Iron	<= 0.001 %	<0.001 %	PASS
Magnesium	<= 0.002 %	<0.002 %	PASS
Mercury	<= 0.1 ppm	<0.1 ppm	PASS
Nickel	<= 0.001 %	<0.001 %	PASS
Nitrogen Compounds	<= 0.001 %	<0.001 %	PASS
Phosphate	<= 0.001 %	<0.001 %	PASS
Potassium	<= 0.02 %	<0.02 %	PASS
Purity	>= 97.0 %	99.2 %	PASS
Sodium Carbonate	<= 1.0 %	0.5 %	PASS
Sulfate	<= 0.003 %	<0.003 %	PASS

Internal ID #: 710

Signature

We certify that this batch conforms to the specifications listed.

This document has been electronically produced and is valid without a signature.

Leona Edwardson, Quality Control Sr. Manager - Solon
VWR Chemicals, LLC.
28600 Fountain Parkway, Solon OH 44139 USA

Additional Information

Analysis may have been rounded to significant digits in specification limits.

Product meets analytical specifications of the grades listed.

E 3657	E 3659
E 3654	E 3660

Hexanes (95% n-hexane)
BAKER RESI-ANALYZED® Reagent
For Organic Residue Analysis

avantor™ | J.T.Baker®

Material No.: 9262-03
Batch No.: 24C1862008
Manufactured Date: 2024-01-30
Expiration Date: 2025-04-30
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
FID-Sensitive Impurities (as 2-Octanol) Single Impurity Peak (ng/mL)	≤ 5	< 1
ECD Sensitive Impurities (as Heptachlor Epoxide) Single Peak (pg/mL)	≤ 10	1
ECD-Sensitive Impurities (as Ethylene Dibromide) - Single Impurity Peak (ng/mL)	≤ 5	1
Assay (Total Saturated C_6 Isomers) (by GC, corrected for water)	≥ 99.5 %	99.7 %
Assay (as n-Hexane) (by GC, corrected for water)	≥ 95 %	98 %
Color (APHA)	≤ 10	5
Residue after Evaporation	≤ 1.0 ppm	0.4 ppm
Substances Darkened by H_2SO_4	Passes Test	Passes Test
Water (by KF, coulometric)	≤ 0.05 %	< 0.01 %

For Laboratory,Research,or Manufacturing Use
MEETS SPECIFICATIONS WITHIN THE EXPIRATION PERIOD

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC

Recd. by RP on 5/31/24

E3754

JCroak

Jamie Croak
Director Quality Operations, Bioscience Production

Acetone
BAKER RESI-ANALYZED® Reagent
For Organic Residue Analysis

avantor™ | J.T.Baker®

Material No.: 9254-03
Batch No.: 23H1462005
Manufactured Date: 2023-07-26
Expiration Date: 2026-07-25
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
Assay ($(CH_3)_2CO$) (by GC, corrected for water)	≥ 99.4 %	99.7 %
Color (APHA)	≤ 10	5
Residue after Evaporation	≤ 1.0 ppm	0.3 ppm
Substances Reducing Permanganate	Passes Test	Passes Test
Titrable Acid (µeq/g)	≤ 0.3	0.1
Titrable Base (µeq/g)	≤ 0.6	< 0.1
Water (H_2O)	≤ 0.5 %	0.3 %
FID-Sensitive Impurities (as 2-Octanol) Single Impurity Peak (ng/mL)	≤ 5	< 1
ECD Sensitive Impurities (as Heptachlor Epoxide) Single Peak (pg/mL)	≤ 10	1

For Laboratory,Research,or Manufacturing Use
MEETS SPECIFICATIONS WITHIN THE EXPIRATION PERIOD

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC

Recd. by RP on 8/13/24

E 3788

Ken Koehnlein
Sr. Manager, Quality Assurance

PO: PO2-329 PRODUCT CODE: SHIP DATE: 9/30/2024

Acetone
BAKER RESI-ANALYZED® Reagent
For Organic Residue Analysis

avantor | J.T.Baker

Material No.: 9254-03
Batch No.: 24H1462005
Manufactured Date: 2024-05-24
Expiration Date:2027-05-24
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
Assay ($(CH_3)_2CO$) (by GC, corrected forwater)	>= 99.4 %	99.8 %
Color (APHA)	<= 10	5
Residue after Evaporation	<= 1.0 ppm	0.2 ppm
Substances Reducing Permanganate	Passes Test	Passes Test
Titrable Acid (µeq/g)	<= 0.3	0.2
Titrable Base (µeq/g)	<= 0.6	<0.1
Water (H_2O)	<= 0.5 %	0.2 %
FID-Sensitive Impurities (as 2-Octanol)Single Impurity Peak (ng/mL)	<= 5	<1
ECD Sensitive Impurities (as HeptachlorEpoxide) Single Peak (pg/mL)	<= 10	1

For Laboratory,Research,or Manufacturing Use
MEETS SPECIFICATIONS WITHIN THE EXPIRATION PERIOD

Country of Origin: United States
Packaging Site: Phillipsburg Mfg Ctr & DC

E3815

Jamie Croak
Director Quality Operations, Bioscience Production

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700
Avantor Performance Materials,LLC
100 Matsonford Rd, Suite 200,Radnor,PA,19087.U.S.A.Phone 610.386.1700

Sulfuric Acid
BAKER INSTRA-ANALYZED® Reagent
For Trace Metal Analysis
Low Selenium

M3033-38-33-40
no

avantor™ | J.T.Baker®

Material No.: 9673-33
Batch No.: 0000250349
Manufactured Date: 2019/12/17
Retest Date: 2024/12/15
Revision No: 1

Certificate of Analysis

Test	Specification	Result
ACS - Assay (H_2SO_4)	95.0 - 98.0 %	96.5
Appearance	Passes Test	PT
ACS - Color (APHA)	<= 10	5
ACS - Residue after Ignition	<= 3 ppm	1
ACS - Substances Reducing Permanganate (as SO_2)	<= 2 ppm	< 2
Ammonium (NH_4)	<= 1 ppm	< 1
Chloride (Cl)	<= 0.1 ppm	< 0.1
Nitrate (NO_3)	<= 0.2 ppm	< 0.1
Phosphate (PO_4)	<= 0.5 ppm	< 0.1
Trace Impurities - Aluminum (Al)	<= 30.0 ppb	0.2
Arsenic and Antimony (as As)	<= 4 ppb	< 2
Trace Impurities - Barium (Ba)	<= 10.0 ppb	< 1.0
Trace Impurities - Beryllium (Be)	<= 10.0 ppb	< 1.0
Trace Impurities - Bismuth (Bi)	<= 10.0 ppb	< 1.0
Trace Impurities - Boron (B)	<= 10.0 ppb	< 5.0
Trace Impurities - Cadmium (Cd)	<= 2.0 ppb	< 0.3
Trace Impurities - Calcium (Ca)	<= 50.0 ppb	2.9
Trace Impurities - Chromium (Cr)	<= 6.0 ppb	< 0.4
Trace Impurities - Cobalt (Co)	<= 0.5 ppb	< 0.3
Trace Impurities - Copper (Cu)	<= 1.0 ppb	< 0.1
Trace Impurities - Gallium (Ga)	<= 10.0 ppb	< 1.0
Trace Impurities - Germanium (Ge)	<= 10.0 ppb	< 10.0
Trace Impurities - Gold (Au)	<= 10.0 ppb	< 0.2
Heavy Metals (as Pb)	<= 500 ppb	< 100

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700
Avantor Performance Materials, LLC
100 Matsonford Rd, Suite 200, Radnor, PA 19087. U.S.A. Phone: 610.386.1700

Material No.: 9673-33
Batch No.: 0000250349

Test	Specification	Result
Trace Impurities - Iron (Fe)	<= 50.0 ppb	4.1
Trace Impurities - Lead (Pb)	<= 0.5 ppb	< 0.5
Trace Impurities - Lithium (Li)	<= 10.0 ppb	< 1.0
Trace Impurities - Magnesium (Mg)	<= 7.0 ppb	0.4
Trace Impurities - Manganese (Mn)	<= 1.0 ppb	< 0.4
Trace Impurities - Mercury (Hg)	<= 0.5 ppb	< 0.1
Trace Impurities - Molybdenum (Mo)	<= 10.0 ppb	< 5.0
Trace Impurities - Nickel (Ni)	<= 2.0 ppb	< 0.3
Trace Impurities - Niobium (Nb)	<= 10.0 ppb	< 1.0
Trace Impurities - Potassium (K)	<= 500.0 ppb	< 2.0
Trace Impurities - Selenium (Se)	<= 50.0 ppb	22.9
Trace Impurities - Silicon (Si)	<= 100.0 ppb	< 10.0
Trace Impurities - Silver (Ag)	<= 1.0 ppb	< 0.3
Trace Impurities - Sodium (Na)	<= 500.0 ppb	2.7
Trace Impurities - Strontium (Sr)	<= 5.0 ppb	< 0.2
Trace Impurities - Tantalum (Ta)	<= 10.0 ppb	< 5.0
Trace Impurities - Thallium (Tl)	<= 20.0 ppb	< 5.0
Trace Impurities - Tin (Sn)	<= 5.0 ppb	< 0.8
Trace Impurities - Titanium (Ti)	<= 10.0 ppb	< 1.0
Trace Impurities - Vanadium (V)	<= 10.0 ppb	< 1.0
Trace Impurities - Zinc (Zn)	<= 5.0 ppb	0.3
Trace Impurities - Zirconium (Zr)	<= 10.0 ppb	< 1.0

For Laboratory, Research or Manufacturing Use

Country of Origin: US
Packaging Site: Phillipsburg Mfg Ctr & DC

James T Ethier
Jamie Ethier
Vice President Global Quality

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700
Avantor Performance Materials, LLC
100 Matsonford Rd, Suite 200, Radnor, PA 19087. U.S.A. Phone: 610.386.1700

Hydrochloric Acid, 36.5-38.0%
BAKER INSTRA-ANALYZED® Reagent
For Trace Metal Analysis

Material No.: 9530-33
Batch No.: 0000281827
Manufactured Date: 2021/03/30
Retest Date: 2026/03/29
Revision No: 1

Certificate of Analysis

Test	Specification	Result
ACS - Assay (as HCl) (by acid-base titrn)	36.5 - 38.0 %	37.6
ACS - Color (APHA)	<= 10	5
ACS - Residue after Ignition	<= 3 ppm	1
ACS - Specific Gravity at 60°/60°F	1.185 - 1.192	1.189
ACS - Bromide (Br)	<= 0.005 %	< 0.005
ACS - Extractable Organic Substances	<= 5 ppm	< 1
ACS - Free Chlorine (as Cl_2)	<= 0.5 ppm	< 0.5
Phosphate (PO_4)	<= 0.05 ppm	< 0.03
Sulfate (SO_4)	<= 0.5 ppm	< 0.3
Sulfite (SO_3)	<= 0.8 ppm	0.3
Ammonium (NH_4)	<= 3 ppm	< 1
Trace Impurities - Arsenic (As)	<= 0.010 ppm	< 0.003
Trace Impurities - Aluminum (Al)	<= 10.0 ppb	0.5
Arsenic and Antimony (as As)	<= 5 ppb	< 3
Trace Impurities - Barium (Ba)	<= 1.0 ppb	< 0.2
Trace Impurities - Beryllium (Be)	<= 1.0 ppb	< 0.2
Trace Impurities - Bismuth (Bi)	<= 10.0 ppb	< 1.0
Trace Impurities - Boron (B)	<= 20.0 ppb	< 5.0
Trace Impurities - Cadmium (Cd)	<= 1.0 ppb	< 0.3
Trace Impurities - Calcium (Ca)	<= 50.0 ppb	15.0
Trace Impurities - Chromium (Cr)	<= 1.0 ppb	< 0.4
Trace Impurities - Cobalt (Co)	<= 1.0 ppb	< 0.3
Trace Impurities - Copper (Cu)	<= 1.0 ppb	< 0.1
Trace Impurities - Gallium (Ga)	<= 1.0 ppb	< 0.2

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700
Avantor Performance Materials, LLC
100 Matsonford Rd, Suite 200, Radnor, PA 19087. U.S.A. Phone: 610.386.1700

Test	Specification	Result
Trace Impurities - Germanium (Ge)	<= 3.0 ppb	< 2.0
Trace Impurities - Gold (Au)	<= 4.0 ppb	3.0
Heavy Metals (as Pb)	<= 100 ppb	< 50
Trace Impurities - Iron (Fe)	<= 15.0 ppb	1.0
Trace Impurities - Lead (Pb)	<= 1.0 ppb	< 0.5
Trace Impurities - Lithium (Li)	<= 1.0 ppb	< 0.2
Trace Impurities - Magnesium (Mg)	<= 10.0 ppb	< 0.4
Trace Impurities - Manganese (Mn)	<= 1.0 ppb	< 0.4
Trace Impurities - Mercury (Hg)	<= 0.5 ppb	0.2
Trace Impurities - Molybdenum (Mo)	<= 10.0 ppb	< 5.0
Trace Impurities - Nickel (Ni)	<= 4.0 ppb	< 0.3
Trace Impurities - Niobium (Nb)	<= 1.0 ppb	< 0.2
Trace Impurities - Potassium (K)	<= 9.0 ppb	< 2.0
Trace Impurities - Selenium (Se), For Information Only	ppb	1.0
Trace Impurities - Silicon (Si)	<= 100.0 ppb	18.0
Trace Impurities - Silver (Ag)	<= 1.0 ppb	< 0.3
Trace Impurities - Sodium (Na)	<= 100.0 ppb	< 5.0
Trace Impurities - Strontium (Sr)	<= 1.0 ppb	< 0.2
Trace Impurities - Tantalum (Ta)	<= 1.0 ppb	< 0.9
Trace Impurities - Thallium (Tl)	<= 5.0 ppb	< 2.0
Trace Impurities - Tin (Sn)	<= 5.0 ppb	< 0.8
Trace Impurities - Titanium (Ti)	<= 1.0 ppb	< 0.2
Trace Impurities - Vanadium (V)	<= 1.0 ppb	< 0.2
Trace Impurities - Zinc (Zn)	<= 5.0 ppb	0.4
Trace Impurities - Zirconium (Zr)	<= 1.0 ppb	< 0.1

For Laboratory, Research or Manufacturing Use
Product Information (not specifications):
Appearance (clear, fuming liquid)
Meets ACS Specifications

Country of Origin: US
Packaging Site: Phillipsburg Mfg Ctr & DC

James Ethier
Jamie Ethier
Vice President Global Quality

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700
Avantor Performance Materials, LLC
100 Matsonford Rd, Suite 200, Radnor, PA 19087. U.S.A. Phone: 610.386.1700

Column:
30m x 0.25mm x 0.25µm
Rtx-5 (cat.#10223)

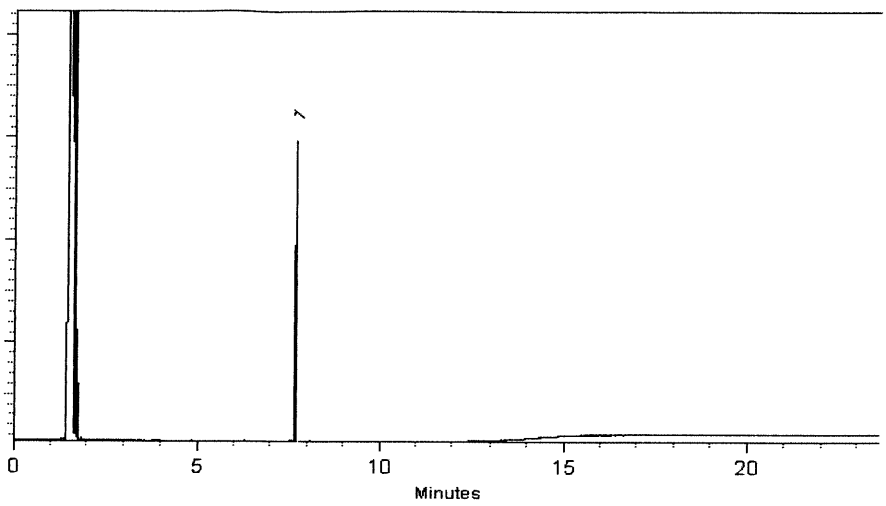
Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
75°C (hold 1 min.) to 330°C
@ 20°C/min. (hold 10 min.)

Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Katelyn McGlinn - Operations Tech I

Date Mixed: 28-May-2021 **Balance:** B345965662

Marlina Cowan - Operations Tech I

Date Passed: 02-Jun-2021

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

P 111177 to P 111186

AR 11/02/21

RESTEK
110 Benner Circle
Bellefonte, PA 16823-8812
Tel: (800)356-1688
Fax: (814)353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

ACCREDITED
ISO 17034 Accredited
Reference Material Producer
Certificate #3222.01

ACCREDITED
ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 32050 **Lot No.:** A0172864

Description : 2,4-Dichlorophenylacetic Acid Methyl Ester Standard

515 Surrogate (ester) 2, 4-dichlorophenyl Acetic Acid Methyl Ester
200µg/mL, Hexane, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : February 29, 2028 **Storage:** 10°C or colder

Handling: This product is photosensitive. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	2,4-Dichlorophenyl acetic acid methyl ester	202.0 µg/mL	+/- 1.4323	µg/mL	Gravimetric
	CAS # 55954-23-9 (Lot CSC42194-01)		+/- 6.8182	µg/mL	Unstressed
	Purity 99%		+/- 6.8182	µg/mL	Stressed

Solvent: Hexane
CAS # 110-54-3
Purity 99%

P111177
↓
P111186

AR
11/02/21

RESTEK
110 Benner Circle
Bellefonte, PA 16823-8812
Tel: (800)356-1688
Fax: (814)353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

A2LA ACCREDITED ISO 17034 Accredited Reference Material Producer Certificate #3222.01

ilac-MRA

A2LA ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

P12616 (5) → P12620 7/5/2023

Catalog No. : 32062 **Lot No.:** A0155055

Description : Herbicide Mix #4/ME (Methyl Ester)

Herbicide Mix #4/ME (Methyl Ester) 200µg/mL, Hexane/Methyl-tert-butyl-ether, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2026 **Storage:** 10°C or colder

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	3,5-Dichlorobenzoic acid methyl ester **CAS #** 2905-67-1 (Lot 3903900) **Purity** 99%	200.0 µg/mL	+/- 1.4182 +/- 6.7507 +/- 6.7507	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
2	4-Nitroanisole **CAS #** 100-17-4 (Lot 24765/7) **Purity** 99%	200.0 µg/mL	+/- 1.4182 +/- 6.7507 +/- 6.7507	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
3	Pentachloroanisole **CAS #** 1825-21-4 (Lot 7921100) **Purity** 99%	200.0 µg/mL	+/- 1.4182 +/- 6.7507 +/- 6.7507	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
4	Chloramben methyl ester **CAS #** 7286-84-2 (Lot 6487100) **Purity** 98%	199.9 µg/mL	+/- 1.4176 +/- 6.7480 +/- 6.7480	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
5	Bentazon methyl ester **CAS #** 61592-45-8 (Lot 817100) **Purity** 99%	200.0 µg/mL	+/- 1.4182 +/- 6.7507 +/- 6.7507	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
6	Picloram methyl ester **CAS #** 14143-55-6 (Lot 386-21B) **Purity** 98%	201.9 µg/mL	+/- 1.4315 +/- 6.8141 +/- 6.8141	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
7	DCPA methyl ester (Chlorthal-dimethyl) **CAS #** 1861-32-1 (Lot 8008700) **Purity** 99%	200.0 µg/mL	+/- 1.4182 +/- 6.7507 +/- 6.7507	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

8	Acifluorfen methyl ester		200.0	µg/mL	+/-	1.4182	µg/mL	Gravimetric
	CAS # 50594-67-7	(Lot 6282300)			+/-	6.7507	µg/mL	Unstressed
	Purity 99%				+/-	6.7507	µg/mL	Stressed

Solvent: Hexane/Methyl-tert-butyl-ether
CAS # 110-54-3/1634-04-4
Purity 99%

Column:
30m x 0.25mm x 0.25µm
Rtx-5 (cat.#10223)

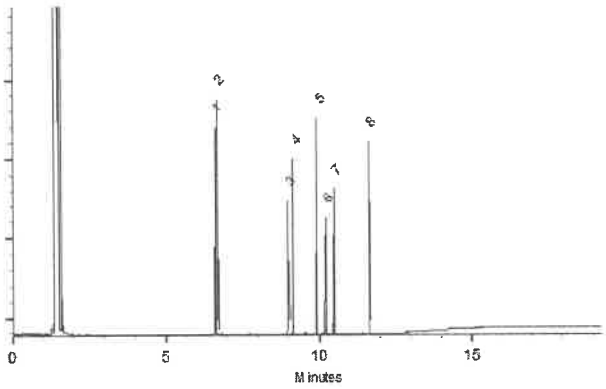
Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
75°C (hold 1 min.) to 330°C
@ 20°C/min. (hold 10 min.)

Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Michael J Maye

Date Mixed: 14-Nov-2019 **Balance:** 1128353505

Justine Albertson - Operations Tech-ARM QC

Date Passed: 18-Nov-2019

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

RESTEK
110 Benner Circle
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Tel: 1-814-353-1300
Fax: 1-814-353-1309

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CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic plus

ACCREDITED ISO 17034 Accredited Reference Material Producer Certificate #3222.01

ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 32055 **Lot No.:** A0199693

Description : Herbicide Mix #1/ME (Methyl Ester)

Herbicide Mix #1/ME (Methyl Ester) 200 µg/mL, Hexane, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : July 31, 2030 **Storage:** 10°C or colder

Handling: This product is photosensitive. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	Dicamba methyl ester	6597-78-0	1813500	99%	202.0 µg/mL	+/- 3.4272
2	Dichlorprop methyl ester	57153-17-0	8578700	98%	201.9 µg/mL	+/- 3.4251
3	2,4-D methyl ester	1928-38-7	10048000	99%	202.0 µg/mL	+/- 3.4272
4	2,4,5-TP (silvex) methyl ester	4841-20-7	504400	99%	202.0 µg/mL	+/- 3.4272
5	2,4,5-T methyl ester	1928-37-6	6875800	98%	201.9 µg/mL	+/- 3.4251
6	Dinoseb methyl ether	6099-79-2	9239100	99%	202.0 µg/mL	+/- 3.4272
7	2,4-DB methyl ester	18625-12-2	6847200	99%	202.0 µg/mL	+/- 3.4272

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Hexane
CAS # 110-54-3
Purity 99%

P12660
↓
P12664

AJ
07/14/23

Quality Confirmation Test

Column:
30m x 0.25mm x 0.25µm
Rtx-5 (cat.#10223)

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

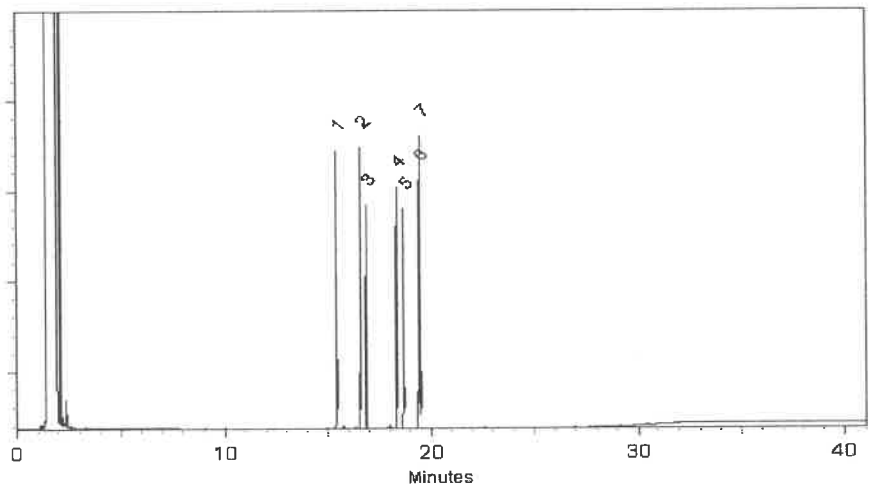
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Nick Yaw - Operations Tech I

Date Mixed: 07-Jul-2023 **Balance Serial #** 1128360905

Christie Mills - Operations Lead Tech - ARM QC

Date Passed: 11-Jul-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

Agilent
Trusted Answers

P12706 ↓ P12715 (10)

ISO 17034

Reference Material Certificate

Product Information Sheet

Product Name: Chlorinated Methylated Herbicides Standard
Product Number: HBM-8151M-1
Storage Conditions: Store at Room Temperature (15° to 30°C).

Lot Number: 0006752480
Lot Issue Date: 18-Jul-2023
Expiration Date: 31-Aug-2025

Component Name	Concentration		Uncertainty	CAS#	Analyte Lot
acifluorfen methyl ester	100.3	±	0.5 µg/mL	050594-67-7	RM03058
bentazon methyl derivative	100.2	±	0.5 µg/mL	061592-45-8	RM13829
chloramben methyl ester	100.4	±	0.5 µg/mL	007286-84-2	RM03055
2,4-D methyl ester	100.2	±	0.5 µg/mL	001928-38-7	RM03040
dalapon methyl ester	100.4	±	0.5 µg/mL	017640-02-7	RM14219
2,4-DB methyl ester	100.2	±	0.5 µg/mL	018625-12-2	RM03029
DCPA	100.2	±	0.5 µg/mL	001861-32-1	RM13426
dicamba methyl ester	100.4	±	0.5 µg/mL	006597-78-0	RM03039
methyl-3,5-dichlorobenzoate	100.1	±	0.5 µg/mL	002905-67-1	RM03048
dichlorprop methyl ester	100.4	±	0.5 µg/mL	057153-17-0	NT02086
dinoseb methyl ether	100.5	±	0.5 µg/mL	006099-79-2	RM03051
MCPA methyl ester	10031	±	50 µg/mL	002436-73-9	RM12863
MCPP methyl ester	10031	±	50 µg/mL	023844-56-6	RM20060
4-nitroanisole	100.3	±	0.5 µg/mL	000100-17-4	RM02806
pentachloroanisole	100.4	±	0.5 µg/mL	001825-21-4	RM02457
picloram methyl ester	100.2	±	0.5 µg/mL	014143-55-6	RM03044
silvex methyl ester	100.2	±	0.5 µg/mL	004841-20-7	RM03799
2,4,5-T methyl ester	100.4	±	0.5 µg/mL	001928-37-6	RM03033

Matrix: methanol (methyl alcohol)

Description:
This document is prepared in accordance with ISO 17034 and Guide 31. This analytical reference material standard was manufactured and verified in accordance with an ISO 9001 registered quality system and analyte concentrations were verified by an ISO 17025 accredited laboratory. The concentration and uncertainty value at the 95% confidence level for each analyte, determined gravimetrically, is listed above.

Traceability:
The balances used for these measurements are calibrated with weights traceable to NIST in compliance with ANSI/NCSL Z540.3, ISO 9001, ISO 17025, and ISO 17034. Calibrated Class A glassware is used for volumetric measurements. Thermometers are calibrated against a NIST traceable thermometer in accordance with NIST Special Publication 1088.

Homogeneity:
This analytical reference standard was unitized according to an in-house procedure and is guaranteed to be homogeneous. There is no minimum sub-sample size required.

CSD-QA-015.2

ISO 17025
Cert No. AT-1937

Agilent

Trusted Answers

Instructions for Use:
Sample aliquots for analysis should be withdrawn at 20°C to 25°C immediately after opening the container and should be processed without delay for the certified values to be valid within the stated uncertainties.

Safety:
Refer to the Safety Data Sheet on www.agilent.com for information regarding this analytical reference material.

Intended Use:
This analytical reference standard is intended for the preparation of working reference samples for use in routine laboratory analyses, calibration of instruments, validation of analytical methods, assessments of measurement methods, and continuing calibration verification.

Expiration of Certification:
The certification of this analytical reference standard is valid until the expiration date specified above, provided the material is handled and stored in accordance with the instructions given in this certificate. This certification is nullified if the material is damaged, contaminated, or otherwise modified.

Maintenance of Certification:
If substantive changes are noted that affect the certification before the expiration of this certificate, Agilent will notify the purchaser.

Sample lot approver:

Monica Bourgeois
QMS Representative

P12706 (10)
↓
P12715

8.15.23

ANAB
ACCREDITED
ISO 17034
REFERENCE MATERIAL PRODUCER

ISO 17034
Cert No. AR-1936

RM was produced in accordance with the TUV/SUD registered ISO 9001:2015 Quality Management System. Cert# 951215321

www.agilent.com/quality/
CSD-QA-015.2

ISO 17025
Cert No. AT-1937

P12766 ↓ P12785 (20)

Agilent
Trusted Answers

ISO 17034

9.11.23

Reference Material Certificate

Product Information Sheet

Product Name: Chlorinated Herbicides Standard
Product Number: HBM-8151A-1
Storage Conditions: Store at Room Temperature (15° to 30°C).

Lot Number: 0006750243
Lot Issue Date: 07-Jul-2023
Expiration Date: 31-Aug-2025

Component Name	Concentration		Uncertainty	CAS#	Analyte Lot
acifluorfen	100.1	±	0.5 µg/mL	050594-66-6	NT02057
bentazon	100.1	±	0.5 µg/mL	025057-89-0	RM20289
chloramben	100.4	±	0.5 µg/mL	000133-90-4	RM02698
2,4-D	100.1	±	0.5 µg/mL	000094-75-7	RM17172
dalapon	100.4	±	0.5 µg/mL	000075-99-0	RM21030
2,4-DB	100.1	±	0.5 µg/mL	000094-82-6	RM02866
tetrachloroterephthalic acid	100.3	±	0.5 µg/mL	002136-79-0	RM13887
dicamba	100.2	±	0.5 µg/mL	001918-00-9	RM20089
3,5-dichlorobenzoic acid	100.0	±	0.5 µg/mL	000051-36-5	RM02768
dichlorprop	100.0	±	0.5 µg/mL	000120-36-5	RM20896
dinoseb	100.0	±	0.5 µg/mL	000088-85-7	RM20667
MCPA	10004	±	50 µg/mL	000094-74-6	RM12220
MCPP (mecoprop)	10037	±	50 µg/mL	000093-65-2	RM09273
4-nitrophenol	100.1	±	0.5 µg/mL	000100-02-7	RM03752
pentachlorophenol	100.1	±	0.5 µg/mL	000087-86-5	RM02474
picloram	100.4	±	0.5 µg/mL	001918-02-1	RM20442
silvex	100.1	±	0.5 µg/mL	000093-72-1	RM20208
2,4,5-T	100.4	±	0.5 µg/mL	000093-76-5	NT01808

Matrix: methanol (methyl alcohol)

Description:
This document is prepared in accordance with ISO 17034 and Guide 31. This analytical reference material standard was manufactured and verified in accordance with an ISO 9001 registered quality system and analyte concentrations were verified by an ISO 17025 accredited laboratory. The concentration and uncertainty value at the 95% confidence level for each analyte, determined gravimetrically, is listed above.

Traceability:
The balances used for these measurements are calibrated with weights traceable to NIST in compliance with ANSI/NCSL Z540.3, ISO 9001, ISO 17025, and ISO 17034. Calibrated Class A glassware is used for volumetric measurements. Thermometers are calibrated against a NIST traceable thermometer in accordance with NIST Special Publication 1088.

Homogeneity:
This analytical reference standard was unitized according to an in-house procedure and is guaranteed to be homogeneous. There is no minimum sub-sample size required.

CSD-QA-015.2

ISO 17025
Cert No. AT-1937

Agilent

Trusted Answers

Instructions for Use:
Sample aliquots for analysis should be withdrawn at 20°C to 25°C immediately after opening the container and should be processed without delay for the certified values to be valid within the stated uncertainties.

Safety:
Refer to the Safety Data Sheet on www.agilent.com for information regarding this analytical reference material.

Intended Use:
This analytical reference standard is intended for the preparation of working reference samples for use in routine laboratory analyses, calibration of instruments, validation of analytical methods, assessments of measurement methods, and continuing calibration verification.

Expiration of Certification:
The certification of this analytical reference standard is valid until the expiration date specified above, provided the material is handled and stored in accordance with the instructions given in this certificate. This certification is nullified if the material is damaged, contaminated, or otherwise modified.

Maintenance of Certification:
If substantive changes are noted that affect the certification before the expiration of this certificate, Agilent will notify the purchaser.

Sample lot approver:

Monica Bourgeois
QMS Representative

P12766 | 20
↓
P12785 |

9/11/2023

ANAB ACCREDITED REFERENCE MATERIAL PRODUCER

ISO 17034
Cert No. AR-1936

RM was produced in accordance with the TUV/SUD registered ISO 9001:2015 Quality Management System. Cert# 951215321

Page: 2 of 2

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CSD-QA-015.2

ISO 17025
Cert No. AT-1937

P12766 ↓ P12785 (20)

Agilent
Trusted Answers

ISO 17034

9.11.23

Reference Material Certificate

Product Information Sheet

Product Name: Chlorinated Herbicides Standard
Product Number: HBM-8151A-1
Storage Conditions: Store at Room Temperature (15° to 30°C).

Lot Number: 0006750243
Lot Issue Date: 07-Jul-2023
Expiration Date: 31-Aug-2025

Component Name	Concentration		Uncertainty	CAS#	Analyte Lot
acifluorfen	100.1	±	0.5 µg/mL	050594-66-6	NT02057
bentazon	100.1	±	0.5 µg/mL	025057-89-0	RM20289
chloramben	100.4	±	0.5 µg/mL	000133-90-4	RM02698
2,4-D	100.1	±	0.5 µg/mL	000094-75-7	RM17172
dalapon	100.4	±	0.5 µg/mL	000075-99-0	RM21030
2,4-DB	100.1	±	0.5 µg/mL	000094-82-6	RM02866
tetrachloroterephthalic acid	100.3	±	0.5 µg/mL	002136-79-0	RM13887
dicamba	100.2	±	0.5 µg/mL	001918-00-9	RM20089
3,5-dichlorobenzoic acid	100.0	±	0.5 µg/mL	000051-36-5	RM02768
dichlorprop	100.0	±	0.5 µg/mL	000120-36-5	RM20896
dinoseb	100.0	±	0.5 µg/mL	000088-85-7	RM20667
MCPA	10004	±	50 µg/mL	000094-74-6	RM12220
MCPP (mecoprop)	10037	±	50 µg/mL	000093-65-2	RM09273
4-nitrophenol	100.1	±	0.5 µg/mL	000100-02-7	RM03752
pentachlorophenol	100.1	±	0.5 µg/mL	000087-86-5	RM02474
picloram	100.4	±	0.5 µg/mL	001918-02-1	RM20442
silvex	100.1	±	0.5 µg/mL	000093-72-1	RM20208
2,4,5-T	100.4	±	0.5 µg/mL	000093-76-5	NT01808

Matrix: methanol (methyl alcohol)

Description:
This document is prepared in accordance with ISO 17034 and Guide 31. This analytical reference material standard was manufactured and verified in accordance with an ISO 9001 registered quality system and analyte concentrations were verified by an ISO 17025 accredited laboratory. The concentration and uncertainty value at the 95% confidence level for each analyte, determined gravimetrically, is listed above.

Traceability:
The balances used for these measurements are calibrated with weights traceable to NIST in compliance with ANSI/NCSL Z540.3, ISO 9001, ISO 17025, and ISO 17034. Calibrated Class A glassware is used for volumetric measurements. Thermometers are calibrated against a NIST traceable thermometer in accordance with NIST Special Publication 1088.

Homogeneity:
This analytical reference standard was unitized according to an in-house procedure and is guaranteed to be homogeneous. There is no minimum sub-sample size required.

CSD-QA-015.2

ISO 17025
Cert No. AT-1937

Agilent

Trusted Answers

Instructions for Use:
Sample aliquots for analysis should be withdrawn at 20°C to 25°C immediately after opening the container and should be processed without delay for the certified values to be valid within the stated uncertainties.

Safety:
Refer to the Safety Data Sheet on www.agilent.com for information regarding this analytical reference material.

Intended Use:
This analytical reference standard is intended for the preparation of working reference samples for use in routine laboratory analyses, calibration of instruments, validation of analytical methods, assessments of measurement methods, and continuing calibration verification.

Expiration of Certification:
The certification of this analytical reference standard is valid until the expiration date specified above, provided the material is handled and stored in accordance with the instructions given in this certificate. This certification is nullified if the material is damaged, contaminated, or otherwise modified.

Maintenance of Certification:
If substantive changes are noted that affect the certification before the expiration of this certificate, Agilent will notify the purchaser.

Sample lot approver:

Monica Bourgeois
QMS Representative

P12766 | 20
↓
P12785 |

9/11/2023

ANAB ANSI National Accreditation Board ACCREDITED REFERENCE MATERIAL PRODUCER

ISO 17034
Cert No. AR-1936

RM was produced in accordance with the TUV/SUD registered ISO 9001:2015 Quality Management System. Cert# 951215321

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CSD-QA-015.2

ISO 17025
Cert No. AT-1937

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CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic plus

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Reference Material Producer
Certificate #3222.01

ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 32049 **Lot No.:** A0212676

Description : 2,4-Dichlorophenylacetic Acid Standard

2, 4-Dichlorophenyl Acetic Acid 200µg/mL, Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : March 31, 2027 **Storage:** 10°C or colder

Handling: This product is photosensitive. **Ship:** Ambient

P13497 ↓ P13515 } Y.P. 08/16/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	2,4-dichlorophenylacetic acid	19719-28-9	STBK3827	99%	200.0 µg/mL	+/- 2.7154

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Methanol
CAS # 67-56-1
Purity 99%

Specific Reference Material Notes:
Failure to derivatize this standard will lead to incorrect quantitative results.

Quality Confirmation Test

Column:
150mm x 4.6mm
Allure C18 Cat.(#9164565)

Flow Rate:
1.0 ml/min.

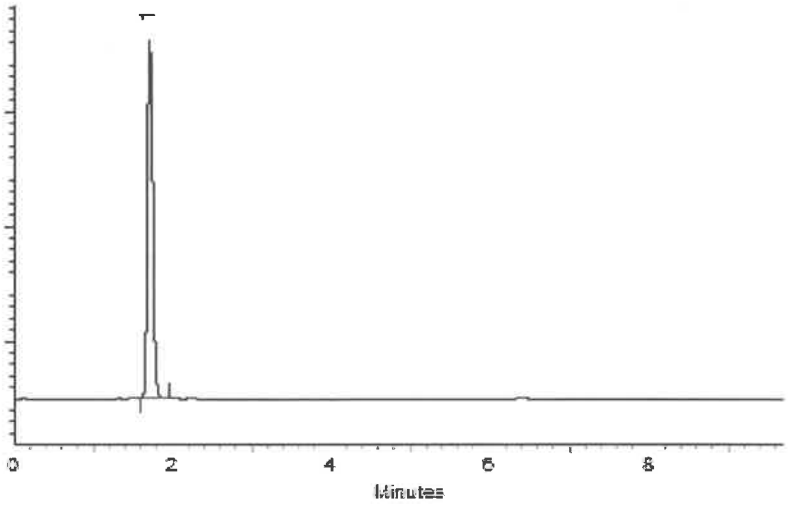
Mobile Phase A:
0.14% H3PO4 in water

Mobile Phase B:
acetonitrile

Mobile Phase Composition:
90%B Isocratic

Det. Type:
Wavelength: 220 & 254 nm

Inj. Vol
5µl



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Ethan Winiarski - Operations Tech I

Date Mixed: 11-Jun-2024 **Balance Serial #** B345965662

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 13-Jun-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

- Purity and/or chemical identity are determined by one or more of the following techniques: GC/FID, HPLC, GC/μECD, GC/MS, LC/MS, RI, and/or melting point.
- Compounds with a listed purity of less than 99% have been weight corrected to compensate for impurities and/or salts. A correction factor is used to calculate the amount of compound necessary to achieve the desired concentration of the parent compound in solution.
- Purity of isomeric compounds is reported as the sum of the isomers.
- Purity values are rounded to the nearest whole number.

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

$$U_{combined\ uncertainty} = k\sqrt{u^2_{gravimetric} + u^2_{homogeneity} + u^2_{storage\ stability} + u^2_{shipping\ stability}}$$

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

- Concentration is based upon gravimetric preparation using either a balance whose calibration has been verified daily using NIST traceable weights, and/or dilutions with Class A glassware.

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

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110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic plus

ISO 17034 Accredited
Reference Material Producer
Certificate #3222.01

ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 32049 **Lot No.:** A0212676

Description : 2,4-Dichlorophenylacetic Acid Standard

2, 4-Dichlorophenyl Acetic Acid 200µg/mL, Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : March 31, 2027 **Storage:** 10°C or colder

Handling: This product is photosensitive. **Ship:** Ambient

P13497 ↓ P13515 } Y.P. 08/16/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	2,4-dichlorophenylacetic acid	19719-28-9	STBK3827	99%	200.0 µg/mL	+/- 2.7154

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Methanol
CAS # 67-56-1
Purity 99%

Specific Reference Material Notes:
Failure to derivatize this standard will lead to incorrect quantitative results.

Quality Confirmation Test

Column:
150mm x 4.6mm
Allure C18 Cat.(#9164565)

Flow Rate:
1.0 ml/min.

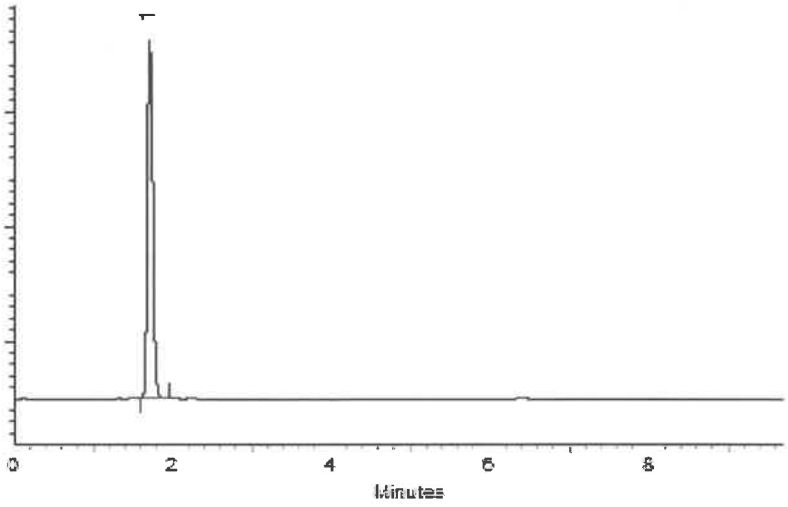
Mobile Phase A:
0.14% H3PO4 in water

Mobile Phase B:
acetonitrile

Mobile Phase Composition:
90%B Isocratic

Det. Type:
Wavelength: 220 & 254 nm

Inj. Vol
5µl



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Ethan Winiarski - Operations Tech I

Date Mixed: 11-Jun-2024 **Balance Serial #** B345965662

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 13-Jun-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

- Purity and/or chemical identity are determined by one or more of the following techniques: GC/FID, HPLC, GC/μECD, GC/MS, LC/MS, RI, and/or melting point.
- Compounds with a listed purity of less than 99% have been weight corrected to compensate for impurities and/or salts. A correction factor is used to calculate the amount of compound necessary to achieve the desired concentration of the parent compound in solution.
- Purity of isomeric compounds is reported as the sum of the isomers.
- Purity values are rounded to the nearest whole number.

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

$$U_{combined\ uncertainty} = k\sqrt{u^2_{gravimetric} + u^2_{homogeneity} + u^2_{storage\ stability} + u^2_{shipping\ stability}}$$

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

- Concentration is based upon gravimetric preparation using either a balance whose calibration has been verified daily using NIST traceable weights, and/or dilutions with Class A glassware.

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

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CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic plus

ISO 17034 Accredited
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Certificate #3222.01

ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 32049 **Lot No.:** A0212676

Description : 2,4-Dichlorophenylacetic Acid Standard

2, 4-Dichlorophenyl Acetic Acid 200µg/mL, Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : March 31, 2027 **Storage:** 10°C or colder

Handling: This product is photosensitive. **Ship:** Ambient

P13497 ↓ P13515 } Y.P. 08/16/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	2,4-dichlorophenylacetic acid	19719-28-9	STBK3827	99%	200.0 µg/mL	+/- 2.7154

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Methanol
CAS # 67-56-1
Purity 99%

Specific Reference Material Notes:
Failure to derivatize this standard will lead to incorrect quantitative results.

Quality Confirmation Test

Column:
150mm x 4.6mm
Allure C18 Cat.(#9164565)

Flow Rate:
1.0 ml/min.

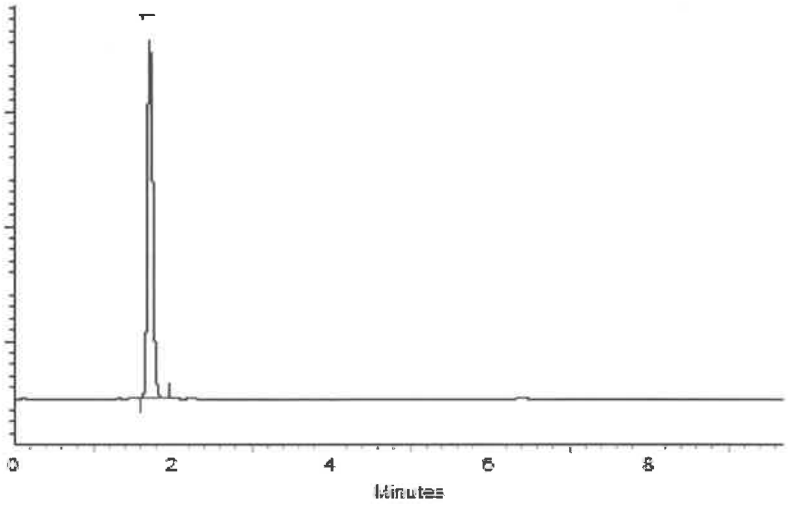
Mobile Phase A:
0.14% H3PO4 in water

Mobile Phase B:
acetonitrile

Mobile Phase Composition:
90%B Isocratic

Det. Type:
Wavelength: 220 & 254 nm

Inj. Vol
5µl



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Ethan Winiarski - Operations Tech I

Date Mixed: 11-Jun-2024 **Balance Serial #** B345965662

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 13-Jun-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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- Purity of isomeric compounds is reported as the sum of the isomers.
- Purity values are rounded to the nearest whole number.

Certified Uncertainty Value Notes:

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  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

- Concentration is based upon gravimetric preparation using either a balance whose calibration has been verified daily using NIST traceable weights, and/or dilutions with Class A glassware.

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 32049 **Lot No.:** A0212676

Description : 2,4-Dichlorophenylacetic Acid Standard

2, 4-Dichlorophenyl Acetic Acid 200µg/mL, Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : March 31, 2027 **Storage:** 10°C or colder

Handling: This product is photosensitive. **Ship:** Ambient

P13497 ↓ P13515 } Y.P. 08/16/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	2,4-dichlorophenylacetic acid	19719-28-9	STBK3827	99%	200.0 µg/mL	+/- 2.7154

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Methanol
CAS # 67-56-1
Purity 99%

Specific Reference Material Notes:
Failure to derivatize this standard will lead to incorrect quantitative results.

Quality Confirmation Test

Column:
150mm x 4.6mm
Allure C18 Cat.(#9164565)

Flow Rate:
1.0 ml/min.

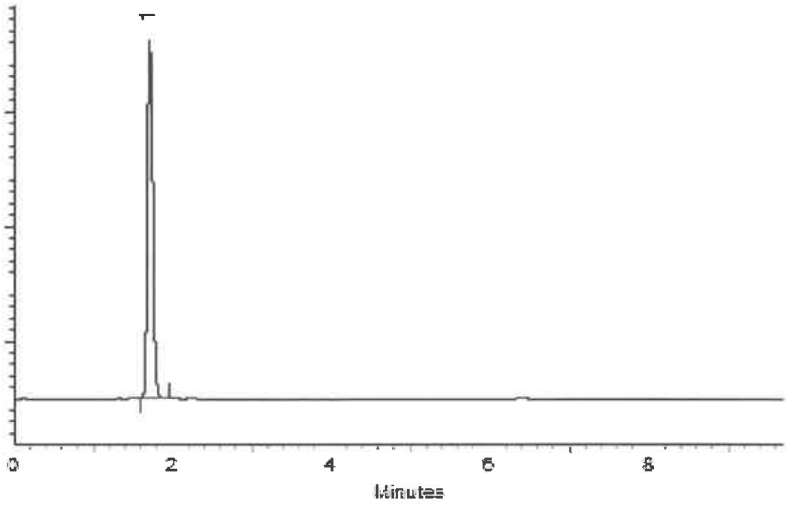
Mobile Phase A:
0.14% H3PO4 in water

Mobile Phase B:
acetonitrile

Mobile Phase Composition:
90%B Isocratic

Det. Type:
Wavelength: 220 & 254 nm

Inj. Vol
5µl



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Ethan Winiarski - Operations Tech I

Date Mixed: 11-Jun-2024 **Balance Serial #** B345965662

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 13-Jun-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

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  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

- Concentration is based upon gravimetric preparation using either a balance whose calibration has been verified daily using NIST traceable weights, and/or dilutions with Class A glassware.

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Received by SG on 8/16/19
P8828
P8826

Catalog No. : 32254 **Lot No.:** A0148063

Description : Dalapon methyl ester Standard

Dalapon methyl ester 1000µg/mL, Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : April 30, 2026 **Storage:** 10°C or colder

Handling: This product is photosensitive.

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	Dalapon methyl ester **CAS #** 17640-02-7 (Lot 1764600) **Purity** 98%	999.6 µg/mL	+/- 10.0697 µg/mL +/- 34.4896 µg/mL +/- 34.4896 µg/mL		Gravimetric Unstressed Stressed

Solvent: Methanol
CAS # 67-56-1
Purity 99%

Column:
30m x 0.25mm x 0.25µm
Rtx-5 (cat.#10223)

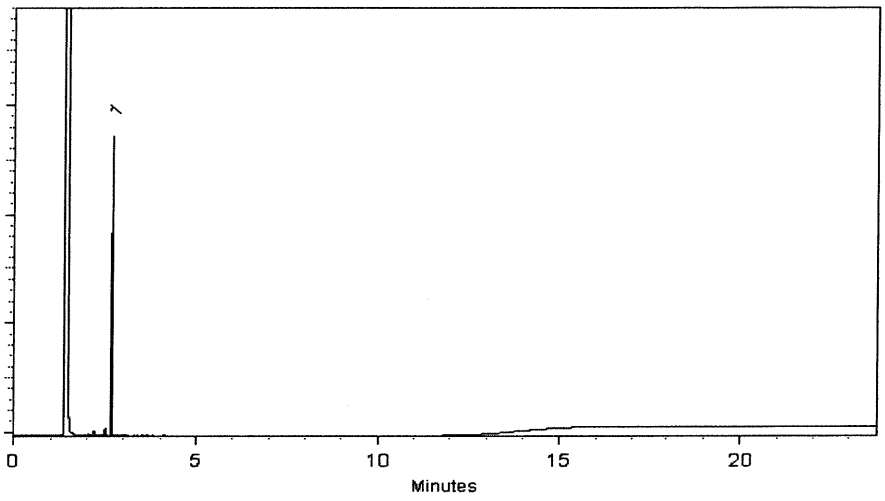
Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
75°C (hold 1 min.) to 330°C
@ 20°C/min. (hold 10 min.)

Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Russ Bookhamer - Operations Technician I

Date Mixed: 11-Apr-2019 **Balance:** 1127510105

Feng-Yun Lo - QC Analyst

Date Passed: 15-Apr-2019

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

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CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

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Received by SG on 9/10/19
P8897
P8896

Catalog No. : 32059 **Lot No.:** A0152499

Description : Herbicide Mix #3/ME (Methyl Ester)

Herbicide Mix #3/ME (Methyl Ester) 20,000 µg/mL, Hexane, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : September 30, 2026 **Storage:** 10°C or colder

Handling: This product is photosensitive.

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)	
1	MCPP (Mecoprop) methyl ester **CAS #** 23844-56-6 (Lot 8685200) **Purity** 99%	20,004.0 µg/mL	+/- 185.1208 µg/mL +/- 685.5986 µg/mL +/- 685.5986 µg/mL	Gravimetric Unstressed Stressed
2	MCPA methyl ester **CAS #** 2436-73-9 (Lot 7964600) **Purity** 99%	20,012.0 µg/mL	+/- 185.1948 µg/mL +/- 685.8728 µg/mL +/- 685.8728 µg/mL	Gravimetric Unstressed Stressed

Solvent: Hexane
CAS # 110-54-3
Purity 99%

Column:
30m x 0.25mm x 0.25µm
Rtx-5 (cat.#10223)

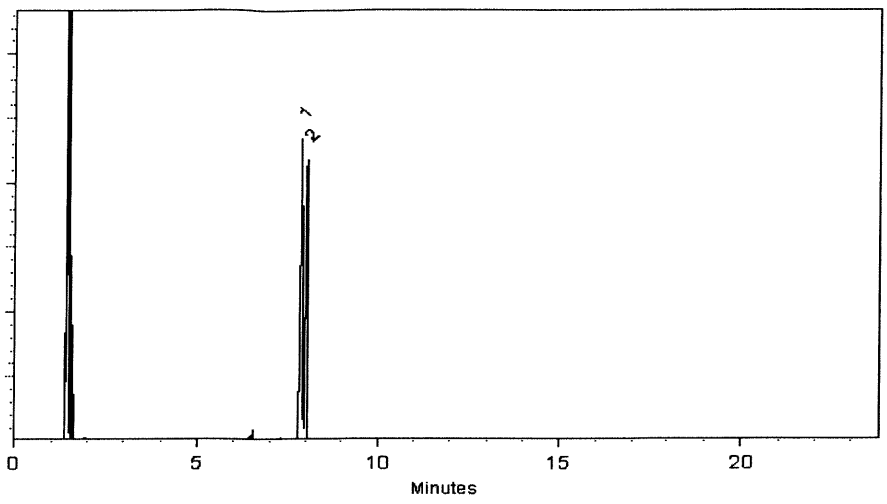
Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
75°C (hold 1 min.) to 330°C
@ 20°C/min. (hold 10 min.)

Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Russ Bookhamer - Operations Technician I

Date Mixed: 03-Sep-2019 **Balance:** 1128360905

Jennifer Pollino - Operations Tech-ARM QC

Date Passed: 05-Sep-2019

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

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Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Received by SG on 10/11/19
P8999
–
P9008

Catalog No. : 32050 **Lot No.:** A0152705

Description : 2,4-Dichlorophenylacetic Acid Methyl Ester Standard

515 Surrogate (ester) 2, 4-dichlorophenyl Acetic Acid Methyl Ester
200µg/mL, Hexane, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : June 30, 2026 **Storage:** 10°C or colder

Handling: This product is photosensitive.

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	2,4-Dichlorophenyl acetic acid methyl ester	200.0 µg/mL	+/- 1.4182	µg/mL	Gravimetric
	CAS # 55954-23-9 (Lot CSC42194-01)		+/- 6.7507	µg/mL	Unstressed
	Purity 99%		+/- 6.7507	µg/mL	Stressed

Solvent: Hexane
CAS # 110-54-3
Purity 99%

Column:
30m x 0.25mm x 0.25µm
Rtx-5 (cat.#10223)

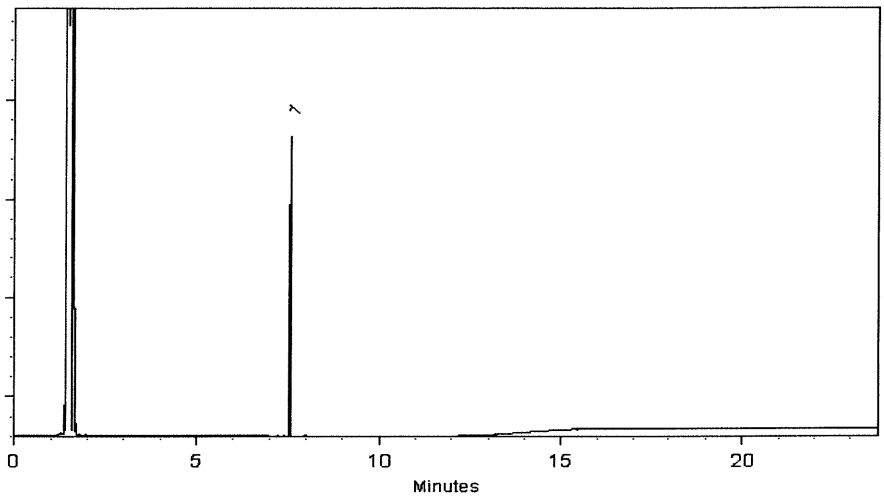
Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
75°C (hold 1 min.) to 330°C
@ 20°C/min. (hold 10 min.)

Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID



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Cydnei L. Crust - Mix Technician

Date Mixed: 09-Sep-2019 **Balance:** B707717271

Feng-Yun Lo - QC Analyst

Date Passed: 11-Sep-2019

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

SHIPPING DOCUMENTS

FORM DC-1

SAMPLE LOG-IN SHEET

Lab Name : Alliance Technical Group, LLC		Page 1 of __
Received By (Print Name) Rana		Log-in Date 10/21/2024
Received By (Signature)		
Case Number R36724	SDG No.	MA No. N/A

Remarks:	
1. Custody Seal (s)	Present, Intact
2. Custody Seal Nos.	n/a
3. Traffic Reports/Chain Of Custody Records	Present
4. Airbill	Present
5. Airbill No. and Shipping Container ID No.	779338792277 1
6. Shipping Container Temperature Indicator Bottle	Present
7. Shipping Container Temperature	2.1 Degree C
8. Sample Condition	Intact
9. Sample Tags Sample Tag Numbers	Absent Listed on Traffic Report
10. Does information on Traffic Reports/Chain of Custody Records and Sample Tags agree ?	Yes
11. Date Received at Lab	10/19/2024
12.Time Received	10:15

	EPA Sample #	Aqueous/ Water Sample pH	Corresponding Sample Tag #	Corresponding Assigned Lab #	Remarks: Condition of Sample Shipment, etc.
1	C0AL2	N/A		P4462-02	Intact
2	N/A	N/A	N/A	N/A	N/A
3	N/A	N/A	N/A	N/A	N/A
4	N/A	N/A	N/A	N/A	N/A
5	N/A	N/A	N/A	N/A	N/A
6	N/A	N/A	N/A	N/A	N/A
7	N/A	N/A	N/A	N/A	N/A
8	N/A	N/A	N/A	N/A	N/A
9	N/A	N/A	N/A	N/A	N/A
10	N/A	N/A	N/A	N/A	N/A
11	N/A	N/A	N/A	N/A	N/A
12	N/A	N/A	N/A	N/A	N/A
13	N/A	N/A	N/A	N/A	N/A
14	N/A	N/A	N/A	N/A	N/A
15	N/A	N/A	N/A	N/A	N/A
16	N/A	N/A	N/A	N/A	N/A
17	N/A	N/A	N/A	N/A	N/A
18	N/A	N/A	N/A	N/A	N/A
19	N/A	N/A	N/A	N/A	N/A
20	N/A	N/A	N/A	N/A	N/A
21	N/A	N/A	N/A	N/A	N/A
22	N/A	N/A	N/A	N/A	N/A
23	N/A	N/A	N/A	N/A	N/A

* Contact SMO and attach record of resolution

Reviewed By	Logbook No. N/A
Date	Logbook Page No. N/A

P4462

USEPA CLP COC (LAB COPY)
DateShipped: 10/18/2024
CarrierName: FedEx
AirbillNo: 7793 3879 2277

CHAIN OF CUSTODY RECORD

DAS #: R36724
Cooler #:

No: 3-101824-092513-0037
Lab: Alliance Technical Group, LLC Chemtech Lab
Lab Contact: Yazmeen Gomez
Lab Phone: 908-728-3147

Sample Identifier	CLP Sample No.	Matrix/Sampler	Coll. Method	Analysis/Turnaround (Days)	Tag/Preservative/Bottles	Location	Collection Date/Time	For Lab Use – Only
IDW-W	C0AL2	Water/ START	Grab	T_HERB(21 Day)	1760 (<6 C), 1761 (<6 C) (2)	IDW	10/17/2024 08:00	

Special Instructions:

Shipment for Case Complete? Y
Samples Transferred From Chain of Custody #

Analysis Key: T_HERB=TCLP Herbicides

Items/Reason	Relinquished by (Signature and Organization)	Date/Time	Received by (Signature and Organization)	Date/Time	Sample Condition Upon Receipt
		10-18-24 1100		10/19/24 10:15	2-5

284 Sheffield Street, Mountainside NJ 07092 (908)-789-8900 Fax : 908 789 8922

Laboratory Certification

Certified By	License No.
CAS EPA CLP Contract	68HERH20D0011
Connecticut	PH-0830
DOD ELAP (L-A-B)	L2219
Maine	2024021
Maryland	296
New Hampshire	255423
New Jersey	20012
New York	11376
Pennsylvania	68-00548
Soil Permit	525-24-234-08441
Texas	T104704488